

# CA ZAMBIA PROGRAMME EXAMINATIONS

# ADVISORY LEVEL

# CA 3.1: ADVANCED FINANCIAL REPORTING

# MONDAY 11 DECEMBER 2017

TOTAL MARKS: 100; TIME ALLOWED: THREE (3) HOURS

# **INSTRUCTIONS TO CANDIDATES**

- 1. You have fifteen (15) minutes reading time. Use it to study the examination paper carefully so that you understand what to do in each question. You will be told when to start writing.
- 2. This paper is divided into TWO sections:

Section A: One (1) compulsory scenario question.

Section B: Four (4) Optional scenario Questions. Attempt any three (3) questions.

- 3. Enter your student number and your National Registration Card number on the front of the answer booklet. Your name must **NOT** appear anywhere on your answer booklet.
- 4. Do **NOT** write in pencil (except for graphs and diagrams).
- 5. **Cell Phones** are **NOT** allowed in the Examination Room.
- 6. The marks shown against the requirement(s) for each question should be taken as an indication of the expected length and depth of the answer.
- 7. All workings must be done in the answer booklet.
- 8. Present legible and tidy work.
- 9. Graph paper (if required) is provided at the end of the answer booklet.
- 10. Present Value and Annuity tables are attached at the end of this paper.

#### **SECTION A**

#### This question is compulsory and must be attempted.

#### **<u>QUESTION ONE</u>** – (COMPULSORY)

The following draft statements of financial position relate to A plc and its investees, B plc and C plc as at 31 December 2017:

	A plc	B plc	C plc
Assets:	K'm	K'm	K'm
Non current assets Tangible Intangible Equity Investments	1,950 50 1,900	950	865
Current assets	1,150	545	635
Total Assets	5,050	1,495	1,500
Equity and Liabilities:			
Equity Share Capital Retained Earnings Other Reserves	1,200 1,100 1,050	420 398 212	320 405 335
Total Equity	3,350	1,030	1,060
Non current liabilities	1,200	400	165
Current Liabilities	500	65	275
Total Equity and Liabilities	5,050	1,495	1,500

#### Further information relating to A plc, B plc and C plc:

(i) A plc acquired 90% of B plc's equity on 1 January 2010 at a cost of K900 million when the retained earnings and other reserves of B plc were K260 million and K190 million respectively. The fair value of B plc's identifiable net assets and non controlling interests in B plc at 1 January 2010 were K905 million and K100 million respectively. Non controlling interests on acquisition of B plc are measured at fair value. The excess of the fair value of B plc's identifiable net assets over their carrying amounts was attributable to an item of plant which had a remaining useful life of 10 years at 1 January 2010.

- (ii) The A plc group has recognised total impairment losses amounting to K25 million in respect of goodwill on acquisition of B plc in reporting periods prior to 1 January 2017.
- (iii) On 1 April 2017, A plc disposed of a 30% holding in B plc for cash consideration amounting to K300 million. The fair value of A plc's remaining holding in B plc on that date was K675 million. A plc has not accounted for this disposal in the drafts financial statements apart from crediting the full disposal proceeds to profit or loss.
- (iv) A plc acquired 70% of C plc's equity on 1 January 2015 at a cost of K480 million when the retained earnings and other reserves of C plc were K200 million and K100 million respectively. The fair value of C plc's identifiable net assets and of non controlling interests in C plc at 1 January 2015 were K650 million and K300 million respectively. Non controlling interests on acquisition of C plc are measured at their share of the fair value of C plc's identifiable net assets at acquisition. The excess of the fair value of C plc's identifiable net assets over their carrying amounts was attributable to an item of plant which had a remaining useful life of 5 years at 1 January 2015.

A plc acquired a further 10% of C plc's equity on 1 October 2017 at a cost of K110 million.

- (v) Impairment reviews were carried out at 31 December 2017 in respect of B plc and C plc as cash generating units. The recoverable amounts in respect of the net assets of B plc and C plc at 31 December 2017 were K1,050 million and K1,080 million respectively. In both cases, assume that any impairment losses have arisen at the year end.
- (vi) A plc's investments in B plc and C plc are the only items making up equity investments in A plc's statement of financial position. In preparing its separate financial statements, A plc has made an irrevocable election to treat both investments as fair value through other comprehensive income items in accordance with IFRS 9 Financial Instruments.
- (vii) A summary of A plc, B plc and C plc results from their statements of profit or loss and other comprehensive income for the year ended 31 December 2017 are as follows:

	A plc	B plc	C plc
	K'm	K'm	K'm
Profit for the Year	360	24	36
Other Comprehensive Income	60	18	12
Total Comprehensive Income	420	42	48

It may be assumed that the above results accrued evenly over the reporting period. Only A plc paid dividends amounting to K80 million during the period.

- (viii) Included in the property plant and equipment of A plc is a property that was acquired on 1 January 2014 at a cost of K350 million. The property is subject to revaluations in accordance with the revaluation model under IAS 16 Property Plant and Equipment. Its total useful economic life is estimated at 100 years. At 31 December 2016, the property was revalued to a fair value of K320 million. The property is yet to be revalued at 31 December 2017 to its fair value of K335 million.
- (ix) As at 31 December 2017, A plc has a division which is being disposed of as a unit in a single transaction. The IFRS 5 Non Current Assets Held for Sale and Discontinued Operations conditions for classification as a disposal group have been met in respect of the division. The estimated price for sale of the division has been estimated at K350 million before disposal costs. Disposal costs are estimated at 10% of the sale price.

The following carrying amounts of the division's net assets at 31 December 2017 have been included in A plc's statement of financial position above:

	K'm
Property Plant and Equipment	400
Patent	20
Current Assets	30
Current Liabilities	(40)
	410

#### **Required:**

Prepare the A plc Group Consolidated Statement of Financial Position as at 31 December 2017.

#### [Total: 40 Marks]

# **SECTION B**

## Attempt any THREE (3) questions in this section.

#### **QUESTION TWO**

You work for Lamano Chartered Accountants as one of the firm's financial consultants. Your clients have approached you for advice on the accounting treatment of the following transactions in their respective financial statements for the year ended 30 September 2017 in accordance with applicable accounting standards.

#### Client 1 – Chala Plc

Chala Plc introduced a pension scheme in order to motivate all of its employees. The scheme started on 1 July 2017. The terms of scheme are as follows:

- (i) Membership to the scheme is open to all employees. However, it is voluntary;
- (ii) Employees will only be admitted to the scheme on 1 July 2017 and thereafter on 1 October of each year;
- (iii) Employees and employer will contribute 15% of employees' monthly emoluments each. Employees' contributions will be made through payroll;
- (iv) Employer's obligation is limited to their monthly contribution;
- (v) Employees will only get their benefits upon reaching 60 years or leaving the company or working for a continuous 20 years whichever comes earliest;
- (vi) Employees' total benefits will be the sum of: employees' contributions, employer's contributions and a return on total contributions;
- (vii) The scheme will be managed by an independent firm called Laya Limited.
- (viii) Laya Limited will charge 40% of return on total contributions.

During the year to 30 September 2017, Chala Plc paid emoluments of K600,000 to its employees.

Employees' membership to the scheme is shown below:

Date	Percentage
1 July 2017	25%
1 October 2017	60%

Chala Plc paid its total contributions for the period to 30 September 2017 on 2 October 2017.

No employee left or joined the company in 2017. The directors of Chala Plc expect employees to neither leave nor join the company in 2018.

The directors of Chala Plc do not know how the above transaction should be treated in their financial statements for the year to 30 September 2017. (5 marks)

## Client 2 – Tusha Plc

Tusha Plc acquired an incomplete building from Vano Limited on 31 December 2016 at a total cost of K200,000. On 1 January 2017 construction works on the building commenced. Tusha Plc has estimated that the building will take 15 months to be ready for use. Tusha Plc wants to sell the building immediately it is ready for use.

The constructions works are expected to cost Tusha Plc K120,000. This will be financed by Tusha Plc's existing loans' outlay. Tusha Plc has three (3) existing loans as shown below:

	Amount	<b>Interest rate</b>	<b>Date borrowed</b>	Loan duration
Loan 1	K150,000	20%	1 October 2013	5 years
Loan 2	K250,000	12%	1 October 2014	8 years
Loan 3	K300,000	10%	1 October 2015	10 years

Tusha Plc has already used K400,000 of the loans on other construction projects which are still on–going. All the loans have a fixed annual interest and principal amounts are repayable at the end of each loan period.

In the year to 30 September 2017, Tusha Plc spent K60,000 on the construction works of the building acquired from Vano Limited. Total interest for the year to 30 September 2017 was fully paid on 30 September 2017.

The directors of Tusha Plc are not sure of how to treat the building and interest on loans in their financial statements for the year to 30 September 2017. (8 marks)

#### Client 3 – Mula Plc

Mula Plc introduced a share payment bonus scheme to 300 of its employees on 1 July 2016. Each employee will be entitled to 600 equity shares upon serving a continuous three (3) – year period of service. At 30 September 2016, the company did not expect any employee to leave though one (1) left. At 30 September 2017, the company does not expect any employee to leave.

The following market values of Mula Plc's equity shares are relevant:

Date	Market price/share	
	K	
1 July 2016	3.00	
30 September 2016	3.20	

30 September 2017 3.50

The directors of Mula Plc do not know how to treat the transaction above in their financial statements for the year to 30 September 2017. (7 marks)

## **Required:**

Explain how the above transactions would be treated in the financial statements of your respective clients for the year ended 30 September 2017. (Your answer should include relevant calculations where applicable).

#### [Total: 20 Marks]

## **QUESTION THREE**

Mboo plc is a chemical manufacturing entity with several factory sites throughout Zambia. The directors of Mboo plc are preparing financial statements for the reporting year to 31 December 2017 and are considering the accounting treatment of the following transactions:

Mboo plc entered an arrangement with Majula Premier Bank plc on 1 January 2016 in which Mboo issued two million K10 shares to the bank at a premium of 10%. Transaction costs amounted to 2% of the gross issue proceeds. Unlike other classes of shares which Mboo has in issue, these shares do not carry any dividend rights but have first priority to proceeds from a winding up in case a liquidation arises. The shares are redeemable five years after their issue at a premium of 75%. Mboo has classified the shares as an equity instrument and therefore accounted for the shares by crediting its equity with the net issue proceeds in its financial statements for the previous year.

The shares issued to Majula Premier Bank plc were to finance construction of a factory following recent development permission by the Chipata Municipal Council, though the factory must be demolished and the land restored after 10 years of its operation. Construction work was completed on schedule on 1 October 2017 and production commenced immediately on that date.

The total construction cost of the factory was K25 million of which K15 million was incurred during the year to 31 December 2016. Of the total proceeds of the share issue, K8 million was immediately invested in the money markets for one year to 31 December 2016 and generated income amounting to K0.64 million which was credited in full as income in profit or loss for the year to 31 December 2016. Construction work only commenced on 1 April 2016 though it was temporarily suspended during the last three months of year ended 31 December 2016 due to a shortage of materials.

Mboo has a highly publicised environmental policy that promises to avoid or rectify any damage that the company's operations may cause to the environment. As a follow up on this policy, the company has always cleaned up environmental pollution in the past. Operation of the factory will lead to a chemical discharge that will cause damage to surrounding land. The estimated cost of rectifying the damage at end of the factory's life is K10.375 million though it is not a requirement of the law to rectify the damage.

Dismantling the factory at the end of its life has an estimated cost of K31.125 million.

Where applicable discount rates are not specified or implied in the above information, a discount rate of 10% must be used.

## **Required:**

Advise the directors of Mboo plc on how the above will affect the financial statements for the year to 31 December 2017 in accordance all relevant accounting standards.

#### [Total: 20 Marks]

## **QUESTION FOUR**

(a) You work for Zaza Chartered Accountants as a senior financial consultant. The director of one of your clients, Keta Limited heard that there is a new International Accounting Standard IFRS 16 'Leases' that will replace IAS 17 'Leases', IFRIC 4 'Determining whether an Arrangement contains a Lease', SIC 15'Operating Lease – Incentives ' and SIC 27'Evaluating the Substance of Transactions Involving the Legal Form of a Lease' in accounting for lease.

The director has therefore requested you to explain the relevant areas covered by IFRS 16'*Leases*'.

## Required

Explain the accounting treatment of leases under IFRS 16'*Leases*' in the financial statements of both lessor and lessee. (12 marks)

- (b) The promoters of Santa Enterprises have presented you with their proposed accounting policies of various items of the financial statements for your review. Some of the proposals include the following:
  - (1) Inventories will always be shown at cost.
  - (2) There will be no amortisation of intangible assets.
  - (3) Change in depreciation rate will be applied retrospectively.

#### **Required:**

Assess the appropriateness of the proposed accounting policies above. (8 marks)

[Total: 20 Marks]

#### **QUESTION FIVE**

You are a Financial Analyst. A client is seeking investment advice. The client is particularly interested in investing in the retail sector. The client has specifically requested that you advise on whether acquiring a shareholding in Mubita plc would be a good investment decision. He has asked that you help with a review of the financial information relating to Mubita plc before he makes his final decision to invest. Mubita plc's current share price is K2.50 per share, which is 40% lower than it was at the same time last year.

The financial statements for Mubita plc for the year ended 31 December 2017 are as follows:

Consolidated Statement of Financial Position as at 31 December: 2017 2016			2016
Assets		2017	2010
Noncu		K'm	K'm
TOneu	Property Plant and Equipment	524	470
	Investments	28	32
		20	52
		552	502
Currer	it		
	Inventory	280	174
	Receivable	158	126
	Cash and cash equivalents	-	18
		438	318
Total A	Assets	990	820
	and Liabilities		
Equity		(0)	(0)
	Share capital (K1 shares) Share Premium	60 06	60 06
		96 358	96 328
	Retained Earnings	338	528
		514	484
	Non-controlling interests	32	28
	Ū.		
		546	512
Noncu	rrent liabilities		
	Borrowings	110	116
	Deferred tax	10	2
		120	118

Current liabilities		
Trade and other payables	288	190
Borrowings	36	-
	324	190
Total Equity and Liabilities	990	820

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

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	2017	2016
	K'm	K'm
Revenue	906	824
Cost of sales	(610)	(536)
Gross Profit	296	288
Distribution Costs	(132)	(120)
Administrative Expenses	(124)	(128)
Operating Profit	40	40
Finance Costs	(16)	(10)
Share of Associate's Profit or loss	(4)	6
Profit Before Tax	20	36
Income Tax Expense	(4)	(10)
	(+)	(10)
Profit for the year	16	26
Other Comprehensive Income		
Items not reclassified in profit or loss		
-	() 28	
Revaluation of property (net of tax	() 20	-
Total Comprehensive Income	44	26
Profit for the year attributable to:		
Parent's equity interests	14	22
Non-controlling interests	2	4
Non-controlling interests	2	+
	16	26
Total Comprehensive Income attributable to:		
Parent's equity interests	42	22
Non-controlling interests	2	4

	44	26
Required:		

Prepare a report on Mubita plc's financial performance and position explaining any further financial information that would be required in making a more informed decision.

[Total: 20 Marks]

## **END OF PAPER**

# **CA3.1: ADVANCED FINANCIAL REPORTING SOLUTIONS**

## SOLUTION ONE

A plc Group Consolidated Statement Financial Position as at 31 December 2017:

Assets:	K'm
Non-current Tangible (w.i) Intangible (w.ii)	3,395.3 36
	3,431.3
Current (w.iii)	2,655
Total Assets	6,086.3
Equity and Liabilities:	
Equity	
Share capital	1,200
Retained earnings (w.vii)	861.6
Other reserves (w.x)	793.3
Equity attributable to owners of parent	2,854.9
Non-controlling Interests (412(w.xi)+214.4(w.xiii))	626.4
Total equity	3,481.3
Non-current liabilities (1200+400+165)	1,765
Current liabilities (500+65+275)	840
Total equity and liabilities	6,086.3

Workings to the SFP:

i)	Tangible non-current assets	K'm
	Given amounts: A plc	1,950
	Bplc	950
	Cplc	865
		3,765
	Adjustments: FV gain on acq of B plc (905-420-260-190)	35
	FV gain on acq of C plc (650-320-200-100)	30
	FV depreciation from A plc (35÷10X8 years)	(28)
	FV depreciation from A plc $(30 \div 5X3 \text{ years})$	(18)
	Revaluation of A plc's PPE at 31.12.2017:	
	FV at 31.12.2017 333	5
	Carrying amount at 31.12.2017 (320-320÷97X1) (316 CGU impairment losses allocated to PPE:	<u>5.7)</u> 18.3
	B plc (w.v)	(7)
	Reclassify PPE in disposal group HFS to current assets	(400)
	Group Tangible NCA at 31.12.2017	3,395.3
i)	Intangible non-current assets	K'm
,	Given amounts: A plc	50
	Adjustments:	
	Goodwill on acquisition of C plc (w.iv)	6
	Recleassify patent in disposal group HFS to current assets	(20)
	Group Intangible NCA at 31.12.2017	36
::)	Current essets	K'm
ii)	Current assets	
	Given amounts: A plc	1,150 545
	B plc C plc	545 635
	-	2,330
	Adjustments:	,

Reclcassify PPE in disposal group HFS to current assets		400
Reclcassify patent in disposal group HFS to current assets		20
Impairment loss assets in disposal group HFS:		
FV less disposal costs 90%X350	315	
Carrying amts	<u>(410)</u>	(95)
Group current assets at 31.12.2017		2,655
		_,

iv)	Goodwill on acquisition of subsidiaries		
		B plc	C plc
	Cost of a servicition	K'm	K'm
	Cost of acquisition	900 100 (200/ X(50))	480
	NCI at acquisition	100 (30%X650)	195
	FV of identifiable NA on acquisition	(905)	(650)
	Goodwill at acquisition	95	25
	Less impairments upto 31.12.2016	(25)	-
	Goodwill at 1.1. 2017	70	25
	Impairment in y/e 31.12.2017	(70)(w.v)	(19)(w.vi)
	-		
	Goodwill to report at 31.12.2017		<u> </u>
v)	B plc impairment review at 31.12.2017	:	K'm
/	Recoverable amount		1,030
	Carrying amounts:		
	Identifiable assets:		1.020
	Given	intine (25. 29)	1,030
	FV gains less accum deprec	lation (35-28)	7
			1,037
	Goodwil		70
			1,107
Г	Therefore total impairment loss is (1,107-1	,030)	77
	•	, , ,	
A	Allocation of CGU loss:		70
	First to goodwill up to carrying amo	ount of goodwill	70
	Balance to PPE (77-70)		7
			77
vi)	C plc impairment review at 31.12.2017	:	<u>K</u> 'm
	Recoverable amount		1,080

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	Carrying amounts: Identifiable assets:				
	Given FV gains less accum c	leprecia	ation (30	-18)	1,060 12
		$(25 \cdot 0)$	7)		1,072 35.1
	Goodwill (gross)	(25÷0.	1)		
					1,107.1
T	herefore total impairment loss is (1,	,107.1-1	1,080)		27.1
А	llocation of CGU loss:				
	First to goodwill up to carryin Balance to PPE (27.1-2	-	unt of go	odwill	27.1
					27.1
T	herefore goodwill loss to recognise	(27.1	X70%)		19.0
vii)	Group retained earnings:				K'm
	A plc RE, given				1,100
	Share of subsidiaries post acq RE				
	B plc; 90% (380(w.viii)-260)				108
	60% (398-380(w.viii))				10.8
	C plc; 70% (396(w.ix)-200)				137.2
	80% (405-396(w.ix)				7.2
	FV depreciation:				
	B plc; (90% X28X7.25÷8+60)				(24.4)
	C plc; (70%X18X2.75÷3+80				(12.8)
	Reversal of proceeds of disposal	of hold	ing in B	plc	(300)
	Impairment losses:	253200	0()		
	Goodwill in B plc (70X60%+	·25X90	%)		(64.5)
	Goodwill in C plc	2/ )			(19)
	PPE in B plc (7X609	%)			(4.2)
	PPE and Patent in A plc	orte			(95)
	Revaluation gain on A plc's prop	-	$6 \cdot 100)$		336
	Cost model carrying amount ( FV at revaluation	(JJ0A9	0÷100)		335
	Whole gain is within cost mo	del com	wing am	ount	333
	Therefore the whole gain (w.i				18.3
	Group Retained Earnings at 31.12	2.2017			861.6
viii)	B plc RE and other reserves at 1.4	4.2017:	RE		other reserves
			Kľ		K'm
	Balances at 31.12.2017		398		212
	Less results for last 9 months 9/12	2X24	(18)	9/12X18	(13.5)
	······································	•			

	Balances at 1.4.2017	<u>380</u>		<u>198.5</u>
ix)	C plc RE and other reserves at 1.4.201	7: RE K'm		other reserves K'm
	Balances at 31.12.2017	405		335
	Less results for last 3 months 3/12 x 36	(9)	3/12 x 12	(3)
	Balances at 1.4.2017	<u>396</u>		<u>332</u>
x)	Group other reserves:			K'm
	A plc other reserves, given Share of subsidiaries post acq other res	oruge:		1,050
	B plc; 90% (198.5(w.viii)-190)	EI VES.		7.7
	60% (212-198.5(w.viii))			8.1
	C plc; 70% (332(w.ix)-100)			162.4
	80% (335-332(w.ix))			2.4
	Reversal of remeasurement gains on in As FVTOCI investments:	vestments	in subsidiarie	S
	FV (carrying amount in A plc's SF	P)	1,900	
	Less original cost (900+480+110)	,	(1,490)	(410)
	Net adjustment in equity on A plc	educing its	-	plc:
	Disposal proceeds	•	300	
	Net assets transferred to NCI (w.xi	,	<u>(323.4)</u>	(23.4)
	Net adjustment in equity onincreas Transfer from NCI (see NCI worki		g in C pic:	106.1
	Cost of additional holding	ng)	(110)	(3.9)
	Cost of additional holding		(110)	(3.7)
	Other Group reserves			<u>793.3</u>
xi)	Non-controlling interest in B plc:			K'm
	At acquisition			100
	Post acq changes upto 1.4.2017:			
	RE 10% (380(w.viii)-260)			12
	FV depreciation (10%X28X7.25÷8	5)		(2.5)
	Impairment losses: Goodwill in B plc (25X10%	6)		(2.5)
	Other reserves 10% (198.5(w.viii)	,		0.9
		,		
	NCI at 1.4.2017 before A plc's decreas		-	107.9
	Increase in NCI on A plc Reducing its	holding (w	(.X1)	323.4
	NCI at 1.4.2017 after A plc decrease in Post acq changes after 1.4.2017:	holding		431.3
	RE 40% (398-380(w.viii))			7.2
	FV depreciation (40%X28X0.75÷8	5)		(1.1)
	Impairment losses:			( <b>22</b> )
	Goodwill in B plc (70X40%	,		(28)
	PPE in B plc (7X4 Other reserves 40% (212-198.	,		(2.8) 5.4
	-4070 (212-190)	J(w.viii))		<u></u>

xii)	Increase in NCI in B plc on 1.4.2017 on A plc reducing its h	olding.
	B plc net assets at 1.4.2017:	K'm
	Identifiable:	
	Share capital plus reserves (420+380+198.5)998 Net FV gain (35-28X7.25/8)	9.6
	Goodwill carrying amount at 1.4.2017	1,008.1 70
		1,078.1
	Net assets transferred to NCI 1,078.1X30%	323.4
xiii)	NCI in C plc	
	At acquisition 30%X650	195
	Post acq changes before A plc increased its holding:	
	RE 30%(396(w.ix)-200)	58.8.
	FV depreciation (30%X18X2.75÷3)	(5.0)
	Other reserves 30%(332(w.ix)-100)	69.6
	NCI at 1.10.2017 before A plc increased holding	318.4
	Decrease in NCI on Aplc increasing holding 10/30X318.4	(106.1)
	NCI at 1.10.2017 just after increase in holding Post acq changes after A plc increased its holding:	212.3
	RE 20% (405-396(w.ix)	1.8
	FV depreciation (20%X18X0.25÷3)	(0.3)
	Other reserves 20% (335-332(w.ix))	0.6
	NCI in C plc at 31.12.2017	214.4

# SOLUTION TWO

#### Client 1 – Chala Plc

IAS 19'*Employee benefit*' prescribes the accounting treatment of pension schemes. The starting point is classification of the scheme as either defined contribution plan or defined benefit plan. Under a defined benefit plan the employer guarantees benefits that employees will receive when they leave employment while under a defined contribution the employer's obligation is limited to their contribution. The scheme introduced by Chala Plc is therefore a defined contribution one as the company's obligation is limited to their monthly contribution to the scheme. Thus the employer does not guarantee scheme's benefits to the employees.

In the year to 30 September 2017, Chala Plc will recognise an expense relating to the pension scheme amounting to K5,6250 (**W1**) in its statement of profit or loss. It will also recognise a current liability of K11,250 (**W1**) in its statement of financial position as at 30 September 2017.

#### Client 2 – Tusha Plc

The building should initially be recognised at a cost of K200,000 at 31 December 2016. This should be increased by the amount spent to make the building ready for its intended use. This will include borrowing cost as the building meets the definition of a qualifying asset in IAS 23'*Borrowing cost*'. IAS 23 states that a qualifying asset is that which takes substantial period of time to be ready for its intended use. The building was acquired in an incomplete state and will take 15 months to be ready for use. Since the construction works of the building are being financed from a general pool of loans, Tusha Plc has to calculate an interest capitalisation rate of 12.86% (**W2**) which reflects the weighted average interest cost of all the loans. This will result in interest amounting to K7.71 (**W2**) to be capitalised. The balance of total interest cost of K82,290 (90,000 – 7,710)W1 will be expensed to the statement of profit or loss for the year ended 30 September 2017 to the extent that it does not relate to other qualifying assets. In addition, actual cost incurred on the building of K60,000 should be capitalised. Therefore, the building will be shown in the statement of financial position as at 30 September 2017 under non-current assets at value of K267,710 (**W3**). The building must be classified as inventory

#### Client 3 – Mula Plc

The share based payment bonus introduced by Mula Plc is an equity settled transaction. This is because payment of bonus for services rendered by employees to the company will be entirely in form of equity shares. They should therefore be accounted for in the financial

statements of Mula Plc in accordance with IFRS 2'*Share based payments*'. IFRS 2 requires the cost of shares of equity settled transaction introduced by Mula Plc to be spread over the vesting period of three years. The bonus should be valued based on market value of equity shares at 1 July 2016, the grant date and the number of shares which are expected to vest. The cost of K179,400 (**W4**) will be taken to the statement of profit or loss for the year ended 30 September 2017 as an expense. While K224,250 (**W4**) will be shown under equity in the statement of financial position as at 30 September 2017.

#### Workings

W1	Pension Scheme	
		K'000
	Pension expense (15% x 600,000 x 25%x3/12)	5.625
	Pension liability (5.625x2)	11.25
W2	Loans	
		K'000
	Total loan amount (150,000+250,000+300,000)	700.00
	Rate = $(150 \times 20\%) + (250 \times 12\%) + (300 \times 10\%)$	12.86%
	700	
	Interest to Capitalise (60,000 x 12.86%)	7.72
	Total Interest= $(150x20\%) + (250x12\%) + (300x10\%)$	90.00
	10ta1  Interest = (130x20%) + (230x12%) + (300x10%)	90.00
<b>W3</b>	Building	
		K'000
	Cost at 31 December 2016	200.00
	Actual cost incurred	60.00
	Interest	7.72
	Total cost	267.72
W4	Equity settled transaction	
	Equity settled transaction	K'000
	Value of equity shares at 30 September:	
	2017 299 x 600 x K3 x 12/36 months	224.25
	2016 (300 - 1) x 600 x K3 x 3/36 months	44.85
		11.05
	Expense (224,250 - 44,850)	179.40

#### SOLUTION THREE

The directors of Mboo must consider a number of accounting standards in preparing financial statements for the year to 31 December 2017 in respect of the issues raised in the scenario as follows:

Issue of shares to Majula Premier Bank Plc:

The shares that were issued to Majula Premier Bank in the previous period were wrongly classified as equity. The shares exhibit characteristics of liabilities for two reasons; the shares are redeemable and they have preferential rights to distributions on a winding up. Mboo plc therefore has an obligation to transfer cash. Accordingly, IAS 32 Financial Instruments – Presentation would require these shares to be presented as a liability.

The financial statements for last year therefore contained an error with regard to accounting for the shares. IAS 8, Accounting policies, Changes in Accounting Estimates and Correction of Errors requires that prior period errors be corrected retrospectively. The correction must not only involve reclassifying the shares as a liability but also the measurement of the liability which was supposed to be reported. In general, in Accordance with IFRS 9 Financial Instruments, financial liabilities must be measured at amortised cost using the effective interest rate method. The following amounts are involved:

a) Original effective interest rate on the shares liability can be computed using the future sum formula,  $Sn=P(1+r)^n$  by making r subject of the formula, thus;

r= (Sn/P)^(1/n)-1 Sn=redemption cost= K10X1.75X2million shares=K35million P=net amount initially received=K10X1.1X2million shares less %=K21.56million n=term to maturity=5 years

Therefore,  $r = (35/21.56)^{(1/5)}-1=0.1018=10.18\%$  per annum

b) Amounts that Mboo should have reported in respect of the shares for the year to 31 December 2016:

	K´m
Initial liability on 1.1.2016	21.56
Finance costs at 10.18% X21.56	2.19

Carrying amount of liability at 31.12.2016

#### 23.75

Though the finance cost of K2.19 million is primarily charged as a period expense in P/L, IAS 23 Borrowing cost requires borrowing costs to be capitalised as part of the cost of qualifying assets where the borrowings financed qualifying assets. In that case, only borrowing costs accruing during periods when there are activities leading to acquisition of qualifying assets are capitalised. The shares were issued to construct a factory. During the year to 31 December 2016, there was construction activity in six months (ie from 1 April to 30 september). Therefore, of the total finance cost of K2.19 million, K1.1 million should have been capitalised by adding to the cost of the factory (ie 6/12X2.19).

c) Amounts that Mboo plc should report in respect of the shares for the year to 31 December 2017.

To correct wrong accounting for the shares in the year to 31 December 2016 at 1 January 2017 are as follows:

Dr Share Capital (2 million shares at K10 nominal value each) Dr Share Premium (21.56-20) Dr PPE (factory) Dr Retained Earnings (finance cost to charge in p/l, 2.19 less1.1)	K <sup>2</sup> m 20 1.56 1.1 1.09
	23.75
Cr K10 Shares liability	23.75
Subsequently, the shares liability will be measured as follows: Opening liability at 1.1.2017 Finance cost for the year to 31.12.2017 23.75X10.18%	K'm 23.75 2.42
Shares liability at 31.12.2017	26.17

Of the total finance cost, K1.82 million will be capitalised (accrued in the first 9 months when there are activities to construct the factory, i.e.  $2.42 \times 9/12$ ). The remainder of K0.6 million must be charged in P/L for the year.

The shares liability of K26.17 million at 31.12.2017 must be presented within noncurrent liabilities in the SFP.

Income from temporal investment of proceeds from issue of shares:

Where borrowed funds are meant for acquisition of a qualifying asset but temporarily invested, IAS 23 requires that any income from the temporal investment be credited against the cost of the qualifying asset to offset the capitalised borrowing cost. However, with accruals accounting in mind, only the income arising in periods when there are activities leading to acquisition of the asset must be capitalised. The whole income of K0.64 million was credited to P/L for the year to 31.12.2016. Income amounting to K0.32 million (i.e.

6/12X0.64) should have been credited to the cost of the factory. At 1.1.2017, a correction must be made as follows:

	K'm
Dr Retained earnings	0.32
Cr PPE (factory)	0.32

Factory:

In accordance with IAS 16, the factory must initially be measured at cost. In this case, cost will include construction cost, borrowing costs capitalised less income from temporal investment of borrowed funds and the decommissioning costs that are committed at the time of acquiring the factory. Subsequently, this cost must be depreciated over the 10 years useful economic life of the factory. Amounts to report in Mboo plc's financial statements for the period to 31 December 2017 are therefore as follows:

Cost upon completion on 1 October 2017: Construction cost		K'm 25
Finance costs capitalised Income from temporal investment	(1.1+1.82)	2.92 (0.32)
Dismantling provision (see below)	(31.125X1.1^-10)	12.0
Total cost		39.6
Less depreciation in last 3 months of y/e 31	.12.2017(39.6/10X3/12) (0.99)	
Carrying amount of the factory to report in 2	PPE in the SFP at 31.12.2017	38.61

Depreciation of K0.99 million must be charged as an operating expense in P/L for the y/e 31.12.2017.

Costs of dismantling the factory and rectifying effects of pollution to environment:

In accordance with IAS 37 Provisions and Contingent Assets and Liabilities, Mboo must recognise provisions liabilities to the extent that there is an existing obligation, it is probable that economic benefits will be transferred and the amounts can be reliably measured. There is a legal obligation in respect of dismantling the factory and restoring the land. Though there is no legal obligation in respect of the cost of rectifying the damage arising from environmental pollution, Mboo's environmental policy creates a constructive obligation. The dismantling cost must be recognised as a liability (provision) in full upon acquisition of the factory as it is committed at that point. The cost of rectifying the pollution must be accrued over the factory's useful life as it arises through usage of the factory. In both cases, amounts must be discounted. The following amounts will affect Mboo's financial statements in respect of the dismantling and rectification costs:

K'm

	IX III
Dismantling provision recognised and capitalised at 1.10.2017	12.0
Increase in provision to charge in P/L for y/e 31.12.2017 (balance)	0.39

Provision to report in the SFP at 31.12.2017

#### **SOLUTION FOUR**

## a) Accounting for leases under IFRS 16'Leases' Accounting by lessee

Upon lease commencement a lessee recognises a right-of-use asset and a lease liability. The right-of-use asset is initially measured at the amount of the lease liability plus any initial direct costs incurred by the lessee. Adjustments may also be required for lease incentives, payments at or prior to commencement and restoration obligations or similar obligations.

After commencement of lease, of a lessee shall measure the right-of-use asset using a cost model, unless:

- i) the right-of-use asset is an investment property and the lessee recognises its investment property at fair value under IAS 40; or
- ii) the right-of-use asset relates to a class of PPE to which the lessee applies IAS 16's revaluation model, in which case all right-of-use assets relating to that class of PPE can be revalued.

Under the cost model a right-of-use asset is measured at cost less accumulated depreciation and accumulated impairment.

The lease liability is initially measured at the present value of the lease payments payable over the lease term, discounted at the rate implicit in the lease if that can be readily determined. If that rate cannot be readily determined, the lessee shall use their incremental borrowing rate.

Variable lease payments that depend on an index or a rate are included in the initial measurement of the lease liability and are initially measured using the index or rate as at the commencement date. Amounts expected to be payable by the lessee under residual value guarantees are also included.

Variable lease payments that are not included in the measurement of the lease liability are recognised in profit or loss in the period in which the event or condition that triggers payment occurs, unless the costs are included in the carrying amount of another asset under another Standard.

The lease liability is subsequently re-measured to reflect changes in:

- the lease term (using a revised discount rate);
- the assessment of a purchase option (using a revised discount rate);
- the amounts expected to be payable under residual value guarantees (using an unchanged discount rate); or
- future lease payments resulting from a change in an index or a rate used to determine those payments (using an unchanged discount rate).

The re-measurements are treated as adjustments to the right-of-use asset.

Lease modifications may also prompt re-measurement of the lease liability unless they are to be treated as separate leases.

## Accounting by lessor

Lessors shall classify each lease as an operating lease or a finance lease.

A lease is classified as a finance lease if it transfers substantially all the risks and rewards incidental to ownership of an underlying asset. Otherwise a lease is classified as an operating lease.

Upon commencement of the lease, a lessor shall recognise assets held under a finance lease as a receivable at an amount equal to the net investment in the lease.

A lessor recognises finance income over the lease term of a finance lease, based on a pattern reflecting a constant periodic rate of return on the net investment.

At the date of commencement, a manufacturer or dealer lessor recognises selling profit or loss in accordance with its policy for outright sales to which IFRS 15 applies.

A lessor recognises operating lease payments as income on a straight-line basis or, if more representative of the pattern in which benefit from use of the underlying asset is diminished, another systematic basis.

# Conclusion

IFRS 16 specifies how an entity will recognise, measure, present and disclose leases. The standard provides a single lessee accounting model, requiring lessees to recognise assets and liabilities for all leases unless the lease term is 12 months or less or the underlying asset has a low value. Lessors continue to classify leases as operating or finance, with IFRS 16's approach to lessor accounting substantially unchanged from its predecessor, IAS 17.

# b) Appropriateness of proposed accounting policy

IAS 8 'Accounting Policies, Changes in Accounting Estimates and Errors' is applied in selecting and applying accounting policies, accounting for changes in estimates and reflecting corrections of prior period errors. The standard requires compliance with any specific IFRS applying to a transaction, event or condition, and provides guidance on developing accounting policies for other items that result in relevant and reliable information. However, Santa Enterprises is allowed to use judgement where a transaction, event or condition is not adequately covered by accounting standards or where it feels that full compliance to a particular accounting standard will make the financial statements so

misleading that it would conflict with the objective of financial statements set out in the Framework.

# Inventories

The fundamental principle of IAS 2 '*Inventories*' is that inventories should be carried at the lower of cost or net realisable value. Thus carrying inventories only at cost may be in conflict with fundamental principle. However, if the directors strongly believe that the goods that Santa Enterprise will be dealing in will always have a higher net realisable value, then the policy may not negatively affect valuation of inventories. Further, the policy may be acceptable if the goods will only be supplied by Santa Enterprises; that is if the company will be a monopoly. In that case the company will always be assured of selling above its cost.

# Intangible

Amortisation of intangible assets over their useful lives should reflect the pattern in which economic benefits are expected to be enjoyed by Santa Enterprises though straight line method is a default. Moreover, classification of intangible assets into indefinite life and finite life will determine whether the asset is subject to amortisation. If Santa Enterprises classifies its intangible assets as indefinite life then no amortisation will be required. However, if they are classified as finite life then they will need to amortise them. Thus the policy will only be in conformity with the provisions of IAS 38'*Intangible assets*' when Santa Enterprises will only have intangible assets classified as indefinite life, in which case the impairment reviews must be done annually.

# **Change in depreciation**

IAS 8'Accounting Policies, Changes in Accounting Estimates and Errors' states that changes in accounting policies and corrections of errors are generally retrospectively accounted for, whereas changes in accounting estimates are generally accounted for on a prospective basis. The change in depreciation rate refers to a change in accounting estimate. It should therefore be accounted for prospectively. If on the other hand Santa Enterprises forgot to charge depreciation in the financial statements of prior period, then that error would be accounted for retrospectively.

## SOLUTION FIVE

#### Report

To:	Investor
From:	Financial Analyst
Date:	Exam date
Subject:	Financial Analysis of Mubita plc – Year to 31 December 2017

#### 1. Introduction

This report analyses the financial performance and financial position of Mubita plc for the financial year to 31 December 2017 aimed at helping your decision on whether to invest in the company or not. The discussion is primarily based on financial ratio analysis. A recommendation of your course of action is included, based on the available financial information. Further, information that would be sought to assist in decision making is also highlighted.

#### 2. Financial Performance

Turnover has increased 10% since 2016 although this is at the expense of a drop in the gross margin earned which has fallen from 35.0% to 32.7% which has resulted in only a marginal increase in the absolute value of gross profit. The decline in gross margin could be due to a changing sales mix or to a higher cost of sales or a reduction in prices to boost sales. Mubita plc has managed to control administrative expenses which have actually fallen. Distribution costs have increased by 10%, which is in line with revenue.

The net profit margin has dropped from 3.2% to 1.8%. This is mainly as a result of the decrease in the gross margin but is also affected by the increase in finance costs and the losses generated by the associate. Mubita has taken on short term borrowings and this has increased finance costs. The average rate of lending has also increased from 8.6% to 11.0%. This could be the result of the short term borrowings being more costly than the term loan or it could be that the short term borrowings were significantly higher during

the year – which is potentially more concerning. Either way, the entity has low gearing and should look to secure more long term funding rather than relying on a short term facility.

The return on capital employed has fallen from 6.7% to 6.0% due to falling returns and the revaluation and investment in PPE. The increase in PPE may not yet have generated returns, however the revaluation has improved total comprehensive income which otherwise would have been significantly lower than 2016. It would be worthwhile checking whether the revaluation in accordance with a usual policy to revalue properties in line with IAS 16 Property Plant and Equipment or a deliberate attempt to boost total comprehensive income as on the face of it the business seems to be hitting a downturn.

## 3. Financial position

Working capital appears to be an area of concern. Inventories days have increased from 118 to 168 days. Given that Mubita plc operates in the retail sector, having inventories in stock for another 50 days is likely to be problematic. If this movement was in isolation it could indicate that Mubita plc was stock piling some inventory items to meet expected future demand, however given that there are other signs of overtrading this is more likely to be an unfavourable movement.

The increase in payables indicates that Mubita is using trade payables as a means of funding working capital. It is collecting receivable amounts at the same rate, which is what would be expected for an entity in the retail sector, but payables are being settled 43 days later than in 2016, an indication of a risk of default and insolvency.

The current ratio, although reduced from 2016 is at 1.3, however the removal of the inventories highlights the cash crisis that Mubita is facing. The quick ratio has fallen to 0.5 and Mubita must seek additional funding immediately.

The gearing of Mubita indicates a relatively low risk entity with gearing of 26.7%, however the fall in the interest cover from 4.0 to 2.5 would be a concern for any lender. Mubita is potentially paying more for the short-term borrowings and there is the added risk that these amounts are likely to be repayable on demand. It would be essential for the entity to secure long-term finance to ensure it can trade for the foreseeable future. If higher returns were expected from trading activities this would help the interest cover. In addition, possibly selling the associate investment could generate some cash, although this may not be lucrative given it is currently loss-making.

4. Future Prospects

Based on the latest share price, the P/E ratio of Mubita is 5.4, a slight reduction from the P/E of twelve months ago which was 5.7. The share price has fallen by 40% over the

same period which indicates that the stock market has reacted to the decline in profitability, resulting in overall stagnation in the P/E ratio.

5. Further Information

Details of the held for sale assets and details of the items being sold to determine if this is the result of a change in trading focus or an attempt to raise cash.

The details of the long-term financing and the state of relationships with current lenders may help assess the likelihood of securing additional funding in a short timescale.

Details of the dividend policy and history of dividend pay-out to assess future expected returns.

Details of the associate company to establish if the associate has had a one-off expense creating a loss or is in a downturn and likely to continue loss-making.

The forecasts for future trading would help assess the directors' expectations for the forthcoming period.

Information on the possible economic environments of in which the subsidiaries operate would assist in understanding the associated risks and make investment decisions to be made more informed.

6. Recommendation

Based on the financial information presented and the analysis above I would recommend not investing until further investigation is conducted. The business has a cash and working capital crisis which the directors must commit to resolving immediately to ensure the business can continue as a going concern.

# **END OF SOLUTIONS**



# CA ZAMBIA PROGRAMME EXAMINATIONS

# ADVISORY LEVEL

# CA 3.2: ADVANCED AUDIT AND ASSURANCE

# THURSDAY 14 DECEMBER 2017

TOTAL MARKS - 100; TIME ALLOWED: THREE (3) HOURS

# **INSTRUCTIONS TO CANDIDATES**

- 1. You have fifteen (15) minutes reading time. Use it to study the examination paper carefully so that you understand what to do in each question. You will be told when to start writing.
- This paper is divided into TWO sections: Section A: One (1) Compulsory scenario question. Section B: Four (4) Optional Questions. Attempt any Three (3) questions.
- 3. Enter your student number and your National Registration Card number on the front of the answer booklet. Your name must **NOT** appear anywhere on your answer booklet.
- 4. Do **NOT** write in pencil (except for graphs and diagrams).
- 5. **Cell Phones** are **NOT** allowed in the Examination Room.

- 6. The marks shown against the requirement(s) for each question should be taken as an indication of the expected length and depth of the answer.
- 7. All workings must be done in the answer booklet.
- 8. Present legible and tidy work.
- 9. Graph paper (if required) is provided at the end of the answer booklet.

## **SECTION A**

# This question is compulsory and must be attempted.

## **QUESTION ONE**

You have been assigned as audit manager for the audit of Sparrow Airlines and this will be the first year that your firm will audit Sparrow Airlines. The company was previously audited by Burton & Associates a firm of Chartered Accountants.

In response to the increased workload arising from an increase in the client base, your firm recently opened another office. A number of staff changes have been made so that at the new office there is a mixture of staff who have been working for the firm and newly recruited staff. A number of audit seniors have been recruited from two audit clients of your firm and they will be part of the audit teams that will be assigned to audit these clients.

As part of the process of improving quality control procedures in your firm, it has been decided that an audit handbook which will be used by all staff for reference should be prepared.

The reason for Sparrow Airlines not renewing the services of the previous auditors was a disagreement that arose on the estimate of the liability arising from litigation by a passenger who sued the airline for alleged food poisoning. The airline was of the view that there was no need to provide for possible compensation because in its view, the chances of the litigant succeeding were minimal. The Chief Executive Officer of Sparrow Airlines verbally told the Audit Manager of the previous auditors that he would recommend a termination of the audit engagement if the auditors did not agree with management's stance of not providing for a potential liability arising from the legal case. The case has not been concluded as at the end of the current year.

You are about to commence the audit for the year ended 31 December 2016.

Sparrow Airlines is registered in the United Kingdom and is the only airline offering direct flights between London and Lusaka. The airline industry is highly regulated and the company has enjoyed this monopoly for many years.

Sparrow contracted a Zambian based catering company, Best Foods, to provide all its inflight food requirements. This company was established solely to service the requirements of the Sparrow Airlines.

The agreement between the airline and the catering company is that only organically grown vegetables and fruits should be supplied. As required by the airline, Best Foods employed a qualified nutrition quality control expert to ensure that only organic vegetables and fruits are supplied as well as to ensure that the company meets the minimum quality control expectations of the airline. During the year under review, the nutritionist quit his job and Best Foods recruited a recently qualified graduate to replace him.

The airline maintains a wide range of aeroplane spares in Lusaka and has a ground engineer who services the planes as need arises. There is only a rudimentary inventory system used and the engineer is responsible for the inventory maintained and he conducts an inventory count at the period end and informs the finance department of the inventory held.

Another airline has recently introduced flights between London and Lusaka via Kenya at a cost of almost half the cost of direct flights offered by Sparrow Airlines. This has resulted in a reduction in passengers compelling the airline to come up with cost saving measures. One of the measures the airline has taken is to terminate the food supply contract with the Zambian Caterer before the end of the five year period agreed in the contract and has opted to use a UK based caterer who is much cheaper.

As a result of a reduced passenger load, the airline is experiencing cash flow problems and is in arrears in meeting its financial obligations in terms of landing fees at the International Airport and also in paying of its statutory obligations of taxes and employee and employer NAPSA contributions. Two years ago, the airline decided to outsource the services of its crew including the captains and cabin staff. In the current year a number of cabin staff and two experienced pilots have left for greener pastures.

The airline recently upgraded its information systems and acquired a new accounting package which will be used in the preparation of the financial statements for the first time in the year under review. The Head Office seconded an IT expert for a period of three months to come and oversee the transition from the old to the new accounting system and by the time of the audit he will have left.

A review of the draft financial statements shows an increase in the receivables days arising from an effort to boost revenue of the airline so that credit has been extended to customers previously required to pay cash up front. The oil company that supplies jet fuel to the airline has stopped giving the airline credit and demands that the airline pays upfront before they supply the fuel.

# **Required:**

Using the information in the scenario:

(a)

(i) Write brief notes which will form the preamble to the handbook on why ethical matters are considered important and must be followed by all staff on an audit assignment.
 (4 marks)

30

(ii) Explain what is meant by intimidation as a threat to the independence of the auditor, clearly explaining how it threatens the independence of the auditor.

(4 marks)

(iii) Discuss why recent service with an audit client poses a threat to the independence of the auditor and recommend an appropriate safeguard to manage the threat.

(6 marks)

- (i) Explain the risk of material misstatement that may arise in the audit of Sparrow Airlines arising from the fact that the prior year financial statements were audited by a different auditor. (2 marks)
- (ii) Suggest four (4) audit procedures that should be undertaken on the opening balances in the audit of the current year's financial statements. (4 marks)
- (iii) Identify and explain ten (10) business risks faced by Sparrow Airlines.

(10 marks)

(iv) Identify and explain six (6) risks of material misstatements that your firm should consider at the planning stage of the audit. (10 marks)

[Total: 40 Marks]

## (b)

## **SECTION B**

#### Attempt any THREE (3) questions in this section.

#### **QUESTION TWO**

You are a Partner in your firm of Chartered Accountants. Your firm has recently been appointed auditor of Diamond Ltd. Diamond Ltd terminated the audit services of the predecessor auditor before the end of the contract.

The major shareholder of Diamond Ltd is a senior government official who makes all major decisions. This official is not involved in the day to day management of the company. The Chief Executive is one of the other shareholders who has minority shares.

Your investigations have revealed that the company has changed auditors three times in the last five years. You establish that the major cause of the changes in audit firms is disagreement with the major shareholder on the accounting treatment of development costs on research that the company is involved in.

The former auditors were in the planning stage of the audit for the current year and you have been requested to take over the audit and your firm is expected to complete the audit in a month's time. Your firm has three other clients with the same year end as this client.

Your firm has been promised a large audit assignment of a large semi government company if it accepts to be auditor of this client.

The following information has been extracted from the financial statements of Diamond Ltd.

1. An impairment review in line with the provisions of IAS 36 *Impairment of assets* was carried out during the year on certain equipment.

Below are the results of the impairment review:

The asset is included in the draft statement of financial statements at: K350,000 The present value of the future cash flows from continuing to use the

asset are:	K320,000
The asset could be sold for:	K275,000
An impairment loss for the current period:	К 75,000

2. The company acquired another company during the year. The consideration included a cash amount of K2.5m and a contingent payment of K1.2m which is payable in five years' time. Goodwill arising on consolidation has been calculated using the fair value method and amounts to K250 000.

Being the parent company's auditors, your firm has also been appointed group auditors to audit the group consolidated financial statements.

# **Required:**

(a) Discuss the matters your firm will consider before accepting the offer to be auditor.

(6 marks)

(b) Explain what is meant by impairment of assets and discuss the risk that the auditor faces in the audit of impairment of assets in the financial statements of Diamond Ltd.
 (3)

marks)

- (c) Design the audit procedures that should be performed in the audit of the impairment exercise done by Diamond Ltd. (4 marks)
- (d) Discuss the risk of material misstatement relating to the figure for goodwill arising on consolidation and suggest the audit procedures that should be carried out.

(7 marks) [Total: 20 Marks]

# **QUESTION THREE**

Luangwa Ltd is one of the audit clients of your firm of Chartered Accountants. The year-end of Luangwa Ltd is 31 March 2016.

The date today is 15 May 2016 and the audit is in progress. A review of the draft statement of financial position shows a figure of K4.906m described as a restructuring provision and another figure of K2.5m described as a general provision.

The company has been going through financial problems and the board has approved the scaling down of activities by closing down one line of production which employs 30 employees. The Human Resources department has already prepared a detailed plan for the restructuring.

The affected employees have been informed in the current year and negotiations for separation packages are in progress.

The financial statements contain a figure of K3.5m recorded under tangible non-current assets being the value of the trucks bought under a finance lease agreement which was entered into with Leasing Financing Plc.

You are the audit manager for the audit of Luangwa Ltd and this is the first year that you are on this assignment. The Chief Executive Officer has expressed concern to you that in the previous two years your firm has not discussed the audit report before finalizing it. He has informed you that the audit opinion in respect of the financial statements for the year ended 31 March 2014 was modified by the inclusion of an Emphasis of Matter paragraph, while the audit opinion in respect of the financial statements for the year ended 31 March 2015 was modified by the inclusion of an Other Matter paragraph. He has indicated that the Directors are worried that the shareholders will take them to task because of these modifications.

# **Required:**

(a) Discuss the audit evidence you expect to find in the audit of:

(i)	The restructuring provision.	(5 marks)
(ii)	The general provision.	(3 marks)
(iii)	The finance Lease assets.	(4 marks)

- (b) Discuss why it is appropriate that the audit opinion is discussed with management and those charged with governance before signing the audit report. (3 marks)
- (c) Evaluate the CEO's concern that your firm has issued modified opinions on the financial statements for the previous two years. (5 marks)

[Total: 20 Mark]

# **QUESTION FOUR**

The audit of one of your audit clients is almost getting to the end. The client has presented to you the adjusted draft financial statements for your review before taking them for printing.

You have given one of the audit assistants to review the final draft financial statements. He informs you that side by side with the current year figures, there are also previous year's figures for all the transactions and account balances. He does not understand why this should be the case when these figures have not been subject to audit in the current year.

The engagement partner is also working on the audit report. He has indicated that before he can finalize the report, he needs to be given the Key Audit Matters that should be included in the Key Audit Matters Paragraph of the report. He is aware that the guidance on Key Audit Matters was only recently issued and so a majority of the staff does not understand the provisions of ISA 701 *Communicating Key Audit Matters in the Independent Auditor's Report.* 

He would like to call for a brief meeting with all the audit team members on this assignment so that the provisions of ISA 701 are explained to them to enable them suggest matters that should be included.

# **Required:**

- (a) Distinguish between corresponding figures and comparative financial statements in a set of financial statements. (4 marks)
- (b) Discuss, for the benefit of the audit assistant, the responsibilities of your firm with regards the corresponding figures contained in the financial statements. (6 marks)
- (c) Discuss the use of the recently introduced Key Audit Matters (KAM) paragraph, in the auditor's report and its effect on the audit opinion.

(6 marks)

(d) Discuss the relationship between the Key Audit Matters paragraph and the Emphasis of Matter and Other Matter paragraphs. (4 marks)

[Total: 20 Marks]

# **QUESTION FIVE**

Rex & Co is a firm of Chartered Accountants. It offers audit services and consultancy to a range of clients. You have recently been employed as a Quality Control Manager in Rex & Co.

The following information relates to two clients of Rex & Co.

# Kasompe Ltd:

Kasompe Ltd was until recently privately owned by the Patel family which has successfully run the company since pre-independence days. The Chairman Mr. Patel has grown old and has decided to have the company listed so that he sells his majority shareholding and does not wish to put in so much effort in the running of the business due to old age.

The company's shares were successfully floated on the Lusaka Stock Exchange (LuSE). You are a Chartered Accountant and the senior consultant in Success Consultancy. Mr. Patel has come to you for advice concerning the fact that the company's financial statements will now be subject to statutory audits annually.

He does not understand why the company will now be required to pay K1.5m annually in audit fees when he managed to run the company profitably with only rudimentary financial records being maintained over the last five decades.

#### Baobab Ltd:

You recently embarked on a review of three audits that were undertaken by one of the three offices of your firm.

The following information has been extracted from the report by Chanda, the Audit Assistant you assigned to review the working papers of Baobab Ltd, one of the three assignments under review.

The audit team comprised an engagement partner, an audit manager, an audit senior and two audit assistants. There is evidence that the team faced undue pressure from the client because the client insisted that the audit must be completed within a period of four weeks.

During the period that this audit was carried out, your firm also had two other large audit engagements being undertaken. Due to a shortage of staff, the audit manager and the audit senior spent most of their time working on the other assignments. On a few occasions, the audit senior spent a few hours per day at Baobab Ltd's premises to check on what the two assistants were doing.

Of the two audit assistants, assigned to the audit of Baobab Ltd, one was a new recruit who recently completed his studies. The other assistant has been working for the firm for six years but this was the first time that he was working with minimum supervision. He was also carrying out substantive audit procedures on account balances for the first time. He has previously performed tests on transactions only. He relied heavily on previous year working papers and a review of the previous year working papers indicate that most of the schedules are missing and could not be found.

There is evidence that the audit senior reviewed the working papers a day before he presented the files to the audit manager going by the date of review indicated. There is no evidence of the review points made.

The only evidence of review by the audit manager is his signature on the lead schedules under each account heading. There are other working papers evidencing the work that was done on the figures on the lead schedules.

As expected the engagement partner conducts a high level review and relies heavily on the reviews conducted by the audit senior and the audit manager. The audit was completed on time per client's expectation and an unmodified audit opinion was issued.

# **Required:**

- (a) Advise Mr. Patel on the need for Kasompe Plc to have its financial statements audited by external auditors. (6 marks)
- (b) Evaluate the reliability of the audit evidence gathered during the audit of Baobab Ltd and state the importance to a firm of documenting all work that is carried out.

(6 marks)

(c) Evaluate the quality control procedures in the audit of Baobab Ltd by Rex & Co.

(8 marks) [Total: 20 Marks]

#### **END OF PAPER**

# CA3.2: ADVANCED AUDIT AND ASSURANCE SOLUTIONS SOLUTION ONE

#### a) i. Importance of ethical matters:

The work of accountants is relied upon by many stakeholders and the public at large. This is because accountants are viewed as experts in the accounting field. The reason why the profession has come up with ethical guidelines is because of public interest.

It is important to understand that the responsibility of the professional accountant is not only to satisfy the needs of the employer or a client.

The Code of Ethics for Professional Accountants sets out the fundamental principles which must be observed by all accountants whether members or students.

#### Why audit team members should comply with ethical matters:

The audit team has a duty to gather evidence and conclude appropriately in the performance of an audit. For the team to do this they need to be compliant with regards ethics.

#### ii. Intimidation as a threat to the independence of the auditor:

Intimidation is one of the threats to the independence of the auditor. If the independence of the auditor is threatened then the auditor will not be objective in the performance of his work.

Intimidation can be real or perceived. Real intimidation occurs where the audit team or a member of the audit team is threatened such as when the client threatens not to reappoint the auditor if he disagrees with him on a certain matter. The statement made by the Chief Executive Officer of Sparrow Airlines is an example of real intimidation. By suggesting that the engagement will be terminated unless the auditors comply with management's view impairs the independence of the auditor.

Intimidation may be perceived where the firm or team member feels intimidated when there is no action on the part of the client considered intimidatory. For example newly recruited staff with little auditing experience may feel intimidated more than those who have auditing work experience.

#### How intimidation threatens auditor independence:

When one is intimidated they tend not to freely and objectively perform their work. They will tend to act in the interest of the one intimidating them as they are afraid of the repercussions of not complying.

In the context of audits, intimidation limits the independence of the auditor and hence his objectivity. There is a risk that inappropriate audit conclusions will be reached arising from the intimidation the firm or audit team members face.

#### iii. Recent service with an audit client:

If an audit team member was previously employed by the client and then is assigned to conduct an audit of their former employer, this gives rise to selfreview as well as familiarity threats.

This is the situation in the case in the question where newly recruited seniors have been assigned to go and audit their former employers.

In the first situation there will be a self-review threat depending on the position that was held by the audit seniors. It is most likely that they will be auditing systems and transactions that they were involved in generating. It is unlikely that the audit seniors will be objective in making decisions.

Further, there is a familiarity threat as the audit seniors will be familiar with the staff at their former employers. Again this relationship will result in the audit seniors not being objective when performing the audit.

#### Safeguard:

The newly recruited seniors should not be assigned to audit the financial statements of their former employers. The old seniors should instead be assigned these audits.

#### b) Risk of prior year financial statements audited by different auditor:

#### i. Opening balances audited by a different auditor:

Opening balances brought forward from the previous year have an effect on the current year financial statements. If they are misstated then the current year figures will be misstated. ISA 510 *Initial Audit Engagements – Opening Balances* provides guidance on opening balances.

The risk that the auditor faces when the previous year financial statements were audited by another auditor is that they could be misstated as well as wrongly carried forward to the current year.

The auditor, therefore, performs audit procedures on the opening balances to obtain sufficient appropriate audit evidence about whether the opening balances contain misstatements that materially affect the current period financial statements.

#### ii. Audit procedures on opening balances:

- 1. Verify that the opening balances have been correctly brought forward to the current year by following up from previous year working papers by the former auditors.
- 2. Confirm and verify that the opening balances reflect the application of appropriate accounting policies.
- 3. Where necessary review the predecessor working papers to obtain evidence regarding the opening balances.
- 4. Evaluate where possible current year evidence which provides evidence that is relevant to the opening balances. For example examining current year receipts and payments which may provide evidence of opening balances.

#### iii. Business risks faced by Sparrow Airlines:

- 1. There is a risk of disagreement with management in view of the reason the outgoing auditors were not retained. This brings into question the integrity of management.
- 2. The legal case of suspected food poisoning has implications with regards damages payable and hence provisions in the financial statements.
- 3. Sparrow Airlines is in an industry that is highly regulated both locally and internationally. There is a risk of non-compliance with regulations.
- 4. There is a risk that non organic foods would be supplied to the airline which has the potential to keep away passengers if this is found out.
- 5. The sudden resignation of the Nutritionist and employing a newly qualified nutritionist may lead in non-organic foods' being supplied which has the potential to displease customers and lead to loss of business.
- 6. The inventory of spares is under the responsibility of the ground engineer and there is only a rudimentary inventory control system. There is a risk

that inventory count may not be relied upon as a basis for determining inventory of spares at the year end.

- 7. The introduction of cheap alternative route through Kenya could result in loss of business for Sparrow Airlines making it increasingly uneconomical to operate the London to Lusaka route.
- 8. Increased fuel prices coupled with the competition may make it expensive to operate the direct flights between London and Lusaka. This could result in Sparrow operating at a loss.
- 9. The breach of the contract with the food supplier before the end of the contract could result into legal action being taken against Sparrow Airline.
- 10. Failure to pay taxes and Napsa contributions is a breach of legal requirements which could have consequences with regards the going concern of the airline.
- 11. The newly introduced IT system may fail with the departure of the IT expert who was seconded to Sparrow Airlines. The system may not be relied upon in the preparation of financial statements of Sparrow Airlines.
- 12. Extended credit offered for the simple reason of retaining customers will have cash flow consequences to the airline as well as an increase in irrecoverable debts.
- 13. The nature of the business is that there is a high risk of accidents which could result in huge compensation payments. Insurance premiums may also be very high arising from the high risk facing the airline.
- 14. The resignation of some pilots and cabin crew staff could have far reaching consequences in terms of service delivery by Sparrow Airlines. This may result in operational difficulties which could result into flight cancellations at a huge cost to the Airline.

#### iv. Risks of material misstatements:

- 1. There is a risk that provisions arising from food poisoning legal case could be misstated.
- 2. The risk of non-complying with regulations in the industry as well as the non-remittance or taxes and Napsa contribution could result in provisions being misstated and could also have going concern implications.
- 3. Risk that inventory may not be determined reliably could result in inventory figure being misstated.
- 4. The competition on the Kenya route can have an impact on the business of Sparrow Airline which in turn may have going concern implications.
- 5. The use of a new IT system without the necessary back up could result in unreliable financial statements being prepared.
- 6. Extended credit with a view to retain passengers may result in an increase in uncollectable debts and hence a misstatement in provision for receivables.
- 7. There is a risk that provisions for breach of contract with the catering company could be misstated.

- 8. Insurance cover may be understated resulting in the company taking high risk in the event of an accident and this could have serious going concern implications.
- 9. In a situation when assets have been impaired, there is a risk that impairment review may not be carried out by management resulting in a misstatement of the assets concerned.

#### **SOLUTION TWO:**

#### a) Matters to consider before accepting appointment:

The facts in the question suggest that the firm is dealing with a politically exposed person (PEP).

Great care should be taken by the firm when dealing with such people who may have a lot of influence in government and may do things that are unethical. The auditor should be alert on the business dealings with politically exposed persons.

To establish a relationship with a company owned by a politically exposed person the firm should at a senior level evaluate the relationship and such relationship should approved at this high level.

Among the matters that should be considered before acceptance in this case will the following:

- 1. What is the source of the wealth of this individual?
- 2. His integrity is put into question arising from the fact that the termination of the previous auditors which appears suspicious going by the number of auditor changes in the previous five years.
- 3. The reason for terminating the last auditors' engagement was disagreement on accounting treatment of development costs the likelihood that our firm will face a similar situation where there will be a disagreement is high.
- 4. The timeframe within which the audit is expected to be completed should be reviewed. The firm should have an understanding of the work required and conclude whether or not it can be concluded within the month that is expected.
- 5. The promise to get a large audit job of a semi government company suggests that this person has a lot of influence in government and also may be offering this so that our firm compromises in the performance of the audit for his company.

#### Advise on course of action:

All the facts considered with regards to this company and the politically exposed person means it will be too risky for the firm to accept appointment as auditor of this company.

The firm should decline the offer and should find an appropriate way of doing this without harming the prospects of the firm getting future jobs.

#### b) Impairment:

An asset is impaired when the carrying amount in the financial statements is greater than the recoverable amount. The recoverable amount being the higher of the fair value less costs to sell and the value in use.

The risk that the auditor faces is that the impairment calculations could be incorrectly done. IAS 36 *Impairment of assets* gives guidance to the preparers of financial statements on impairment.

In the situation in the question the asset will be tested for impairment as follows:

Carrying value of the asset	K350 000
The higher of:	
Value in use	320 000
Fair value being amount to sell	275 000
The higher of the two	320 000
Impairment loss	K 30 000

Clearly the calculation by the client is incorrect as they have taken the lower rather than the higher of the two.

#### c) Audit procedures for asset tested for impairment:

- 1. Re-perform the calculations for the impairment loss carried out by the client for accuracy.
- 2. Confirm the carrying amount in the calculation to the accounting records of the client.
- 3. Evaluate the assumptions used to determine the fair value.
- 4. Review the assumptions made on the estimated future cash flows and recomputed the discounting calculations.
- 5. Confirm correct accounting or the impairment amount i.e. income statement or revaluation surplus.
- 6. Confirm that appropriate impairment disclosures have been made in the notes to the financial statements.

#### d) Risk of material misstatement of goodwill arising on consolidation:

Goodwill arising on consolidation arises when there is a combination of businesses arising when one the parent company acquires a controlling interest in the other (the acquiree or subsidiary.)

The goodwill that arises is purchased goodwill and is an intangible non-current asset. There is a risk that this figure could be materially misstated and this could arise from wrong calculations being used.

Further, there is a risk that any goodwill computed may not be tested for impairment as required by IAS 38.

#### Audit procedures – goodwill arising on consolidation:

- 1. Verify the purchase consideration with the sale agreement.
- 2. Recalculate the computation of goodwill arising on consolidation.
- 3. Verify the purchase amount paid to the cash book.
- 4. Confirm values and basis for determining fair values in the calculation of goodwill.
- 5. Confirm contingent payment and recalculate the discounting to arrive at the present value

#### **SOLUTION THREE**

#### a) Expected evidence:

#### i. Evidence expected – Restructuring provision:

Provisions will only be allowed when they meet the conditions in IAS 37 *Provisions, contingent liabilities and contingent assets.* 

Restructuring in this case involves scaling down significantly the operations of the entity and the following evidence would be expected to justify the provision in the financial statements.

- A board resolution approving the intended restructuring
- The restructuring plan prepared by the HR department should be available for review.
- Evidence of the communication to the affected employees of the intention to restructure the company.
- Evidence of meetings held with the union on separation packages.
- Evidence that all the requirements of IAS 37 have been met namely that the entity has a present obligation (legal or constructive) as a result of past events, that it is probable that an outflow of resources shall be required and that a reliable estimate of the amount of the obligation can be made.

#### ii. General provision:

Before IAS 37 was issued, many companies abused the setting up of provisions with the aim of smoothing out profits in periods when business was poor. With the introduction of IAS 37 there are strict conditions that must be met before a provision can be made and all provisions should be specific and used only for that specific purpose.

In the case of the general provision in the financial statements of Luangwa Ltd this does not meet the condition in the standard as it does not specify the purpose of setting up the provision.

The audit approach would be to enquire of management what the provision represents and if management confirms that it is a general provision then it will be disallowed and would require reversing.

#### iii. Finance Lease assets – evidence expected

- The lease agreement which stipulates the conditions of the lease confirming it qualifies as a finance lease.
- The calculations made in relation to the amount capitalized and also the calculations of the finance cost.
- Evidence of payment of the lease charges to the lessor.
- The trucks should be available for inspection by the auditors to confirm that they are the ones subject to the finance lease.

#### b) Discussion of audit report with management:

It is common practice for the auditor to discuss the opinion reached before issuing the report. The form of opinion and the basis for that opinion will be discussed. This way there is unlikely to be any dispute later between the auditor and the client management.

Further, this affords management an opportunity to respond appropriately in case they have explanations on the matters of concern by the auditor that will have caused them to modify the audit opinion.

It may also be that the auditors misunderstood the matter of concern that causes them to issue a particular opinion. If this is clarified it may result in the auditor changing his opinion.

#### c) Previous year modified opinion:

ISA 706(Revised) *Emphasis of matter paragraphs and other matter paragraphs in the independent auditor's report* gives guidance on the meaning and use of these paragraphs.

With regards to the concerns of the Chief Executive Officer that the previous two year's opinions had been modified the following is the position:

**The emphasis of matter paragraph (EoM)** – In accordance with the guidance, the auditor may wish to issue a report with an unmodified audit opinion but containing an Emphasis of Matter paragraph. The EoM paragraph does not amount to a modified opinion. It, however, amounts to an unmodified report.

The CEO should be advised and informed on the use of the EoM paragraph and that his concern is not justified and the opinion in this year was unmodified. The opinion is unmodified and in conformity with the provisions of ISA 700.

**The Other Matter paragraph** – This is a paragraph which the auditor uses when he wants to make reference to a matter that is not contained in the financial statements and need not to have been included but he wishes to make mention of it.

The inclusion of the other matter paragraph does not amount to a modified opinion. Again the concern of the CEO is unjustified and the use of this paragraph should be explained to him.

## SOLUTION FOUR

#### a) Corresponding figures and comparative financial statements:

**Corresponding figures** – These are amounts and other disclosures for the prior period included as an integral part of the current period financial statements. Usually the corresponding figures appear to the right of the current year figures in a set of financial statements.

The figures explained in the question meet the definition of corresponding figures.

**Comparative financial statements** – This is a set of financial statements for the prior year included for comparison with the financial statements of the current period.

The level of information included in those comparable financial statements is comparable with that of the financial statements of the current period.

#### b) Auditor responsibility concerning corresponding figures:

ISA **710** *Comparative Information – Corresponding Figures and Comparative Financial Statements* provides guidance on the responsibilities of the auditor regarding comparative information.

1. The auditor will check and confirm that the corresponding figures have been correctly reported and are appropriately classified.

- 2. Will need to assess whether the accounting policies used for the corresponding figures are consistent with those of the current period or whether appropriate adjustments and/or disclosures have been made.
- 3. Confirm that the corresponding figures agree with the previous year working papers of the auditor and the prior year financial statements.

Where prior year financial statements were audited by different auditors or were not audited – the current year auditor will assess whether the corresponding figures meet the conditions set in ISA 510 *Initial engagements – opening balances* for opening balances. The auditor may in this case need to perform additional audit procedures.

## c) The Key Audit Matters of the audit report:

The Key audit matters (KAM) paragraph was introduced recently when the IAASB revised the existing ISAs related to audit reports. A new ISA 701 *Communicating Key Audit Matters in the Independent Auditor's Report* gives guidance in this area.

The KAM paragraph has been introduced in order to improve transparency by the auditor and to help users understand the significant issues that the auditor faced during the audit. The paragraph, therefore, enhances the communication value of the auditor's report. This paragraph is used by the auditor to communicate significant issues among the issues that the auditors will have communicated to those charged with governance.

It requires that the auditor should evaluate the matters that were communicated to those charged with governance and identify those that are considered significant. These are the ones that will be included in the KAM paragraph. These should be issues which required the most audit attention during the audit and in determining such matters, the auditor will take into account:

- 1. High risk areas in terms of material misstatements or any significant risks identified in line with ISA 315 at the planning stage.
- 2. Matters that required significant judgments where management made judgments.
- 3. The effect of significant events or transactions.

The determination of KAM is a matter of professional judgment by the auditor.

#### Effect of KAM on the audit opinion:

KAM are not separate opinions on the areas covered as they are merely further information on the process that led to the opinion on the financial statements as a whole and is part of the standard unmodified audit report.

Where the auditor issues a modified opinion, logically the matter that leads to the modification is a key audit matter. In this case the matter leading to the modification will be included in the 'Basis for Modified Opinion' paragraph and will not be included in the KAM paragraph.

#### d) Key Audit Matters and the Emphasis of Matter paragraph:

There is some degree of overlap between the KAM paragraph and the EoM paragraph in that both refer to matters that are present in the financial statements but important for user's understanding.

There is a slight difference, however, in that EoM paragraph concern matters that are fundamental to user's understanding of the financial statements whereas KAM concern issues that are of most significance in the audit of financial statements.

It should be observed that sometimes the same matter will give rise to an EoM and a KAM in which case guidance states that the matter should be included on the KAM and should not be included in the EoM paragraph.

#### Key Audit Matters and the Other Matter paragraph:

There is no overlap between the KAM and the Other matter paragraph. The KAM will refer to issues that are present in the financial statements whereas the Other matter paragraph do not by definition. It contains matters that do not require to be contained in or disclosed in the financial statements.

#### **SOLUTION FIVE**

#### a) Why financial statements of Kasompe Plc. should be audited by external auditors:

When a private company obtains a listing on a stock exchange such as the Lusaka Stock Exchange (LuSE), it means that the ownership of the company changes from the original owners to now the shareholders who buy shares in the company.

It should be noted that in a listed company the shareholders who own shares do not take part in the day to day running of the company as is the case with private companies. There is a clear separation between management and ownership. Mr. Patel will no longer be able to direct how the company will be managed as this will be the duty of management.

The only link between management and the shareholders are the financial statements which are prepared annually by management and presented to the shareholders at the annual general meeting. There is a risk that the management may falsify the financial statements to suit them and so there is need for independent people to give an independent view on the financial statements. This is the role that the external auditors perform and they form an opinion on the financial statements and this gives comfort to the shareholders, including Mr. Patel, on the stewardship role that management plays.

The financial statements of listed companies are public and are relied upon by various stakeholders. By having the financial statements of the newly listed company audited, confidence in the financial statements increases.

The stock exchange is a source of capital for many large organizations. If the public loses confidence in the operations of the companies listed on the stock exchange they will be reluctant to buy shares in companies listed on the stock exchange. By having listed company's financial statements audited by external auditors, the public will be willing to deal in the shares on the stock exchange.

## b) Reliability of audit evidence gathered in audit of Baobab:

The reliability of the evidence obtained by the two audit assistants on this audit is questionable.

The following factors raise concern on the evidence that has been obtained.

- 1. Of the two audit assistants who carried out the work, one is newly qualified and had no previous work experience.
- 2. The assistant who has been working for the firm for six years is accustomed to work under supervision and this was the first time that he will work with minimum supervision.
- 3. The pressure to complete the work within four weeks could have resulted in the audit team not auditing in line with international standards on auditing (ISAs) but rather strive to meet the deadline set by the client. This could have resulted in substandard work by the team.
- 4. There was minimum supervision by the audit senior and the audit manager with the audit senior only passing through this client when he had time to spare.
- 5. The clear lack of review and supervision by the audit senior could have resulted in the detection risk being high.

Because of the above factors the evidence that has been obtained is not appropriate to enable the engagement partner form an appropriate audit opinion.

#### Importance of documenting work carried out:

Work carried out should be documented as it is the basis upon which the audit opinion is determined. This is also the evidence that the auditor has conducted the audit in an efficient and effective manner in line with the International Standards on Auditing.

#### c) Quality control in the audit firm:

Quality issues in the audit of the financial statements of Baobab Ltd are subject to the provisions of ISA 220 *Quality control for an audit of financial statements*.

The engagement partner on the Baobab Ltd audit is responsible for all quality issues on the audit. It is clear from the information given that quality control is poor in the audit of the financial statements of this client.

The following factors are indicative of poor quality controls:

- 1. Lack of leadership as it is clear that the engagement partner and the senior members of the audit team were not in control of the work being carried out.
- 2. The assignment of a new audit assistant and one who has not worked without supervision before is contrary to the provisions of the standard on quality control.
- 3. The fact that the audit manager and the audit senior were barely at the client premises indicates lack of supervision of the work that was being carried out.
- 4. By not showing evidence of review of all documents, the quality of the work that has been done is put into question. It means working papers can be replaced with easy and there is no evidence that there has been independent review of work carried out the by two audit assistants.
- 5. The audit manager has also evidenced review of lead schedules only. These are a summary of the figures being audited and there is no evidence that the audit work that has been carried out has been reviewed by the audit manager.
  - 6. There appears to have been no chance of consultations on matters of concern by the audit team. The senior members of the team were rarely available at the client premises.

## **END OF SOLUTIONS**



## CA ZAMBIA PROGRAMME EXAMINATIONS

ADVISORY LEVEL

## CA 3.3: STRATEGIC BUSINESS ANALYSIS

## WEDNESDAY 13 DECEMBER 2017

## TOTAL MARKS: 100; TIME ALLOWED: THREE (3) HOURS

#### **INSTRUCTIONS TO CANDIDATES**

- 1. You have fifteen (15) minutes reading time. Use it to study the examination paper carefully so that you understand what to do in each question. You will be told when to start writing.
- 2. This paper is divided into TWO sections:

Section A: One (1) compulsory scenario question.

Section B: Four (4) Optional scenario Questions. Attempt any three (3) questions.

- 3. Enter your student number and your National Registration Card number on the front of the answer booklet. Your name must **NOT** appear anywhere on your answer booklet.
- 4. Do **NOT** write in pencil (except for graphs and diagrams).
- 5. **Cell Phones** are **NOT** allowed in the Examination Room.

- 6. The marks shown against the requirement(s) for each question should be taken as an indication of the expected length and depth of the answer.
- 7. All workings must be done in the answer booklet.
- 8. Present legible and tidy work.
- 9. Graph paper (if required) is provided at the end of the answer booklet.

#### **SECTION A**

#### This question is compulsory and must be attempted.

#### **QUESTION ONE**

#### **SMART ATTIRE ENTERPRISES**

Smart Attire Enterprises was an exclusive men's shop that sold only shirts of famous international brands. It was founded by Mwiko Nawa in the 1990s who believed that there was an emerging middle class in Zambia that was male, young, educated, and trendy that wished to stand out in a society awash with poverty. Nawa opened his shop to cater to the needs of this niche by importing famous brands from Europe and South Africa. When Nawa began in the 1990s, he was a small operator with little purchasing power. To generate the store traffic to sustain his business, he depended in large part on wholesalers who purchased the merchandise from the manufacturers and in turn sold the merchandise to Nawa. So dependent was Nawa on these wholesalers that they in fact determined the brand, the manufacturer and the price at which the shirts could be sold. This arrangement was satisfactory to Nawa until 2000 when Nawa decided to open another shop in Western Province. However, the wholesalers were not interested in serving customers located in far flung areas from Lusaka unless Nawa paid the extra costs.

Mwiko Nawa, refused to pay the wholesalers any more than he was already paying them for fear that he would price himself out of the rural market. Instead he decided to go public and used the capital he raised to build a distribution center that stocked merchandise and served not only Nawa's stores but all stores within a 500-kilometre radius of Lusaka. Because the distribution center was serving a collection of stores and thus buying in larger volumes, Nawa found that he was able to cut the wholesalers out and order directly from manufacturers. The cost savings generated by not having to pay profits to wholesalers were then passed on to consumers in the form of lower prices which helped Smart Attire Enterprises continue growing. This growth increased the buying power of Smart Attire Enterprises to the extent that the company was able to demand deeper discounts from manufacturers.

Today Smart Attire Enterprises has turned into a power to reckon with. It has opened outlets in all the ten provincial centres of Zambia and additionally serves other shops that take advantages of its country-wide transportation service network. Smart Attire is now known to handle about 15 per cent of retail sales in men's shirts in Zambia is now in a position to exercise bargaining power to its suppliers. Its suppliers are no longer in a position to demand high prices; not only is Smart Attire Enterprises in a position to demand discounts on branded shirts it buys but is also being relied on by manufacturers to advise on issues pertaining to the clothes market in Zambia. To cap it all, Smart Attire has become a brand: people are now proud to buy a shirt from a Smart Attire shop. As one of the company's customers recently boasted, 'Men of distinction wear A Smart Attire shirt'.

Required:

(a) Identify and analyze the type of competitive forces Smart Attire faced when it began its operations. (20 marks)

(b) Evaluate the bargaining power of Smart Attire Enterprises as buyers after establishing the distribution center. (20 marks)

## [Total: 40 Marks]

#### **SECTION B**

#### Attempt any THREE (3) questions in this section.

#### **QUESTION TWO**

The formulation of a suitable strategy entails analysing the external environment for opportunities and threats and then assessing the strengths and weaknesses. This is what is known as the SWOT analysis.

Using a SWOT analysis, determine the appropriate strategies in the following scenarios:

- (a) Coca-Cola Company Ltd. is a market leader in the soft drink industry in America but finds that the American market has become saturated and that the demand for soft drinks among Americans has slowed down principally because Americans perceive Coke as sweet and Americans are wary of developing diabetes. (10 marks)
- (b) A subsistence farmer has been assured by the Government of the Republic of Zambia that the Food Reserve Agency will in the next season buy a 50 kilogramme bag of maize at K120. The meteorology department has also forecast that there will be a good rainfall for growing maize next season. However, as is the case with most subsistence farmers in Zambia, the farmer does not have money to buy the requisite inputs, such as, seed and fertilizer.

(10 marks)

[Total: 20 Marks]

#### **QUESTION THREE**

Three years ago, at a state owned enterprise in Zambia, there was an open conflict between the Board of Directors and the Chief Executive Officer which culminated in the government dissolving the board and terminating the services of the Chief Executive Officer. Board members accused the CEO of having concealed that one of the companies that had won a contract to rehabilitate the corporate head office was actually owned by the brother of the CEO; in turn, the CEO alleged that the board chairman was calling for far too many meetings than was provided for by the company's statutory requirements.

(a) Contrast and compare the roles of a board of directors and a chief executive officer.

(10

marks)

(b) Explain the meaning and significance of transparency and accountability in corporate governance in the context of what transpired at this state owned enterprise.

(10 marks)

#### **QUESTION FOUR**

The Zambia Flower Company (ZFC) is owned by Fabian Haachipuka and has in the last ten years until now made a profit from selling an assortment of flowers from a 5-acre farm plot. Due to a combination of vagaries of weather and competition from a recently arrived Israeli company the company is now witnessing a decline in sales and profit. Haachipuka has learnt however that there is a high demand for flowers in the United Kingdom and he is now considering entering a potentially promising but an unfamiliar and uncertain market.

(a) What is risk?

(4 marks)

- (b) Describe any five types of risk Haachipuka might face if he ventured into the United Kingdom market. (10 marks)
- (c) Discuss any three (3) approaches Haachipuka might apply to mitigate the risks he might face.
   (6 marks)

[Total: 20 Marks]

#### **QUESTION FIVE**

A company that uses energy as an input it its mining operations is now faced with high costs for its input because its supplier has decided to raise by fifty percent the price it pays for the energy. The mining company has determined that its current workforce is not sustainable and that it must accordingly reduce its workforce in order to remain and continue in business.

#### **Required:**

- (a) Explain the relationship between strategy and organization structure. (10 marks)
- (b) Evaluate the link between organization structure and strategy in the context of what has transpired at the mining company. (10 marks)

[Total: 20 Marks]

#### END OFPAPER

#### CA 3.3: STRATEGIC BUSINESS ANALYSIS SOLUTIONS

#### SOLUTION ONE

(a) The scenario described in the case illustrates Porter's model of competitive forces that affect industry profitability. In this case, the competition Smart Attire faced when it began its operations and before it established a distribution centre depicts what Porter referred to as the Bargaining Power of a Supplier where the profitability of Smart Attire was threatened by the wholesalers – the firms that supplied it with shirts. After the establishment of the distribution centre, it was the wholesalers whose profitability was threatened by the fact that Smart Attire Enterprises as their buyer had established a distribution centre.

*Bargaining Power of Suppliers*: This situation is characterized by the existence of a powerful supplier who influences the profit of his/her customers by using his/her power to raise prices of inputs or reduce the quality of inputs he supplies to his/her customers. Specifically, when a supplier is powerful relative to the buyer, he/she can threaten the profitability of his/her buyers by raising the price of inputs or reducing the quality of the inputs. Referring to the case, the dealers who supplied branded shirts to Smart Attire Enterprises were a threat to the profitability of the latter because they determined the not only the quality of the shirts that Smart Attire Enterprises could stock but also the price at which Smart Attire could sell the shirts.

The factors that made the dealers powerful relative to Smart Attire Enterprises comprised the following:

- The input was differentiated the shirts were high quality brands and as such, were crucial to the business of Smart Attire Enterprises. The nature of business of Smart Attire Enterprises was trading in branded shirts which could be sourced only by dealers from overseas manufacturers who of famous brands. Thus the product was unique rather than standard.
- Information about the shirts was rather difficult to obtain by Smart Attire Enterprises since it was the dealers who knew where to source the branded shirts.
- The switching costs of supplier were high Smart Entire Enterprises depended on dealers and could not switch to other suppliers. Thus, Smart Entire Enterprises was locked to the dealers.
- Threat of forward integration the dealers could easily enter into the business of Smart Attire Enterprises. This was evidenced by the fact that they were wholesalers to Smart Attire Enterprises. The retailing of shirts done by Smart Attire Enterprises could easily be undertaken by the dealers.
- The Profitability of dealers was not influenced by the single purchase of Smart Attire Enterprises. As dealers they probably supplied to other retailers other than Smart Attire Enterprises.
- (b) *Bargaining Power of Buyers:* The establishment of a distribution centre by Smart Attire Enterprises shifted power from dealers to Smart Attire Enterprises because the

distribution centre assumed the role that was played by dealers. Using its own distribution centre, Smart Attire Enterprises was able to buy in wholesale directly from manufacturers and hence eliminated the need to depend on dealers for its merchandise. More specifically, it could bargain directly with manufacturers on matters of price and the quality of shirts. It was now Smart Attire Enterprises that was a threat to the profitability of the suppliers of shirts by being in a position to bargain down prices and insist on higher quality shirts.

The factors that made Smart Attire Enterprises powerful relative to the dealers were as follows:

- By having its own Distribution Centre which acted as wholesaler, Smart Attire Enterprises was in a position to source merchandise from a variety of manufacturers instead of relying on the local dealers
- Information about the merchandise and where to source it was available to Smart Attire Enterprises; in fact, the suppliers were anxious to seek market information about Zambia from Smart Attire Enterprises.
- The switching costs of suppliers was low; presumably Smart Attire Enterprises had some latitude in the sourcing of possible suppliers
- Smart Attire had virtually entered the dealers' business by doing their own wholesaling.
- The Profitability of dealers depended on Smart Attire Enterprises. In this case, the establishment of a Distribution Centre in essence cut off the dealers.

### SOLUTION TWO

(a) The study manual offers the following definition of strategy: '...the direction and scope of an organisation over the long term, which achieves advantage in a changing environment through its configuration of resources and competences with the aim of fulfilling stakeholder expectations.' Implicit in this definition is the notion of the external environment (depicted by opportunity/threat) and resources and competences (depicted by strength/weakness). SWOT is an acronym for Strength, Weakness, Opportunity and Threat. Thus a SWOT analysis is a technique that may be used to determine an appropriate strategy of an organization given the opportunity/threat in its environment and its capability to prosecute the opportunity/threat.

Using the Boston Consulting Group Portfolio Analysis, the two situations can be analysed as follows:

Coca-Cola: The situation of Coca-Cola can be described as follows:

- Opportunity/Threat: The company is facing a threat because demand for coke is low
- Strength/Weakness: The company has the strength because it is the acknowledged market leader
- Situation Given the low demand and its strength, the company is a *cash cow*
- Appropriate strategy diversify to a different industry because there is no/low opportunity in the American economy; it has the strength to sell its product where there is demand for coke.

- (b) Subsistence farmer: The situation of the subsistence famer can be described as follows:
  - i. Opportunity/Threat: The farmer is facing an opportunity because the forecast for maize growing is favorable and the demand for maize is high since the Food Reserve Agency has undertaken to buy whatever maize is grown
  - ii. Strength/weakness: The subsistence has a weakness because he has no resources with which to buy inputs;
  - iii. Situation: Given the opportunity and the weakness characterized by lack of capital, the subsistence farmer is a **question mark or problem child**
  - iv. Appropriate strategy is to raise capital and then grow maize

#### SOLUTION THREE

- (a) Role of a Board of Directors (BOD) versus the role of a chief executive officer(CEO)
  - A BOD represents those who have an equity interest in the firm or those who own strategic resources; hence board members are usually appointed to the board by their respective principals to represent them. In contrast, a CEO is ordinarily an employee of the firm appointed by the BOD to run the day-to-day affairs of a firm.
  - A BOD receives, discusses, monitors and approves or rejects strategic decisions, such as, the budget and strategic plans, bearing in mind the interests of the principals; a CEO is accountable to the Board for the formulation and implementation of strategy. As such, a CEO is expected to initiate, defend and implement strategy under the superintendence of the BOD
  - A BOD is the heart of the corporate governance of a firm; the CEO is the chief strategist and guides the Board in the selection, evaluation and implementation of strategy. More specifically, the BOD must perform the following tasks in advancing corporate governance:
    - inquire, critique and oversee management's strategic proposals in order to determine whether the proposals meet the interests of owners
    - evaluate the calibre of the CEO and senior management in order to ensure that they have the skills and experience to formulate and implement strategy
    - design a compensation scheme for the CEO and senior managers that will not only motivate management to craft a strategic direction that will maximize share-holder wealth but that will also adequately compensate the CEO and senior management for the successful accomplishments of benefits for all stakeholders.

## (b) The meanings and significance to governance of accountability and transparency.

Corporate governance consists of prescribed relationships and behaviours between a company's shareholders, directors, and management in which objectives of the

company are set, and the means of achieving those objectives are determined. Accountability and transparency are essential elements of good governance.

#### • Accountability:

This refers to the need for stakeholders to be 'answerable' for the consequences of their actions. This is necessary because all actions must primarily enhance promote the interests of owners or those who have a stake in the well-being of an organization. The actions that are performed must accordingly be justified from the perspective of those who have invested in the firm. As representatives of those who have an equity interest in the firm, members of the board are accountable to their principals, and a CEO who is appointed by the board to run the day-to-day affairs of a firm, must be accountable to the board for the consequences of what he/she does.

The diversity of stakeholders can result in conflict where the pursuit of an objective by one party may not be in the interest of another party. Good governance therefore calls for any one party to be mindful of the consequences of their actions to the interests of others. The need for accountability has been triggered by many instances of corporate scandal where officers of a firm have been caught in acts of omission, dishonesty, or negligence which have harmed other stakeholders. It is thus necessary for the offending officer to be held accountable for their actions.

In the case cited, it is necessary for the BOD to be held accountable for any action which results in harm to the organization, such as holding too many meetings which deplete resources of an organization.

The specific benefits of holding anyone accountable are:

- i) To safeguard the resources of those parties that have invested in a firm.
- ii) To harness the resources that have been staked in the firm to optimum application in the pursuit of the firm's objectives
- iii) To attract new investment
- iv) To give the firm a good image

#### • Transparency:

This refers to the need to be open among the various stakeholders and not to conceal anything which is material in the development of a firm; in other words, nondisclosure can potentially harm the long-term interests of an organization.

In the case cited, for instance, the non-disclosure by the CEO that he is related to one of the bidders may result in the contract being awarded to a bidder who less is deserving if the CEO, by being one of the decision makers, influenced the decision to award in favour of his relation. If the award had gone to a more deserving candidate had there been full disclosure, the company and society at large suffer in the process when a contract ends up in a less deserving bidder who benefits from lack of disclosure. In the case cited, the brother of the CEO had an unfair advantage over others, in that he could have benefitted from inside information through the CEO or the CEO could have unfairly swayed the opinion of the firm in his brother-in-law's favour. By not having the best bidder win the contract, the interest of the shareholder were compromised.

In fairness to all partied, the CEO should have declared interest in the matter and left it to neutral minds to select the best bidder.

## **SOLUTION FOUR**

- (a) A risk is any event, organization or person that is a threat to an organization's objective/profitability. For most organizations and for strategic reasons, the most common form of risk is the threat to profit. It is worth noting that the threat presented by competition is central to strategy.
- (b) By entering a foreign market which is more developed than Zambia, a number of risks will be encountered among which are the following:
  - ✓ Environmental risk: the occurrence of natural disasters (weather, earthquakes, hurricanes) which could jeopardize operations
  - ✓ Legal risk: the threat from failure to meet standards set by the government
  - ✓ Product risk: the threat that the product may not meet the quality expectations of the people in the United Kingdom
  - ✓ Price risk: the threat that stems from setting an inappropriate price a low price may attract retaliation from established firms while a high price may be uncompetitive
  - ✓ Economic risk: threat arising from inability to access customers
  - ✓ Risk from substitutes: the threat that may come from substitutes
  - ✓ Technology risk: the threat arising from technological advances
  - ✓ Political risks: the threat coming from government policy with regard to imports into the United Kingdom; the threat coming from political instability, feelings of nationalism and attitude toward foreign owned businesses
  - $\checkmark$  Cultural risks: threats based on beliefs, values and traditions of the society
  - ✓ Financial risk: the threats stemming from this investment being based on flawed financial reasoning
  - (c) Responses to risk:

The following approaches can be taken to manage the risks associated with exporting flowers to the United Kingdom:

- $\checkmark$  Abandoning or avoiding the idea all together if the risk is too high
- ✓ Control/reduction this involves reducing the threat by seeking to control the intensity of the impact of the threat. This can be done by taking up some insurance or by undertaking more vigorous market research
- $\checkmark$  Transfer this involves transferring the threat to others within the organization or outside the organization such as taking up insurance.

✓ Acceptance – this involves accepting the risk because it is insignificant or the opportunity cost of doing otherwise is too high.

#### SOLUTION FIVE

A strategy encompasses the direction or objective of an organization over the long run. Underlying strategy are three questions:

- Where is an organization?
- Where does an organization wish to be?
- How does the organization get to where it wishes to be?

These three questions indicate the link between an objective and its implementation. The second question addresses the objective and the second question is concerned with the means of achieving the objective. An organization structure is the arrangement of people, tasks and relationships in a way which facilitates the achievement of an objective. The principal function of an organization structure in strategic management is therefore to facilitate the implementation of strategy. An organization structure necessarily begins with a clear determination and understanding of strategy. Once the strategy is understood, the next step is to execute the strategy by developing an internal organization structure that is responsive to the needs of strategy.

A responsive organization structure comprises the following steps:

- (a) Identification of the tasks to be performed
- (b) Recruitment of people with the requisite skills to perform the tasks
- (c) Assigning people to the tasks to be performed. The assigning of people can be on the following criteria:
  - The specific functions to be performed functional organization structure
  - The market (customers or region) to be served market or geographical organization structure
  - The product to be made product organization structure
- (d) Providing for authority to each unit.
- (e) Providing coordination among the units/sections/departments

In the case of what has transpired at the mining company, the strategy which initially warranted the recruiting of people and assigning them to specific functions, that is, steps (a) and (b) above, has changed and the organization structure must correspondingly be realigned

to the new strategy. Since the mining company has to scale down its operations in order to remain profitable, some functions could have become unnecessary and the employees performing such functions have to be retrenched if company still wishes to pursue profitability. Retrenchment is the rearrangement of people and tasks in response to the revised objective in view of the situation the company finds itself.

### END OF SOLUTIONS



## CA ZAMBIA PROGRAMME EXAMINATIONS

ADVISORY LEVEL

## CA 3.4: ADVANCED TAXATION

THURSDAY 14 DECEMBER 2017

TOTAL MARKS – 100; TIME ALLOWED: THREE (3) HOURS

#### INSTRUCTIONS TO CANDIDATES

- 1. You have fifteen (15) minutes reading time. Use it to study the examination paper carefully so that you understand what to do in each question. You will be told when to start writing.
- This paper is divided into TWO sections: Section A: One (1) Compulsory scenario question.
   Section B: Four (4) Optional scenario Questions. Attempt any Three (3) questions.
- 3. Enter your student number and your National Registration Card number on the front of the answer booklet. Your name must **NOT** appear anywhere on your answer booklet.

- 4. Do **NOT** write in pencil (except for graphs and diagrams).
- 5. **Cell Phones** are **NOT** allowed in the Examination Room.
- 6. The marks shown against the requirement(s) for each question should be taken as an indication of the expected length and depth of the answer.
- 7. All workings must be done in the answer booklet.
- 8. Present legible and tidy work.
- 9. Graph paper (if required) is provided at the end of the answer booklet.

#### **Taxation Table**

#### **Income Tax**

#### Standard personal income tax rates

Income band	Taxable amount	Rate
K1 to K39,600	first K39,600	0%
K39,601 to 49,200	next K9,600	25%
K49,201 to K74,400	next K25,200	30%
Over K74,400		37.5%
Income from farming for individuals		
K1 to K39,600	first K39,600	0%
Over K39,600		10%
Company Income Tax rates		
On income from manufacturing and other		35%
On income from farming		10%
On income of Banks and other Financial Institutions		35%
On income from mineral processing		30%
On income from mining operations		30%
Min anal Davialter		

#### **Mineral Royalty**

#### Mineral Royalty on Copper

Range of Norm Price	Mineral Royalty Rate
Less than US\$4,500	4% of norm value
From US\$4,500 to less than US\$6,000	5% of norm value
From US\$6,000 and above	6% of norm value
Mineral Royalty on other minerals	

Type of mineral	Mineral Royalty Rate
Base Metals (Other than Copper)	5% of norm value
Energy and Industrial Minerals	5% of gross value
Gemstones	6% of gross value
Precious Metals	6% of norm value

## **Capital Allowances**

## Implements, plant and machinery and commercial vehicles:

Wear and Tear Allowance –	Plant used normally	25%
	Used in Manufacturing and Leasing	50%
	Used in farming and agro-processing	100%
Non- commercial vehicles Wear and Tear Allowance		20%
Industrial Buildings:		
Wear and Tear Allowance		5%
Initial Allowance		10%
Investment Allowance		10%
Low Cost Housing	(Cost up to K20,000)	
Wear and Tear Allowance		10%
Initial Allowance		10%
Commercial Buildings		
Wear and Tear Allowance		2%

Farming Allowances	
Development Allowance	10%
Farm Works Allowance	100%
Farm Improvement Allowance	100%

## **Presumptive Taxes**

## **Turnover Tax**

Monthly turnover	Turnover Tax per month
K1to K4,200	3% of monthly turnover above K3,000
K4,200.01to K8,300	K225 per month+3% of monthly turnover above K4,200
K8,300.01 to K12,500	K400 per month+3% of monthly turnover above K8,300
K12,500.01 to K16,500	K575 per month+3% of monthly turnover above K12,500
K16,500.01 to K20,800	K800 per month+3% of monthly turnover above K16,500
Above K20,800	K1,025 per month+3% monthly of turnover above K20,800

Annual turnover	Turnover Tax per annum
K1to K50,400	3% of annual turnover above K36,000
K50,400.01to K99,600	K2,700 per annum+3% of annual turnover above K50,400
K99,600.01 to K150,000	K4,800 per annum +3% of annual turnover above K99,600
K150,000.01 to K198,000	K6,900 per annum+3% of annual turnover above K150,000
K198,000.01 to K249,600	K9,600 per annum+3% of annual turnover above K198,000
Above K249,600	K12,300 per annum +3% of annual of turnover above K249,600

## Presumptive Tax for Transporters

Seating capacity

Tax per annumTax per day Κ Κ

From 64 passengers and over	7,200	19.70
From 50 to 63 passengers	6,000	16.40
From 36 to 49 passengers	4,800	13.00
From 22 to 35 passengers	3,600	10.00
From 18 to 21 passengers	2,400	6.60
From 12 to 17 passengers	1,200	3.30
Less than 12 passengers and taxis	600	1.60

## **Property Transfer Tax**

Rate of Tax on Realised Value of Land, Land and Buildings and shares	5%
Rate of Tax on Realised Value on a transfer or sale of a mining right	10%

#### Value Added Tax

Registration threshold	K800,000
Standard Value Added Tax Rate (on VAT exclusive turnover)	16%

#### **Customs and Excise**

**Duty rates on:** 

1. Motor cars and other motor vehicles (including station wagons) principally designed for the transport of less than ten persons, including the driver:

Customs Duty:	
Percentage of Value for Duty Purposes	30%
Minimum Specific Customs Duty	K6,000
Excise Duty:	
Percentage of Value for Duty Purposes for Excise Duty Purposes	
Cylinder capacity of 1500 cc and less	20%
Cylinder Capacity of more than 1500 cc	30%

2. Pick-ups and trucks/lorries with gross weight not exceeding 20 tones: Customs Duty

	Percentage of Value for Duty Purposes	15%
	Minimum specific Customs Duty	K6,000
	Excise Duty:	
	Percentage of Value for Duty Purposes for Excise Duty Purposes	10%
_		
3.	Buses/coaches for the transport of more than ten persons	
	Customs Duty:	
	Percentage of Value for Duty Purposes	15%
	Minimum Specific Customs Duty	K6,000
	Excise Duty:	
	Percentage of Value for Duty Purposes for Excise Duty Purposes	
	Seating Capacity of 16 persons and less	25%
	Seating Capacity of 16 persons and more	0%
4		
4.	Trucks/lorries with gross weight exceeding 20 tonnes	
	Customs Duty:	
	Percentage of Value for Duty Purposes	15%
	Excise Duty:	
	Percentage of Value for Duty Purposes for Excise Duty Purposes	0%
5.	Surtax	K2,000
	On all motor vehicles aged more than five (5) years from year of	,

manufacture

#### **SECTION A**

This question is compulsory and must be attempted.

#### **QUESTION ONE**

# You should assume that today is 15 December 2016 and that the taxation rules applicable to the tax year 2017 apply throughout.

Chisenga and Mukuni wish to commence in business buying and re-selling imported domestic electrical appliances, such as stoves, fridges and microwave ovens. They will trade from rented premises where the gross monthly rent will be K12,000.

Chisenga and Mukuni wish to obtain taxation advice to enable them decide whether to trade through a partnership or through a company and how they should extract the profits from the business. Once they have obtained this advice, they will register the appropriate business and commence to trade on 1 January 2017.

Their business is expected to produce an annual turnover of K1,800,000 whether it is run as a partnership or as a company. The net profit as per accounts is expected to be K800,000, before deducting payments to Chisenga and Mukuni whether the business is run as a partnership or as a company. All the other expenses that will be incurred and deducted in arriving at the net profit figure of K800,000 are allowable expenses for taxation purposes.

Whether the business is run as a partnership or as a company, two motor cars will be bought on 10 January 2017 for use by Chisenga and Mukuni. Each motor car will be for both business and private use. Private mileage will be 50% of the total mileage done in each motor car. The motor cars will be a Toyota Avensis costing K70,000 and having a cylinder capacity of 2,000 cc and a Toyota Camry costing K80,000 and having a cylinder capacity of 2,400 cc. Both motor cars will be propelled by petrol. Chisenga will drive the Toyota Avensis while Mukuni will drive the Toyota Camry. Chisenga will keep the Toyota Avensis at his residence overnight and Mukuni will also keep the Toyota Camry at his residence overnight.

#### Partnership

If the business is run as a partnership, the partnership will be called CM and Co. Chisenga will draw an annual partnership salary of K300,000 while Mukuni will draw an annual partnership salary of K400,000. National Pension Scheme Authority (NAPSA) contributions

will not be payable. The balance of the profits or losses will be shared equally between Chisenga and Mukuni.

#### Company

If the business is run as a company, the company will be called CM Ltd. Chisenga and Mukuni will be the only shareholders and full time working directors in the company. Chisenga will draw a gross annual amount of K300,000 either as a gross salary or as a gross dividend. Mukuni will draw a gross annual amount of K400,000 either as a gross salary or as a gross dividend. NAPSA contributions will be payable where applicable by both the directors and CM Ltd.

#### NAPSA Earnings threshold

The NAPSA earnings threshold for the year ending 31 December 2017 is K214,706.

#### Other information

Chisenga and Mukuni have no other sources of income.

#### **Required:**

- (a) Explain the criteria applied to determine whether a motor car owned by the employer and driven by an employee or director is a personal to holder motor car. (3 marks)
- (b) Based on the information provided in the scenario, **advise** Chisenga and Mukuni

whether:

- (i) The two motor cars will be personal to holder motor cars if the business was run as a partnership. (2 marks)
- (ii) The two motor cars will be personal to holder motor cars if the business was run as a company. (2 marks)
- (c) Prepare a report for Chisenga and Mukuni, covering the following matters:
  - (i) A computation of income tax payable by (1) Chisenga and (2) Mukuni on the basis that Chisenga and Mukuni ran their business as a partnership. (6 marks)
  - (ii) A computation of the NAPSA contributions and income tax payable by (1) Chisenga (2) Mukuni and (3) CM Ltd on the basis that Chisenga and Mukuni ran the business as a company and they drew gross annual salaries of K300,000 and K400,000 respectively. (10 marks)
  - (iii) A computation of the NAPSA contributions, withholding tax and income tax payable by (1) Chisenga, (2) Mukuni and (3) CM Ltd on the basis that Chisenga and Mukuni ran the business as a company and they drew gross annual dividends of K300,000 and K400,000 respectively. (9 marks)

(iv)An appropriate recommendation as to how Chisenga and Mukuni should run their proposed business and how they should extract profits from that business.

(4 marks)

Marks available for the structure of the report and its effectiveness. (4 marks)

[Total: 40 marks]

#### **SECTION B**

#### Attempt any THREE (3) questions in this section

#### **QUESTION TWO**

The following summarised statement of profit or loss has been obtained from the annual report of MCC Ltd, a company engaged in the extraction and sale of copper in Zambia. MCC Ltd is wholly owned subsidiary company of Delia, an Indian based multinational mining company. The group prepares financial statements in United States dollars.

## MCC LTD STATEMENT OF PROFIT OR LOSS FOR THE YEAR ENDED 31 DECEMBER 2017

	K
Sales Revenue (Note 1)	49,000,000
Cost of Sales	(19,794,000)
Gross Profit	29,206,000
Operating expenses (Note 2)	(10,780,000)
Finance cost (Note 3)	(2,000,000)
Investment income (Note 4)	244,000
Profit before taxation	16,670,000
Company income tax (5)	(2,917,926)
Profit for the financial year	13,752,074

#### The following additional information is available:

(1) The figure for sales revenue in the statement of profit or loss above represents the gross sales of copper based on the average London Metal Exchange cash price, which was above \$6,000 throughout the tax year 2017. Mineral royalty paid during the tax year 2017 has not been accounted for in the statement of profit or loss shown above.

- (2) Operating expenses include K380,000 incurred on drilling boreholes in the local mining township, K220,000 incurred on rehabilitation of the sewerage and drainage system in the local mining township and K90,000 incurred on the repair and installation of the street lighting system in the mine township.
- (3) The company has a debt: equity ratio of 15 : 4.
- (4) Investment income comprises fixed deposit interest earned amounting to K54,000 and dividends received from shares held in non-mining companies amounting to K190,000. These were the gross amounts earned in all cases; withholding tax was deducted at source.
- (5) The company income tax shown in the statement of profit or loss above represents the provisional company income tax paid by the company in respect of the tax year 2017.
- (6) The company has had the following results from mining operations in recent years:

Year ended 31 December	2014	2015	2016
	Κ	К	К
Tax adjusted Mining profit / (loss) before			
loss relief	(10,600,000)	8,190,476	7,340,000

(7) The (K/\$) exchange rates published by the Bank of Zambia and approved by the Commissioner General are as follows:

Date	Exchange Rate
	K/\$
31 December 2014	10.50
31 December 2015	10.00
31 December 2016	9.45
31 December 2017	9.60

(8) Mining losses may be indexed using the formula:

$$1 + \frac{R_2 - R_1}{R_1}$$

(9) The only capital assets used in mining qualifying for capital allowances at 1 January 2017, was mining equipment which had an income tax value of K750,000 with an original cost of K1,500,000.

## **Required:**

- (a) Show how the loss incurred in the year ending 31 December 2014 will be relieved in each of the tax years 2015 and 2016 and compute the final taxable profits for each of the tax years 2015 and 2016.
   (8 marks)
- (b) Compute the taxable business profits for the tax year 2017 and compute the total income tax payable by the company for the tax year 2017. (12 marks)

[Total: 20 marks]

#### **QUESTION THREE**

SKY Ltd holds 100% of the share capital of each of SUN Ltd, MOON Ltd and CLOUD Ltd. SKY Ltd, SUN Ltd and MOON Ltd are all resident in Zambia while CLOUD Ltd is resident in Southland.

For the year ended 31 December 2017, the companies' sales revenue and purchases and expenses were as follows:

	SKY Ltd	SUN Ltd	MOON	CLOUD Ltd
			Ltd	
	K'000	K'000	K'000	K'000
Sales Revenue	456,000	420,000	230,000	323,000
Purchases and expenses	245,000	178,000	122,000	109,300

All of the above amounts are exclusive of VAT where applicable. All of the companies are registered for Zambian VAT where applicable.

75% of SKY Ltd's supplies are standard rated while the remainder are exempt supplies. All of the supplies made by SUN Ltd are zero rated while all of the supplies made by MOON Ltd are exempt supplies. CLOUD Ltd makes only standard rated supplies of communications services, 30% of which are made to SKY Ltd, SUN Ltd and MOON Ltd in equal proportions. CLOUD Ltd does not have a tax paying agent in Zambia. The purchases and expenses for all the companies are standard rated.

#### The following information is also available:

- (1) SKY Ltd charges management fees of K40,000,000 to SUN Ltd and K35,000,000 to MOON Ltd to cover the costs of the central treasury function. The amounts of management fees are not included in the sales revenue of SKY Ltd and in the purchases and expenses of both SUN Ltd and MOON Ltd. Standard rated overheads of K90,000,000 which are incurred by SKY Ltd are not included in the purchases and expenses of SKY Ltd above.
- (2) During the year, SUN Ltd transferred a commercial plot of land to SKY Ltd as part of the internal reorganization of the group. At the time of transfer, the plot of land was valued at K1,500,000. Following this transfer of the plot of land, SKY Ltd will transfer the whole of its shareholding in SUN Ltd to CLOUD Ltd during the year ending 31 December 2018. It is estimated that at the proposed time of transfer, the shareholding will be valued at

K96,000,000. To satisfy the value of this shareholding, CLOUD Ltd will issue Debentures to SKY Ltd for K96,000,000 at an annual interest rate of 12%, with interest payable once every year on 31 December.

## **Required:**

- (a) Based on the information available, calculate the Zambian VAT position of each company for the year ended 31 December 2017 and show the net VAT position for the group
   (8 marks)
- (b) Advise on the VAT implications of the supplies of services made by CLOUD Ltd to SKY Ltd, SUN Ltd and MOON Ltd, supported by appropriate calculations.

(3 marks)

- (c) Advise SKY Ltd of the property transfer tax implications of the transfer of the commercial plot of land to SUN Ltd. (2 marks)
- (d) Advise on the Company Income Tax, Value Added Tax and Property Transfer Tax implications of the proposed transfer of SKY Ltd's shareholding in SUN Ltd to CLOUD Ltd. (5 marks)
- (e) Advise on the Withholding Tax and Company Income Tax implications of the debenture interest that CLOUD Ltd will be paying to SKY Ltd. (2 marks)

[Total: 20 marks]

#### **QUESTION FOUR**

# You should assume that today's date is 20 October 2018 and that the Bank of Zambia discount rate is 11% per annum.

You are employed in a firm of Chartered Accountants. Your firm has been approached by a new client Ndanji Simutowe, a sole trader who is seeking advice.

Ndanji commenced in business on 1 January 2017, running a chain of shops selling building and construction materials in Lusaka and on the copperbelt. He has informed you that he recently received a letter from the Zambia Revenue Authority giving notice of their intention to make an enquiry into his self- assessment income tax return and provisional income tax return for the tax year 2017. This letter also warned that penalties and interest may be payable.

He has presented you with the following statement of profit or loss for the first twelve months of trading to 31 December 2017:

	K
Sales	4,300,000
Cost of sales	<u>(1,900,000</u> )

Gross profit	2,400,000
Depreciation on motor vehicles	(102,000)
Business Rent	(120,000)
Motor vehicle running expenses	(225,000)
Salaries and wages	(900,000)
Sundry expenses	(540,000)
Net profit	513,000

He has further provided you with the following information:

- (1) During the year he used building materials costing K250,000 from the business in the construction of his residential house without making any entries in the statement of profit or loss shown above. He makes a mark-up of 50% on all building materials.
- (2) The motor vehicle running expenses includes K90,000 which he incurred on repairing and servicing his private motor car. Ndanji sometimes uses this car for business purposes and he has agreed with the Commissioner General that his business use of his private motor car is 25%. He bought the car at a cost of K220,000 in January 2017. The balance of the motor vehicle running expenses relates to two delivery vans which he bought at a cost of K250,000 each in January 2017 and uses wholly and exclusive for business purposes.
- (3) Namwinga, his wife helps him manage one of the shops. He pays her a salary of K10,000 per month. He also employs other shop managers who manages his other shops. The monthly salary of each shop manager is K4,000. Ndanji draws a salary of K18,000 per month.
- (4) He bought computers at a cost of K30,000 which are used wholly and exclusively for business purposes.
- (5) Ndanji had registered his business for tax purposes with the ZRA immediately he commenced trading in January 2017. He had estimated the taxable profit for the tax year 2017 to be K400,000.

He submitted the return of provisional income tax in respect of the tax year 2017 on 30 June 2017. He also paid the provisional income tax for both the first and second quarters of 2017 on 30 June 2017, whilst the third instalment for provisional income tax relating to the third quarter was paid on 31 October 2017. The final instalment of provisional income tax relating to the last quarter of 2017 was paid on 8 January 2018.

At the end of the tax year 2017, Ndanji calculated the actual amount of income tax payable using the net profit for the year of K513,000 shown in the statement of profit or loss above and computed the balance of tax payable. He paid this balance of tax he computed on 21 June 2018. He also submitted the self-assessment return in respect for the tax year 2017 on the same date.

# **Required:**

- (a) Advise Ndanji on how he should have computed the taxable profit for the tax year 2017 and prepare a revised computation of the taxable business profit for the tax year 2017. (10 marks)
- (b) Compute the amount of tax underpaid by Ndanji in respect of the tax year 2017, on the taxable business profit. (2 marks)
- (c) Advise Ndanji of his potential exposure to penalties and interest. Your answer should be supported by calculations of the amount of interest or penalties arising as far as the information provided permits. (8 marks)
   [Total: 20 Marks]

# **QUESTION FIVE**

Simunkolomba is the major shareholder and Chief Executive Officer (CEO) of SMB Ltd, a Zambian private company. Simunkolomba and his company have accumulated substantial assets over the past few years.

Simunkolomba is concerned about the high taxes he and his company have been subjected to and needs to find ways of reducing the taxes. He does not know the difference between tax evasion and tax avoidance and needs some clarification to enable him establish strategies to assist with reducing potential tax liabilities.

Simunkolomba has an outstanding mortgage on the family house amounting to K400,000 with a remaining term of five (5) years. Simunkolomba has no forms of insurance, and believes he should make sure that his wealth and family are protected. He is keen to find out what options he should be considering and a colleague suggested to him the use of financial planning protection products offered by life insurance companies.

Simunkolomba is considering introducing a share option scheme as a basis for rewarding the senior employees in the company. The other shareholders of the company have agreed to this proposal but Simunkolomba seeks advice as to how to make the share option scheme beneficial from a taxation perspective. He knows that there is need to operate an approved share option scheme for tax benefits to be obtained fully.

### **Required:**

(a) Explain the possible causes of and the differences between tax avoidance and tax evasion and discuss the ethical and practical consequences of practicing each of them.
 (8 marks)

- (b) Explain the features of and discuss the personal income tax implications for Simunkolomba of taking each of the following financial planning protection products:
  - (i) Whole of life assurance
  - (ii) Family income benefit
  - (iii) Permanent health insurance (6 marks)
- (c) Explain the procedure for the approval of a share option scheme. (3 marks)
- (d) Explain the tax benefits of operating an approved share option scheme for:
  - (i) The employer
  - (ii) The participating employees

(3 marks) [Total: 20 Marks]

# **END OF PAPER**

#### **CA3.4: ADVANCED TAXATION SOLUTIONS**

#### SOLUTION ONE

- (a) A motor car that is owned by the employer but driven by an employee or director is a personal to holder motor car if it not a pool car. For this purpose, a pool car is one:
  - (i) that is not available for use by one employee or director to the exclusion of others.
  - (ii) that is not normally kept overnight at, or near the residence of one employee or director.
  - (iii)that is specifically meant for business use, any private use being incidental to the business use.
- (b) The motor cars which will be driven by Chisenga and Mukuni will be classed as follows:
  - (i) If the business is run as a partnership, the motor cars will not be classed as personal to holder motor cars. The motor cars will be private assets with business use by the partners.
  - (ii) If the business was run as a company, then the two motor cars will be personal to holder cars because they will each be for exclusive use of the directors, they will be kept overnight at the residence of each director and the motor cars will not be wholly for business use.

#### (c) REPORT

To: Chisenga and Mukuni

From: Tax Consultant

Date: 20 December 2016

RE: TAXATION AND NAPSA CONTRIBUTIONS AND ADVICE ON BUSINESS MEDIUM

This report provides information on the amounts of taxes and National Pension Scheme Authority (NAPSA) Contributions payable depending on whether the business is run as a partnership or as a company. The report ends with an appropriate recommended business medium from a taxation point of view.

Detailed computations of amounts of taxes and NAPSA contributions payable are included in the appendices to this report. References are made to these appendices where applicable.

Responses relating to the matters raised now follow below:

#### (i) INCOME TAX PAYABLE IF THE BUSINESS IS RUN AS A PARTNERSHIP

If the proposed business is run as a partnership, the amount of income tax payable by Chisenga will be K110,685 while income tax payable by Mukuni will be K147,810 as shown in Appendix 1

#### (ii) INCOME TAX AND NAPSA CONTRIBUTIONS PAYABLE IF THE BUSINESS IS RUN AS A COMPANY AND EMOLUMENTS ARE DRAWN

Detailed computations of the amounts of taxes and NAPSA contributions are provided in Appendix 2 attached to this report. If the business is run as a company, income tax payable by Chisenga and Mukuni will be K93,413 and K130,913 respectively. Both Chisenga and Mukuni will each pay NAPSA contributions of K10,735.

CM Ltd will pay company income tax of K37,486 and employer's NAPSA contributions of K21,470.

#### (iii) INCOME TAX, WITHHOLDING TAX AND NAPSA CONTRIBUTIONS PAYABLE IF THE BUSINESS IS RUN AS A COMPANY AND DIVIDENDS ARE DRAWN

If the business is run as a company and you were to draw gross dividends instead of emoluments, then:

#### Chisenga:

- (1) NAPSA contributions will not be payable because dividends are not earnings for the purposes of NAPSA contributions.
- (2) Withholding tax will not be payable by you but will be deducted at source from the gross dividend by CM Ltd.
- (3) Income tax will not be payable because withholding tax that will be deducted from the dividend at source by CM Ltd will be the final tax.

#### Mukuni:

- (1) NAPSA contributions will not be payable because dividends are not earnings for the purposes of NAPSA contributions.
- (2) Withholding tax will not be payable by you but will be deducted at source from the gross dividend by CM Ltd.
- (3) Income tax will not be payable because withholding tax that will be deducted at source from the gross dividend by CM Ltd will be the final tax.

### CM Ltd:

- (1) NAPSA contributions will not be payable because dividends are not earnings for the purposes of NAPSA contributions.
- (2) Withholding tax payable will be K105,000 while company income tax payable will be K290,500 as calculated in Appendix 3 attached to this report.

#### (iv) RECOMMENDED BUSINESS MEDIUM

Appendix 4 shows the detailed computations. The statutory payments are minimized when the business is run as a partnership.

Alternatively, the amount of income net of taxes and NAPSA contributions is maximized when the business is run as a partnership.

It is therefore recommended that you should run your proposed business as a partnership.

We shall be available to offer any further tax advice that you may require once you have commenced your partnership.

Signed CAZ

#### TAX CONSULTANT

### **APPENDIX 1 - BUSINESS RUN AS A PARTNERSHIP**

If Chisenga and Mukuni run the business as a partnership:

Computation of Taxable income and income tax payable for the tax year 2017

	<u>Total</u>	<u>Chisenga</u>	<u>Mukuni</u>
	Κ	Κ	Κ
Partnership salaries	700,000	300,000	400,000
Balance	<u>100,000</u>	<u>50,000</u>	<u>50,000</u>

	800,000	350,000	450,000
Capital allowances:			
Chisenga's motor car			
20% x K70,000 = K14,000 x 50%	(7,000)	(7,000)	
Mukuni's motor car			
20% x K80,000 = K16,000 x 50%	<u>(8,000)</u>		<u>(8,000)</u>
Taxable profit	<u>785,000</u>	<u>343,000</u>	<u>442,000</u>
Income Tax			
On the first K74,400		9,960	9,960
On the balance:			
37.5% x (343,000 - 74,400)/ (442,000 - 74,400)		<u>100,725</u>	<u>137,850</u>
Income tax payable		<u>110,685</u>	<u>147,810</u>

# APPENDIX 2 – BUSINESS RUN AS A COMPANY AND YOU DRAW EMOLUMENTS

If Chisenga and Mukuni run the business as a company and draw gross emoluments:

#### Chisenga

(1) NAPSA Contribution payable	= 5% x K214,706
	= <u>K10,735</u>

(2) Income tax computation for the tax year 2017

Gross emoluments Less approved fund contribution – NAPSA (maximum) Taxable emoluments	K 300,000 <u>(3,060)</u> <u>296,940</u>
Income Tax payable On the first K74,400 On the balance: 37.5% x (K296,940 – 74,400) Income Tax payable	9,960 <u>83,453</u> <u>93,413</u>

#### Mukuni

- (1) NAPSA Contribution payable = 5% x K214,706 =  $\underline{K10,735}$
- (2) Income tax computation for the tax year 2017

	Γ
Gross emoluments	400,000
Less approved fund contribution – NAPSA (maximum)	<u>(3,060)</u>
Taxable emoluments	<u>396,940</u>

v

Income Tax payable On the first K74,400 On the balance: 37.5% x (K396,940 – 74,400) Income Tax payable		9,960 <u>120,953</u> <u>130,913</u>
CM Ltd		
(1) NAPSA Contribution payable = 5% x K214,706 x 2 = $\underline{K21,470}$		
(2) Company income tax computation for the tax year 2017		
Tax adjusted profit	K	K 800,000
Add motor car benefits		000,000
Chisenga's motor car	30,000	
Mukuni's motor car	30,000	
	<u></u>	60,000
		860,000
Less employee costs		,
Chisenga's emoluments	300,000	
Mukuni's emoluments	400,000	
Employer's NAPSA contributions	<u>21,470</u>	
		(721,470)
		138,530
Less capital allowances:		
Chisenga's motor car		
20% x K70,000	14,000	
Mukuni's motor car		
20% x K80,000	16,000	
Total capital allowances		<u>(30,000)</u>
Taxable profit		<u>108,530</u>
Company income tax payable		27.005
35% x K108,530		<u>37,986</u>

# APPENDIX 3 - BUSINESS RUN AS A COMPANY AND YOU DRAW DIVIDENDS

#### CM Ltd

- (1) NAPSA contributions will not be payable because dividends are not earnings for the purposes of NAPSA contributions.
- (2) Withholding tax payable = 15% x (K300,000 + K400,000)= K105,000
- (3) Company income tax computation for the tax year 2017
   K K
   Tax adjusted profit
   Add motor car benefits
   Chisenga's motor car
   30,000

Mukuni's motor car	30,000	
		60,000
		860,000
Less capital allowances:		,
Chisenga's motor car		
20% x K70,000	14,000	
Mukuni's motor car		
20% x K80,000	16,000	
Total capital allowances		(30,000)
Taxable profit		<u>830,000</u>
Company income tax payable		
35% x K830,000		<u>290,500</u>

# **APPENDIX 4 – COMPUTATION OF TOTAL STATUTORY PAYMENTS**

Calculation of total statutory payments under each alternative forms of business

Partnership	Company	
	Emoluments	Dividends
Κ	Κ	Κ
	10,735	
	10,735	
	21,470	
110,685	93,413	
147,810	130,913	
	37,986	290,500
		<u>105,000</u>
<u>258,495</u>	<u>305,252</u>	<u>395,500</u>
	K 110,685 147,810	Emoluments K K 10,735 10,735 21,470 110,685 93,413 147,810 130,913 37,986

#### Alternative solution

Calculation of income net of statutory payments under each alternative

	Partnership		oany
	Emoluments dividend		dividends
	K	Κ	K
Profit	800,000	800,000	800,000
NAPSA contributions			
Chisenga		(10,735)	
Mukuni		(10,735)	
CM Ltd		(21,470)	
Income Tax			
Chisenga	(110,685)	(93,413)	
Mukuni	(147,810)	(130,913)	

CM Ltd		(37,986)	(290,500)
Withholding tax			<u>(105,000)</u>
Net income	<u>551,505</u>	<u>494,748</u>	<u>404,500</u>

# SOLUTION TWO

# (a) MCC Ltd COMPUTATIONS OF THE FINAL TAXABLE PROFITS FOR THE YEARS ENDED 31 DECEMBER

	2014	2015	2016
	Κ	Κ	Κ
Tax adjusted mining profits	Nil	8,190,476	7,340,000
Loss relief (W)	Nil	(4,095,238)	(3,670,000)
Final taxable mining profit	Nil	4,095,238	3,670,000
MINING LOSS RELIEF COMPUTAT	ΓΙΟΝ		
			Κ
Indexed mining loss b/f			10,095,238
K10,600,000 × (1+[ (K10.00-K10.50)/	(K10.50])		
loss relief in the tax year 2015			
Restricted to $(50\% \times K8, 190, 476)$			(4,095,238)
Unrelieved loss c/f at 31 December 20	15		6,000,000
Indexed mining loss b/f			
K6,000,000 × (1+[ (K9.45 –K10.00)/I	K10.00])		5,670,000
loss relief in the year ended 31 Decem	ber 2016		
Restricted to $(50\% \times K7,340,000)$			(3,670,000)
Unrelieved loss c/f at 31 December 20	16		2,000,000

	Κ	Κ
Profit before tax		16,670,000
Add		
Disallowed excessive loan interest	400,000	
$(0.75/3,75 \times K2,000,000)$	200.000	
Drilling boreholes	380,000 220,000	
Sewerage and Drainage Street lighting system	90,000	
Street lighting system		1,090,000
		17,760,000
Less		
Capital allowances (W1)	547,500	
Mineral royalty (K49,000,000 x 6%)	2,940,000	
Fixed deposit interest	54,000	
Dividend income	190,000	
		(3,731,500)
Adjusted mining profits		14,028,500
Less mining loss relief (W2)		(2,031,746)
Taxable mining profits Fixed deposit interest		11,996,754 54,000
Taxable business profits		12,050,754
-		
COMPUTATION OF TOTAL INCOME T	AX PAYABLE	
		K
Company income tax on interest income		10.000
(K54,000 x 35%)		18,900
Company income tax on mining profits (K11,996,754 x 30%)		3,599,026
(111,))0,1517 5070)		<u>3,617,926</u>
Less		, ,
WHT on Fixed deposit interest (K54,000 x		(8,100)
15%)		
Provisional income tax		<u>(2,917,926</u> )
Company income tax payable		<u>    691,900</u>
WORKINGS		
(1) COMPUTATION OF CAPITAL ALL	OWANCES	
		Κ
Boreholes		
Wear and tear allowance $(K_{280}, 000 \times 25\%)$		05 000
(K380,000 x 25%)		95,000
Sewerage and drainage system		
Wear and tear allowance		
(K220,000 x 25%)		55,000

Street lighting system Wear and tear allowance (K90,000 x25%)	22,500
Mining equipment Wear and tear allowance (K1,500,000 x 25%)	<u>375,000</u>
(2) Loss Relief	<u>547,500</u>
Indexed Mining loss b/f at 1.01.2017 (K2,000,000 × [1+ [(9.60 – 9.45)/9.45]] Loss relief Unrelieved loss c/f at 31.12.2017	2,031,746 (2,031,746) Nil

# SOLUTION THREE

(a	)	Zambian	VAT	positions	of each	company:
----	---	---------	-----	-----------	---------	----------

(i)	SKY Ltd	K'000	K'000
	Output Tax Sales Revenue: 16% x K456,000,000 x 75% Management fees: 16% x K40,000,000 + K35,000,000)		54,720 <u>12,000</u>
	Total output VAT Less recoverable input VAT Purchases and expenses		66,720
	16% x K245,000,000 Overheads	39,200	
	16% x K90,000,000 x 75% Commercial Plot of land: 16% x K1,500,000	10,800 240	
	Total recoverable input VAT VAT payable	240	<u>(50,240)</u> <u>16,480</u>
(ii)	SUN Ltd	K'000	K'000
	Output Tax		
	Sales Revenue: 0% x K420,000,000		Nil
	Commercial Plot of land: 16% x K1,500,000		240
	Total Output Tax		240
	Less recoverable input VAT		
	Purchases and expenses 16% x K178,000,000	28,480	
	Management fees	20,400	
	16% x K40,000,000	<u>6,400</u>	
	Total recoverable input VAT		<u>(34,880)</u>
	VAT repayable		<u>(34,640)</u>

#### (iii) <u>MOON Ltd</u>

This company makes only exempt supplies. It cannot therefore register for VAT and as a result, it cannot charge VAT or recover any input VAT.

#### (iv) <u>CLOUD Ltd</u>

This company is not resident in Zambia. It cannot therefore register for VAT in Zambia. It has neither VAT payable nor repayable in Zambia.

(v) <u>Net VAT position of the group companies</u>

	K <sup>2</sup> 000
VAT payable by SKY Ltd	16,480
VAT repayable to SUN Ltd	<u>(34,640)</u>
Net VAT repayable	<u>(18,160)</u>

171000

(b) The supplies of services made by CLOUD Ltd to SKY Ltd, SUN Ltd and MOON Ltd will result in each of the three Zambian resident companies being subjected to reverse Value Added Tax (VAT).

Reverse VAT will arise because CLOUD Ltd does not have a tax paying agent in Zambia. If CLOUD Ltd had a tax paying agent in Zambia, reverse VAT would not arise on the value of services that the three Zambian companies import from CLOUD Ltd.

Each of the three companies will have to calculate reverse VAT as output VAT.

The amount of reverse VAT for each company will be as follows in the year ended 31 December 2017:

Reverse VAT = 30% x K323,000,000 x 16% x 1/3

= <u>K5,168,000</u>

The amount of reverse VAT cannot be recovered as input VAT.

- (c) Because SKY Ltd and SUN Ltd are members of a group and both companies are resident in Zambia, the transfer of property by SUN Ltd to SKY Ltd may be determined to have no realised value. This is because the transfer was made as part of the internal re-organisation of the group. Therefore, SUN Ltd will not be required to pay Property Transfer Tax.
- (d) The transfer of the shareholding in SUN Ltd by SKY Ltd to CLOUD Ltd will not result in any changes in the income tax positions of the companies. Each company that will be earning income from Zambian sources as well as from deemed Zambian sources will continue to be chargeable to company income tax in Zambia.

The transfer of the shareholding by SKY Ltd to CLOUD Ltd will not result in any charge for Value Added Tax as this is a sale of a business and as such it is outside the scope of VAT.

The transfer of the shareholding by SKY Ltd to CLOUD Ltd will have a realized value of K96,000,000 for the purposes of Property Transfer Tax. However, if the transfer of the shareholding is made as part of the internal re-organisation of the group, there will be no property transfer tax payable because SKY Ltd and CLOUD Ltd are members of a group.

- (e) (1) The interest will be paid by CLOUD Ltd to SKY Ltd net of Withholding Tax at the rate of WHT applicable in Southland. Thin capitalization rules may apply.
  - (2) The debenture interest will be received by SKY Ltd net of foreign WHT but the taxable amount will be the gross amount. Therefore, SKY Ltd will be chargeable to company income tax on the total income including the gross amount of foreign debenture interest. The taxable interest may be adjusted by transfer pricing adjustments if the interest rate is not set at an arm's length rate.
  - (3) Double taxation relief may be available by way of treaty relief if there is a double taxation convention between Zambian and Southland or by way unilateral relief if there is no double taxation convention between Zambia and Southland.

#### **SOLUTION FOUR**

- (a) Ndanji should have made the following adjustments to the net profit shown in the statement of profit or loss when computing the taxable profit for the tax year 2017;
  - (1) Depreciation of non-current assets is not allowable when computing taxable profit and should have been disallowed.
  - (2) If a trader withdraws goods for personal or family's use, he should be charged at the market value of the goods. If the goods have not been recorded in the financial statements, then the amount to be added to the accounting profit is the market value of the goods. Therefore Ndanji should the disallowed K375,000 (K250,000 x 150/100) in respect of the goods when computing the taxaxble business profits.
  - (3) Appropriation of profits such as wages and salaries of owners of a trade, profession or vocation are not allowed as expenses for tax purposes. Therefore, the salary drawn by Ndanji is should have been added back to the net profit for the year in computing the taxable business profit.
  - (4) If a trader employees members of his family, wages and salaries paid to them will be disallowed if they are unreasonable or not wholly and exclusively incurred. The wages and salaries paid to employees who are non-members of the trader's family will also be taken into consideration in establishing whether the payments to members of the family were reasonable. In respect of the salary for Ndanji's wife K72,000 [(K10,000 – K4,000) X 12] should have been added back to accounting profit for the year being excessive.

- (5) Where an expense is incurred both for business and non-business reasons by a sole trader, the allowable expenditure is restricted the business proportion Therefore, in respect to motor vehicle running expenses on Ndanji's motor car the allowable amount should have been restricted to 25%. The remaining 75% of the expenses should have been disallowed added back to accounting profit for the year in computing the taxable business profit. The disallowed amount is K67,500 (K90,000 X 75%)
- (6) Capital expenditure is not allowable in calculating taxable profits. However relief on capital expenditure incurred to acquire implements, plant and equipment to be used in the business is given in form of capital allowances. Ndanji should therefore have deducted capital allowances on the delivery vans and computers used in his business. In relation to his personal motor vehicle the capital allowance should have been restricted to his business use of the car.

	Κ	Κ
Net profit as per accounts		513,000
Add		
Depreciation	102,000	
Goods for personal use		
(K280,000 x150/100)	375,000	
Private motor car running expenses		
(K90,000 x 75%)	67,500	
Namwinga's excessive salary		
(K10,000 – K4,000) x 12	72,000	
Ndanji's salary (K18,000 x 12)	216,000	
		832,500
		1,345,500
Less:		
Capital allowances on:		
- Ndanji's car		
(K220,000 x 20%) x 25%	11,000	
- Delivery vans		
(K250,000 x25%) x 2	125,000	
- Computers K30,000 x 25%	7,500	
-		(143,500)
Taxable income		1,202,000

#### COMPUTATION OF REVISED TAXABLE PROFIT

(b) Computation of correct amount of income tax payable in the tax year 2017

The amount of income tax underpaid is:

(K1,202,000 - 513,000) x 37.5%

K258,375

This can alternatively be computed as:

# COMPUTATION OF TOTAL ACTUAL INCOME TAX PAYABLE ON ADJUSTED BUSINESS PROFIT

Actual taxable business profit	<u>K1,202,000</u>
	К
On first K74,400	9,960
On excess K1,127,600 x 37.5%	422,850
	432,810

#### INCOME TAX COMPUTED ON NET PROFIT

Net profit as per accounts	<u>K513,000</u>
First 74,400 On excess K438,600 x 37,5%	9,960 <u>164,475</u> <u>174,435</u>
Tax under paid K432,810 – K174,435	<u>258,375</u>

- (c) Ndanji is exposed to penalties and interest due to late payments of taxes. He is also exposed to penalties for late filling of returns and for filling incorrect returns as explained below:
  - (1) The Provisional income tax return for the first quarter was submitted on 30 June 2017, when it should have been submitted on 31 March 2017. It was therefore filed late by 3 months.

A penalty of 1,000 (K300) penalty units per month or part thereof will arise running from the due date to the date when filed. The amount of the penalty will be:

1000 x 3 = 3000 penalty units or K900

(2) The first instalment of provisional income tax for the first quarter of 2017 was paid late. It was paid on 30 June 2017, when it should have been paid by 10 April 2017. It was therefore paid late by 2 months and 21 days.

A penalty of 5% of the tax due per month or part thereof will arise. The amount of penalty payable will be:

5% x K33,015 (W) x 3 = K4,952.

Additionally interest on the overdue tax will arise. The amount of interest will be 2% above the BOZ policy rate per annum.

The amount of interest payable will be:

(11% + 2%) x K33,015 x 3/12

= K1,073

WORKINGS:

#### COMPUTATION OF PROVISIONAL INCOME TAX PAYABLE:

Estimated taxable profit	<u>400,000</u>
First K74,400	K 9,960
On excess K325,600 x 37.5%	$\frac{122,100}{122,060}$
	132,000

Provisional income tax payable per quarter is:

K132,060/4 = K33,015

- (3) Penalties and interest will be chargeable on the underpaid tax for the tax year 2017 of K258,375 (computed in part (c)) running from 21 June to the date when the tax will be paid.
- (4) Additional penalty

Where the amount of provisional income tax paid is less than the actual total income tax for the tax year by at least one third, then an additional penalty at the rate of 10% of the underpaid income tax will arise.

One third of the actual income tax payable is K144,270 ( $1/3 \times K432,810$ ). The total provisional income tax paid of K132,060 was less than this and therefore the additional penalty will arise.

The amount of the additional penalty will be:

 $(K432,810 - K132,060) \times 10\% = K30,075$ 

(5) Filing incorrect returns

The self-assessment return was incorrect as the net profit for year was used and not the taxable profit

If the incorrect returns are determined to be fraudulent, a fine for submitting fraudulent returns may be charged which is 3000 penalty units and/or there may be imprisonment.

#### **SOLUTION FIVE**

(a) Tax evasion refers to the use of illegal means to avoid tax. Such means include failing to disclose the relevant amounts of income and other forms of fraud which the tax payers may engage in. The aim of the tax payer practicing tax evasion is to defraud the government of the revenue.

Tax evasion arises when taxes are perceived to be too high or unfair on the tax payers. Another cause of tax evasion may be intentional where the tax payer intentionally hides some income.

Tax evasion is an offence and may be punishable by fines and/or imprisonment. On the other hand, tax avoidance is concerned with identifying any loop holes in the taxes legislation, and using them to minimize or defer tax liabilities. Tax avoidance is, however difficult to define more thoroughly.

Tax avoidance is caused by tax payers planning their tax affairs so as to minimise or defer taxation liabilities.

Tax avoidance is not an offence, though, to discourage its practice, the government may issue anti-avoidance legislation. Anti-avoidance legislation aims at sealing the loop holes in the taxes legislation so as to prevent taxpayers from taking advantage of them, and thereby reducing their tax liabilities lawfully.

Paying taxes is a moral obligation for all taxable persons. Actions taken to reduce taxes payable because the taxable person intentionally wants to pay less or because the taxes legislation is inadequate could be considered as unethical practices.

(b) The features and personal income tax implications of the protection products are as follows:

(i) Whole of Life Assurance where the policy provides life protection. The sum assured is payable on death at any time and usually some form of investment benefit will accrue in the form of a surrender value.

The personal income tax implications are that the premiums payable to purchase the product are not tax deductible. The benefits receivable are also not taxable on the individual.

(ii) Family income benefit is a policy that pays out where the life/lives assured die within the policy term, the benefit being paid as instalments of capital over the remaining policy term. Such a policy might be used where there is a need to keep premiums low or where budgeting for lump sum proceeds would present a problem.

The personal income tax implications are that the premiums payable to purchase the product are not tax deductible. The benefits receivable are also not taxable on the individual.

(iii) Permanent health insurance policies are designed to provide the policyholder with a benefit if he or she is unable to work through sickness or if he or she needs medical expenses or long-term care.

The personal income tax implications are that the premiums payable to purchase the product are not tax deductible. The benefits receivable are also not taxable on the individual.

(c) The procedure for the approval of a share option scheme starts with the company preparing the constitution and scheme rules, whilst referring to the conditions for approval. Once these have been prepared, the company must make an application for approval to the Commissioner General. The application must be in writing and must be accompanied by copies of the constitution and scheme rules.

Upon receiving the application, the Commissioner General reviews the constitution and scheme rules to determine whether all the conditions for approval have been satisfied.

The Commissioner General would then grant the approval and communicate in writing that the scheme has been approved, stating the tax year from which the approval applies for the first time. Where the Commissioner General does not grant the approval, he still communicates to the applicant in writing and the company may later re-apply.

- (d) The tax benefits of operating approved share option schemes are as follows:
  - (i) To the employer:
    - (1) The costs incurred in setting up and operating the scheme are tax deductible.

- (2) There is no property transfer tax on the shares transferred under the scheme.
- (3) The income of the scheme is not chargeable to income tax
- (ii) To the participating employees:
  - (1) There is no Income Tax charge when the share options are granted at an exercise price that is less than the market value at the time of grant.
  - (2) There is no income tax charge when the share options are exercised.

# **END OF SOLUTIONS**



CA ZAMBIA PROGRAMME EXAMINATIONS

ADVISORY LEVEL

CA 3.5: ADVANCED MANAGEMENT ACCOUNTING

TUESDAY 12 DECEMBER 2017

TOTAL MARKS - 100; TIME ALLOWED: THREE (3) HOURS

# INSTRUCTIONS TO CANDIDATES

- 1. You have fifteen (15) minutes reading time. Use it to study the examination paper carefully so that you understand what to do in each question. You will be told when to start writing.
- 2. This paper is divided into TWO sections:

Section A: One (1) Compulsory scenario question. Section B: Four (4) Optional scenario Questions. Attempt any Three (3) questions.

- 3. Enter your student number and your National Registration Card number on the front of the answer booklet. Your name must **NOT** appear anywhere on your answer booklet.
- 4. Do **NOT** write in pencil (except for graphs and diagrams).
- 5. **Cell Phones** are **NOT** allowed in the Examination Room.
- 6. The marks shown against the requirement(s) for each question should be taken as an indication of the expected length and depth of the answer.
- 7. All workings must be done in the answer booklet.
- 8. Present legible and tidy work.
- 9. Graph paper (if required) is provided at the end of the answer booklet.

#### **SECTION A**

#### This question is compulsory and must be attempted

#### **QUESTION ONE**

Super Stores Retailers (SSR) Plc is a company with online stores, warehousing and freight divisions.

#### **Retail Division**

SSR plc has real need for employees who have good people skills. Many salespersons work evenings, weekends, and long hours from Christmas through the beginning of January, during peak sales, and in other peak retail periods. So a lot of training and motivation is required. But SSR Plc is struggling in this area relative to industry sector metrics

SSR plc operates fixed point-of-sale locations, located and designed to attract a high volume of walk-in customers. It has extensive displays of merchandise and uses mass-media advertising to attract customers. Typically it sells merchandise to the general public for personal or household consumption, but also serves business and institutional clients.

#### **Challenges in Retail Area**

Challenges for SSR plc include operating on razor-thin margins, static domestic markets, volatile economic situation, need to globalize and exploit unfamiliar

segment, need to achieve critical mass, rapid consumer demand shifts, supply chain coordination, and relentless competition. SSR pls is looking for innovative ways of responding to evolving markets, competitive pricing, new product rollouts, and changing consumer tastes. Existing retail technology is fragmented, with limited integration between storefront and corporate systems and even less between the enterprise and its supply chain partners. Aging platforms are proving inflexible, expensive to maintain, difficult to integrate and dependent on a shrinking base of experienced support talent.

#### Warehousing and Freight Division Challenges

Every day SSR plc struggles to respond to shifting market opportunities, its supply chain is not equipped to keep up with its expanding and contracting needs. It continues to increase the number of stores, while the infrastructure supporting them requires more capital investment than it can make right now. Moreover, at times the company heavily promotes an item that may or may not arrive in time.

SSR plc commissioned a consulting firm called Siyabonga Accountancy and Business Management Consultants (SABMC). It commented that in a retail environment where it is increasingly more difficult to show a competitive advantage while maintaining profit margins, SSR plc needed to focus on its retail strategy rather than deal with supply chain issues. By so doing, it may reap the following results.

- (i) Reduction in inventory without jeopardizing its safety inventory, with a comprehensive solution that includes supply chain design, planning, and implementation.
- (ii) Gain assurance that purchase orders are being fulfilled as promised and also gain control and visibility into its product pipeline through using software technology which enables latest advanced tracking, event reporting and data analysis.
- (iii) SSR plc may meet the latest market trends by increasing its speed to market through solutions focused on increasing efficiency and minimizing costs. And finally, to eliminate the need for distribution centers and to reduce time in transit by transporting products directly to its stores or customers' doors.

Financial and Non-Financial Performance Data				
	<b>Online store</b>	Wholesale	Freight	
	10.000			
Sales (K'000)	10,000	4,000	5,000	
Cost of sales (K'000)	9,000	3,000	3,200	
	100	500	000	
Divisional running costs (K'000)	400	500	800	
Non-Current assets (NCA) (K'000	) 2,000	1,000	800	

Staff training costs (K'000)	100	<u>100</u>	<u>100</u>
(included in running costs)			
Number of employees	100	40	80
Square metres	8,000	N/A	N/A
Delivery times	N/A	4 days	2 day
Number of lines stocked	1,000	N/A	N/A
Goods returned (units)	1,000	N/A	N/A
Enquiries	N/A	150,000	80,000.
Orders	N/A	100,000	50,000
Number of lorries	N/A	60	100
Service complaints	<u>400</u>	<u>150</u>	<u>32</u>

All divisions are willing to order goods not stocked for customers or provide Freight and Wholesale to areas not regularly served. A customer satisfaction survey across all divisions revealed a 75% rating of satisfactory or above.

Average data for the relevant industry sectors is as follows:

	<b>Online store</b>	Wholesale	Freight
Sales (K'000)	20,000	10,000	12,000
Cost of sales (K'000)	17,400	7,600	8,000
Divisional running cos (K'000)	sts 700	1,000	1,500
Non-Current assets (K'000)	3,000	2,400	1,500
Staff training costs (K'000)	500	300	400
(included in running costs)			
Number of employees	180	150	180
Square metres	18,000	N/A	N/A
Delivery times	N/A	72 hours	72 hours
Number of lines stocked	1,500	N/A	N/A
Goods returned (units)	1,000	N/A	N/A
Enquiries	N/A	200,000	250,000
Orders	N/A	160,000	175,000
Number of lorries	N/A	160	250
Service complaints	120	350	104
Satisfaction rating in survey	90%	75%	88%
	=	=	=

The Online store division has recently suffered a falling off in business. Research conducted by outside consultants (the SABMC Consultants mentioned above) has found this to be 60% due to quality problems and 40% due to food poisoning from products from suppliers sold in the store. Estimates suggest that turnover will fall by K1,000,000 as a result of these problems. An additional spending of K2,000 per

employee on training will resolve quality problems, and supplier liaison and monitoring of goods supplied will cost an extra K100,000. Due to the low margins in the past, such measures had not been implemented. Publicity for these measures will cost K50,000 and provide an additional K5 million of sales.

# **Required:**

- (a) (i) Calculate relevant performance measures for SSR Plc. (8 marks)
  - (ii) Analyse performance measures using these calculations and other relevant data and draw out the implications of these performance measures for the divisions. Make use of the five dimension of performance measurement of *'financial performance, Resource utilization, Competitiveness, Quality of service and Flexibility* 'to structure your answer. (10 marks)
  - (iii) Show how quality problems in the online store division can be categorised as internal and external failure costs, and appraisal and prevention costs, including the total cost under each category. (6 marks)
  - (iv) Analyse the benefits and costs of implementing the new quality procedures and advise management on whether to proceed with the quality initiative.

(4 marks)

(b) Corporate (strategic) planning indicates the direction and scope of an organisation over the long term. In doing so, corporate planning achieves an advantage for the organisation through its configuration of resources within a changing environment, to meet the needs of markets and fulfill stakeholder expectations.

### **Required:**

Explain the role of corporate planning in clarifying corporate objectives and making strategic decisions. (6 marks)

(c) Professor Michael Porter suggested that for any industry, the five forces determine its profitability. These forces influence the state of competition in the industry and collectively determine the profit potential of the industry as a whole. In the scenario above, these forces are at play in SSR plc's industry.

### **Required:**

Identify five competitive forces in the environment of SSR Plc and discuss the threat posed to SSR plc by each of these forces.

(6 marks) [Total: 40 Marks]

#### **SECTION B**

#### Attempt any THREE (3) questions in this section.

#### **QUESTION TWO**

Trade Chiefs Plc (TCP) has three divisions namely Bingo, Cingo and Dingo. The management of TCP is concerned that the divisional performance reports may not show a fair view of the performance of each division and would like you to explain any weaknesses in the reports presented below. They are also concerned that the existing transfer prices negotiated between the divisions may have contributed to a distorted view of the performance of the divisions which may have resulted in decisions that are not in the best interests of TCP as a whole.

The following are the recent performance summaries of the three divisions:

Division	Bingo	Cingo	Dingo
	K'000	K'000	K'000
Sales (net of returns)	3,750	5,000	10,000
Variable production costs	1,250	1,750	5,750
Fixed production costs	1,500	1,250	2,000
Administration costs	1,500	1,250	1,000
Profit	250	1,375	1,250

Capital employed	10,000	13,750	10,375
------------------	--------	--------	--------

### Additional information

- 1. Divisions are free to trade with each other without any interference from Head Office. The managers of the respective divisions negotiate transfer prices between themselves. During the year included in the above costs and revenue are the following transactions:
  - Division Bingo sold goods for K100,000 to Division Cingo. The price negotiated was agreed on a unit basis between the managers of the two divisions. The variable production cost of these in Division Bingo was K90,000. Division Bingo was operating under capacity and agreed to a transfer price that was little more than its own variable cost.
  - Division Dingo sold goods for K75,000 to Division Cingo. The price negotiated was agreed on a unit basis between the managers of the two divisions. The variable production cost of these items in Division Dingo was K45,000. Division Dingo was operating under capacity and negotiated a transfer price based on its total production cost.
- 2. Included in the Administration costs for each division are the following management charges from Head Office: Bingo K50,000; Cingo K40,000; Dingo K75,000.
- 3. At the start of each year Head Office sets each division a target Return On Capital Employed. The target depends on their nature of the work and their industry sector. The following targets were set for the most recent financial year:

#### Bingo: 7% Cingo: 2% Dingo: 17%

#### **Required:**

- (a) Discuss the shortcomings of the above performance summaries when assessing the performance of each division (6 marks)
- (b) Discuss the potential problems of negotiated transfer pricing, and how these have impacted on the performance of each Divisions for the most recent financial year.

(6 marks)

(c) Prepare an alternative statement that is more useful for measuring and reporting the performance of all the three divisions, clearly showing external and internal information for each division.
 (8 marks)

[Total 20 marks]

### **QUESTION THREE**

Lusaka Sports Academy Plc is a community based company with two subsidiaries. One of the subsidiaries, Welcome Ltd, provides the following three services: Counselling, physical education and project management.

The budgeted income statements of the three services lines for the next financial year are as follows:

		Physical		
		education and	Project	
	Counselling	training	management	Total
	K	K	K	K
Charge fees	4,250,000	2,620,000	4,538,000	11,408,000
Salaries	1,250,000	480,000	600,000	2,330,000
Variable costs	600,000	300,000	135,000	1,035,000
Fixed costs	471,250	2,356,250	2,827,500	5,655,000
Net profit/(loss)	1,928,750	(516,250)	975,500	2,388,000

Fixed costs have been apportioned among the three service areas based on the budgeted number of consultations provided during the year. This is as follows:

	Number
Service	of consultations
Counselling	600
Physical education and training	3,000
Project management	3,600

An activity based costing study recently undertaken on behalf of the management of Welcome concluded that 80% of fixed costs are determined by time spent on activities as per the following table:

Activity	Cost driver	Counselling	Physical education and training	Project management	Other fixed costs (K'000)
Pre-contract meetings	Number of meetings per consultation	4	2	1	1,932
Assessment of clients needs	Days per consultation	2.25	0.5	0.25	1,290
Monitoring and support	Days per consultation	3	0.5	0.25	1,302

The remaining 20% of other fixed costs are attributed to the types of service as follows:

	K
Counselling	352,200
Physical education and training	486,750
Project management	292,050

The management of Welcome Ltd has asked you to calculate the profit or loss of each service line using an activity based costing approach using the cost drivers above. Management would also like you to explain the impact of using activity based costing on performance management at Welcome Ltd. The managers have also heard the term 'operational activity based management' but are not sure exactly what this means.

#### **Required:**

(a) Recalculate the budgeted profit for each service using activity based costing.

(7 marks)

- (b) Evaluate the impact of moving to activity based costing information on performance management at Welcome Ltd. (9 marks)
- (c) Discuss the importance of 'operational activity based management' (4 marks) [Total 20 Marks]

### **QUESTION FOUR**

A State-owned firm ZIKI Ltd was founded in 1977. Its economic role in the country was to provide a strategic linkage of turning raw copper into cables and other finished products. The thinkers of the ZIKI concept felt that if truly Zambia was to be fully independent, it needed to show the world that economic freedom was part of the package of independence. The central theme to the ZIKI concept was value addition.

Mr. Sianga Silumesi a holder of the Zambia Diploma in Accountancy (ZDA) spearheaded a number of changes in the accounting department. For example he restricted access to the IT system to very few people and those were the ones allowed to input data. There has been a bias on financial controls and Mr. Silumesi concentrates on the following management accounting techniques:

- 1. Breakeven analysis
- 2. Budgeting
- 3. Product costing
- 4. Return on investment

The 2016 audited Financial Statements of ZIKI Ltd showed a deterioration of profits and unstable cash position. The critics of the current Management of ZIKI attribute the poor performance to the management accounting practices which they have termed as traditional and they have gone viral on social media blaming the caliber of accountants whom they accuse to be out of reality in comprehending the complexities of modern management accounting. Jonas Kalule a ZICA Fellow and an influential social media blogger with over 200,000 followers harshly said "It is time we pointed out the truth and we should all not fear

to say as it is. Remember it is tax payer's money which shall be used to resuscitate ZIKI Ltd. I suggest that all the top finance staff be retired in national interest and let there be a search by independent hiring firm to employ Hybrid accountants. Management accounting is nothing but presentation and analysis of accounting information which is useful to management"

# **Required:**

- (a) Discuss the statement made by Jonas Kalule on Management Accounting presentation and analysis of accounting information. (5 marks)
- (b) Discuss why "Hybrid accountants" would be appropriate for ZIKI Ltd (5 marks)
- (c) Explain the following contemporary management accounting techniques that could be used ZIKI Ltd:
  - (i) Activity based management
  - (ii) Balanced scorecard
  - (iii) Target costing
  - (iv) Kaizen costing

(10 marks) [Total: 20 marks]

### **QUESTION FIVE**

Founded in 1995 in Lusaka, Skeem Laka Plc is a Zambian-based grocery and general merchandising retail chain. In the last 10 years it has penetrated in Malawi, Zimbabwe, Lesotho and Kenya with revenues of K800 million (2016) and forecasted revenues of K1.2 billion in 2017.

Skeem Laka Plc is a national pride and highly revered by the public such that its Executive Director is often invited for business trips with government officials around the world to attend top notch business conferences. The company has slightly over 3,500 employees and pays annual tax averaging K300 million. The company has signed up contracts with peasant farmers dotted across the country and these farmers supply farm produce such as tomatoes, onions, cabbages, green beans, oranges and apples. They support farmers with input materials and encourge organic farming of which Skeem Laka has taken personal interest in organising training activities on a semi annual basis. Farmers are not encouraged to cut down trees in the process of ploughing the land for planting purposes. Skeem Laka Plc is very particular with activities that destroy the environment and four months ago the Board approved the use of Envrionmental Management Accounting (EMA).

The Director of Operations in one of the executive meetings pointed out the need to have an enhanced Enterprise Resource Planning (ERP) system. Unlike the small fragmented systems that the company has been using. He stressed that it was becoming expensive to maintain the systems and sometimes the consultants of various systems couldn't agree on certain issues,

hence having problems in achieving seamless intergration for example with the Procurement system (PS) not linking with the financial Management System (FMS).

The Director of Finance argues that having independent systems for transport, customers, stores, Carbon emissions, product design is the best way to hedge against downtimes and weakening the supplier power where no single supplier of the system has undue negotiating power. The Director of Finance is in charge of two of the three elements of Information Strategy, relating to Information Systems (IS) and Information Technology (IT) at Skeem Laka. He proposes in the annual corporate budget a 10% increase in IS/IT expenditure based on the last year budget, for the relevant departments. This will enable system upgrades.

The third element of Information Management (IM) is under the management of another Director at Skeem Laka.

#### **Required:**

(a)	Discuss the arguments between the Director of Operations and Director	rector of Finance.
		(8 marks)
(b)	Evaluate the information strategy at Skeem Laka Plc	(4 marks)
(d)	Discuss the relevance of Environmental Management Accounting	(4 marks)
(e)	Explain the information strategy using the three elements	(4 marks)
		[Total: 20 Marks]

# **END OF PAPER**

# CA3.5: ADVANCED MANAGEMENT ACCOUNTING SOLUTIONS

# SOLUTION ONE

(a)(i) Relevant performance measures:

	<b>Online store</b>		Wholesale		Freight	
	Div	Sec	Div	Sec	Div	Sec
Gross profit (K000)	1,000	2,600	1,000	) 2,400	1,800	4,000
Net profit (K000)	600	1,900	500	1,400	1,000	2,500
Gross profit (%)	10	13	25	24	36	33
Net profit (%)	6	9.5	12.5	14	20	21
Return on NCA (%) Sales/employee	30	63	50	58	125	167
(K000)	100	111	100	66.7	62.5	66.7

Sales/sq. metre (K)	1,250	1,111	N/A	N/A	N/A	N/A
Training costs per	-,	-,				
employee (K)	1,000	2,778	2,500	2,000	1,250	2,222
Enquiries converted						
into orders (%)	N/A	N/A	66.7	80	62.5	70
Average value of						
orders (K)	N/A	N/A	40	62.5	100	69
Sales/lorry (K000)	N/A	N/A	67	62.5	50	48
Complaints/						
employee	4	0.67	3.75	2.3	0.4	0.6
Complaints as a %						
of orders	N/A	N/A	0.15	0.22	0.064	0.059
Delivery times (days)	N/A	N/A	4	3	1	3
Satisfaction rating	75%	90%	75%	75%	75%	88%

Note: Div = Division and Sec = Sector

(ii) Performance measure analysis is carried out in the five dimensions, namely, financial performance, resource utilisation, competitiveness and quality of service and flexibility

#### **Financial performance**

Absolute measures of profitability such as gross and net profit are generally meaningless here because of the different sizes of divisions and sectors. Therefore ratios will be much more relevant in assessing divisional performance relative to industry sector. Online store shows a lower gross profit percentage than sector, which suggests the division is cutting prices to boost volume or to appeal to a different area of the market. However, this is not the only implication here. While sales per square metre are above industry sector average, sales per employee are under, which suggests the store may have excess personnel or those staff may not be working as efficiently as they might, hence the lower gross profit percentage.

Gross profit percentage is above sector average in both Wholesale and Freight, but net profit is below. This implies that fixed costs in SSR Plc are not well controlled, or that a certain level of fixed overheads is necessary to run such businesses. So, while turnover and gross profit are good, turnover could be higher with no increase in fixed costs, which could absorb the extra profit generated.

#### **Resource utilisation**

Resources employed in the business are Online store space, non current assets, lorries and, since money is spent on developing them as a resource, employees.

Sales per square metre are above sector average, but sales per employee below, a point noted above. Return on non current assets in all divisions is below sector average, possibly due to the cost-cutting aim in online store, and to the high fixed costs in Wholesale and Freight. However, sales per lorry are just above sector average, suggesting average utilisation and a limited ability to gain much more from the assets. Sales per employee are well above average in Wholesale but below in Freight, indicating that some additional output per employee is still required in the latter division.

#### Competitiveness

As has been seen, the online store side is competitive on price, making only 10 ngwee profit on each K1 of sales compared to sector average of 13 ngwee. However, Wholesale and transport convert a lower percentage of enquiries into orders and sales than sector average so it might be reasonable to conclude that prices may be uncompetitive and that some scope for boosting sales through lower selling prices exists. This is certainly true in Freight where the average price per order is K100 against sector average of K69, but Wholesale has only an average of K40 against sector average of K62.50. This difference may be due to delivery times, which are four days for Wholesale, so that lower prices have to be charged because sector average delivery time is 3 days; Freight, on the other hand, can deliver in two days against an average of 3 days so that higher prices can be charged for this express delivery.

#### Quality of service and flexibility

Training costs per employee are low in online store and Freight, but high in Wholesale. While Freight does not seem to suffer unduly from this low level of training, online store division has quality problems, as shown by the much lower than average satisfaction rate and the high level of complaints and goods returned. Online store are at the sector average despite having half the turnover, and the division is currently suffering due to the quality failures of the recent past.

Wholesale and transport provide a flexible service to customers, but Online store only stocks 1,000 lines against sector average of 1,500. This may have implications for the popularity of the division as shoppers go elsewhere, thereby diverting potential sales away from the business.

#### (iii) Quality problems and costs

The costs of quality failures are as follows:

	K000
Fall in turnover	1,000
Fall in gross profit (10%)	100
Prevention costs:	
training: K2,000 x 100	200
supplier liaison	100
publicity	50
Potential increase in turnover	5,000
Potential increase in gross profit (10%	<b>6) 500</b>

These can be analysed into:

	Prevention	Appraisal	Internal	External	Total
			Failure	Failure	Costs
	K000	K000	K000	K000	K000
Gross profit fall			60.00	40.00	100.00
Training	200.0				200.00
Liaison		100.0			100.00
Publicity	<u>12.5</u>	<u>12.5</u>	<u>12.5</u>	<u>12.5</u>	50.00
Totals	<u>212.5</u>	<u>112.5</u>	<u>72.5</u>	<u>52.5</u>	<u>450.00</u>

Publicity has been allocated to all four areas as the public needs to know that all four areas are covered by the new procedures so that confidence in the division can be restored.

(i) Total maximum costs of implementing the quality initiative: K450,000.

Total maximum benefits in K terms: K500,000.

Therefore the initiative is worth undertaking in terms of money. However, this additional spending has implications for quality in general. Additional training and appraisal costs should result in better-quality service all round, so better returns and reputation will result. In addition, resource utilisation will be improved. The sales per square metre will rise from K1,250 to K1,875 (K15,000,000/8,000) and sales per employee will be boosted to (K15,000,000/100) = K150,000, well over the sector average. The renewed reputation for quality should enhance sales even further so that ultimately the improvements in quality will bring many more benefits than just the increased turnover and profit for one year.

- (b) The role of corporate planning in clarifying corporate objectives and making strategic decisions include:
  - i) Corporate planning helps to identify the corporate objectives that are consistent with the mission statement and at the same time SMART (i.e. Specific, Measurable, Achievable, Relevant and Timely) and critical to the organisation's success.
  - ii) Corporate planning, therefore, considers not only the strategies that take into consideration the extent to which the existing resource base of the organisation is suited to the environmental opportunities but also the extent to which resources can be obtained and controlled to take a decision for the future course of business.

- iii) Corporate planning also ensures that the objectives are set for the foreseeable future and are quantifiable.
- iv) Corporate planning ensures that strategic decisions are taken at the corporate level based on the SWOT analysis and gap analysis of the organisation. The scope of corporate planning includes not only decision making but also control of the actual performance in order to ensure that corporate goals are being pursued.
- v) Corporate (strategic) planning indicates the direction and scope of an organisation over the long term. In doing so, corporate planning achieves an advantage for the organisation through its configuration of resources within a changing environment, to meet the needs of markets and fulfill stakeholder expectations.
- vi) The scope of corporate planning includes not only decision-making but also the control of actual performance in order to ensure that the corporate goals are being pursued.
- vii) Corporate plans help in devising a workable action plan to achieve corporate objectives based on all possible information which is indicative of factors influencing the future of the organisation
- (c) Porter categorises five competitive forces in the environment of a firm as follows.
- i) The threat of new entrants

A new entrant will bring extra capacity into an industry and poses a threat to established firms because they may lose market share with a consequent potential loss of economics of scale.

The strength of the threat from new entrants depends on the strength of the barriers to entry and on the likely response of existing competitors to the new entrant. If prospective new entrants think that competitive retaliation will be strong then they might think twice before deciding to enter the market. We are told that margins are low in SSR plc probably because of extra capacity from new entrants.

ii) The threat of substitute products or services

The products or services that are produced in one industry are likely to have substitutes that are produced in another industry. For example railway travel is a substitute for private motor travel.

Substitutes pose a threat because they limit the ability of a firm to charge high prices for its products and the firm is likely to find the demand for its products is relatively price elastic.

The strength of the threat from substitutes will depend on their price-performance characteristics. Indeed where the existing firms are unable to meet the challenge with similar offerings the market may degenerate into a price war.

iii) The bargaining power of customers

Customers require better quality products and services at lower prices. If they have the power to get what they want they will force down profitability of the firms in the industry.

The strength of the threat from the bargaining power of customers will depend on a number of factors including the level of differentiation amongst products in the industry (including 'intangible' aspects such as customer service), the cost to the customer of switching from one supplier to another and whether a customer's purchases from the industry represent a large or small proportion of the customer's total purchase.

Differentiation in SSR plc's industry is possible. Customer service aspects in this regard include customer complaints and delivery times in the Wholesale and Freight divisions.

iv) The bargaining power of suppliers

Suppliers can influence the profitability of a firm by exerting pressure for higher prices or by reducing the quality of the goods and services which they supply.

The bargaining power of the supplier depends on a number of factors including the number of suppliers in the industry, the importance of the supplier's product to the firm, the cost to the firm of switching from -one supplier to another and the ease with which the supplier could integrate forwards.

v) The rivalry amongst current competitors

The intensity of competitive rivalry within an industry will affect the profitability of the industry as a whole. In the scenario rivalry is high in the sector that SSR plc operates in. Although rivalry can be beneficial in helping the industry to expand, it might leave demand unchanged. In this case the individual firms will be incurring costs on sales promotion campaigns, advertising battles and new product development and they will be charging lower prices and so making lower profits without gaining any benefits except maintaining market share.

The intensity of competition will depend on a number of factors including the rate of growth in the industry and whether there is a large number of equally balanced competitors.

#### **SOLUTION TWO**

#### (a) **Problems with existing performance summaries**

The performance statement states wrong profit figures for Bingo and Cingo. Division Bingo recorded a loss of K500,000 whereas Cingo made a profit of K750,000. The statement does not show the actual return on capital employed achieved by each division, which is: Bingo -5%; Cingo +5% and Dingo +12%. It can thus be seen that only Division Cingo achieved the target that had been set for it by Head Office. However, there are a number of other factors that need to be considered in relation to the performance report.

- (1) The management charges from Head office are presumed to be noncontrollable at divisional level. It is therefore inappropriate to include them in any measure of divisional performance.
- (2) The basis of valuing the capital employed by each division is not stated. It is assumed to be based on the original cost of the assets less accumulated depreciation as a consequence older assets will have lower original costs (due to price inflation) and lower book values (due to more years' depreciation charges). As a result comparisons between divisions may not be a fair comparison. This may also explain the different cost structure that seems to exist in Division Dingo where fixed production costs are approximately 26% of total production costs whereas in divisions Bingo and Cingo the fixed production costs are around 50% of total production costs. This may imply that the equipment used in Divisions Bingo and Cingo is newer and more automated.
- (b) The problem with negotiated transfer prices is that the results of the negotiations is as much affected by the personalities of the managers of each division as it is by the circumstances surrounding the transaction. If one manager has a stronger personality than another, or is a better negotiator then this will act to the detriment of the weaker division and may not be in the best interests of the company as a whole.

The inter-divisional trading affects the performance of all of the divisions. Assuming that the goods sold between the divisions were similar to those that the supplying division sold into the external market, then the following analysis can be made.

- Goods sold by Division Bingo
   The external sales of Division Bingo were K3,650,000 during the year for which the variable cost was K1,160,000, a mark-up of just over 214%.
- (2) Goods sold by Division Dingo The external sales of Division Dingo were K9,925,000 during the year for which the variable cost was K5,705,000, a mark-up of 75%. The mark-up added to the internal sale was 67% so there is not a significant impact on the profit reported by the divisions as a result of these internal transfer prices.

#### (c) Alternative statement

Division	Bingo	Cingo	Dingo
	K'000	K'000	K'000
Net sales – External	3,650	5,000	9,925
Sales- Internal	100	-	75

Total sales	3,750	5,000	10,000
Variable production costs:			
- Own	1,250	1,575	5,705
- Transfer costs		175	
Fixed production costs	1,500	1,250	2,000
Divisional administration costs	1,450	1,210	925
Controllable profit	(450)	790	1,370
Head Office management fees	50	40	75
Uncontrollable Profit	(500)	750	1,295
Capital employed	10,000	13,750	10,375
Return on capital employed (based on uncontrollable profit)	-5%	5.45%	12.48%
Return on capital employed (based on controllable profit)	-4.5%	5.74%	13.20%

# SOLUTION THREE

# (a) Calculation of budgeted profit for each service line using activity based costing

		Physical		
		education and	Project	
	Counselling	training	management	Total
	Κ	Κ	Κ	Κ
Charge fees	4,250,000	2,620,000	4,538,000	11,408,000
Salaries	1,250,000	480,000	600,000	2,330,000
Variable costs	600,000	300,000	135,000	1,035,000
Other fixed costs:				
ABC related	1,408,800	1,947,000	1,168,200	4,524,000
Attributable	352,200	486,750	292,050	<u>1,131,000</u>
Net profit	639,000	(593,750)	2,342,750	<u>2,388,000</u>

# Workings

(1) Apportionment of pre-contract meeting costs

Total costs K1,932,000				
Cost driver		Physical		
	Counselling	education	Project mgt	Total
NO. Of	600	3,000	3,600	
consultations				
NO. Of meetings	4	2	1	
Total meetings	2,400	6,000	3,600	12,000
Cost per meeting	1,932,000/12,000 = 161			
Apportioned cost	386,400	966,000	579,600	1,932,000
	(2,400 x 161)	(6,000 x 161)	(3,600 x 161)	

# (2) Apportionment of assessment of client needs

Total costs K1,290,000					
Cost driver		Physical			
	Counselling	education	Project mgt	Total	
NO. Of	600	3,000	3,600		
consultations					
NO. Of days	2.25	0.5	0.25		
Total days	1,350	1,500	900	3,750	
Cost per day	1,290,000/3,750 = 344				
Apportioned cost	464,400	516,000	309,600	1,290,000	
	(1,350 x 344)	(1,500 x 344)	(900 x 344)		

# (3) Apportionment of monitoring and support costs

Total costs K1,302	,000			
Cost driver		Physical	Project mgt	Total
	Counselling	education		
NO. Of	600	3,000	3,600	
consultations				
NO. Of days	3	0.5	0.25	
Total days	1,800	1,500	900	4,200
Cost per meeting	1,302,000/4,200 = 310			
Apportioned cost	558,000	465,000	279,000	1,302,000
	(1,800 x 310)	(1,500 x 310)	(900 x 310)	

# (4) Summary of activity based costs

Activity	Counselling	Physical education	Project mgt
Pre-contract meetings	386,400	966,000	579,600
Assessment of client	464,400	516,000	309,600

Total	1,408,800	1,947,000	1,168,200
Monitoring & support	558,000	465,000	279,000
needs			

#### (b) Impact of using activity based costing on performance management

Activity based costing aims to allocate fixed overheads more accurately among the service lines at Welcome. The activity based costing study identified three main activities that cause 80% of its fixed costs and identified the drivers that cause these costs to vary (e.g. the number of days). The costs are then apportioned to the three service areas based on how many units of driver they consume. This is a much more reasonable approach to allocating overheads than using the previous method, which simply allocated overheads based on the number of consultants working in each of the service areas.

The impact of using ABC on the budgeted profits of the three service areas is fairly significant. In particular, it appears that the budgeted profits of the Counselling area were overstated by 67% using the absorption costing, meaning that the overheads allocated to that area were not a true reflection of the actual cost. Physical education and training makes a loss under both methods, but the loss is considerably more when ABC is used compared with absorption costing.

Having the accurate information about the costs of each service area will impact performance management at Welcome in many ways. The most obvious one would relate to decisions about resource allocation. Management may wish to expand the service areas that are the most profitable while possibly cutting back those areas that are least profitable or loss making. Given that the true loss in Physical education is considerably more, as reflected by the ABC, managers may not be more willing to keep this area. Project management is doing far better than was anticipated when using the absorption costing. This may be kept by management hence could be used for further expansion the business.

Managers' reward schemes may depend on the profit of their service areas. If these profits are misstated due to inappropriate allocation of fixed costs this would clearly be unfair and may even lead to dysfunctional behaviour. For example, managers may decide to reduce the number of consultants within their business area in order to reduce the fixed costs allocated to their service area. This could lead to a fall in revenue without reducing the fixed costs.

Comparison of ABC profits with current absorption costing method Physical education & Project

	Counselling	training	management	Total
Net profit				
ABC	639,000	(593,750)	2,342,750	2,388,000
Absorption	1,928,750	(516,250)	975,500	2,388,000
Difference	(1,289,750)	(77,500)	1,367,250	nil
Change in %	- 67%	-15%	140%	

(c) Activity based costing was originally developed to enable businesses to more accurately calculate the overhead costs of their products. It soon become apparent however that the information obtained for ABC could be used to help managers better manage the costs within their organisations. Activity based management means the entire set of actions that can be taken on a better informed basis using ABC information.

Operational activity based management (doing the things right) involves using the better understanding of the activities and their drivers in order to reduce costs and make the organisation more efficient. This can be performed by reducing the costs of the activities and even eliminating some activities if they do not add value.

#### **SOLUTION FOUR**

a) Management accounting is more of a diagnosis system of the accounting information and puts bare the current position of the company and if the trend continues informs management of the future position of the company, the analysis and explanation that come from management accounts assist management in decision making. A hybrid management accountant is armed with presentation skills, therefore it is true indeed that management accounting is the presentation of accounting information. The information is packaged in such a way that decisions can be made and help in creation of policy and day to day operation of an undertaking. Policies could be made on how the budget is executed, one of the policies that could be formulated is one that describes and guides how funds can be allocated to the under budgeted activity. Management accounting literally means accounting for management.

Management is presented with accounting and other data for decisions and determines the future the organisation, there is an increasing appetite to use dashboard and flashy reports for quick visualisation of issues the firm maybe confronted with. Management accounting collects and provides financial accounting, cost accounting, economic and statistical information to the staff at various managerial levels to assist them in the performance of

managerial functions and their evaluation. Most management accounts are presented in accounting jargons and end up losing the audience, it is no wonder that the hybrid accountants use dashboard reporting so as to present the information in an intelligible and non-technical manner.

b) The Hybrid accountant is the modern accountant; this is someone who has both accounting knowledge and in-depth understanding of the operating functions or commercial processes of the business. They are part of a finance function that is becoming increasingly integrated into the operations of the business.

The Hybrid accountant is a 3D (Three Dimensional) who is vested of how the firm is supposed to extract value from its operations. He is the major input player in value creation. Hybrid accountants have assumed the role of internal consultants in the organization, they spend less time in preparing standardized reports, but more time analysing and interpreting information. Many of the hybrid accountants are not working in an accounting department but are based in the operating departments with which they work; they are simply involved with the operations of the business, and more actively involved in decision making.

The Hybrid accountants have evolved from being less of numbers specialists and more of generalists.

c) Contemporary Management Accounting Techniques:

There are a number of modern management accounting techniques being used by companies around the world, some of these are:

#### (i) Activity Based management

Activity-based management (ABM) can be defined as the entire set of actions that can be taken on a better informed basis using ABC information. The aim is to achieve the same level of output with lower costs.

Organisations perform hundreds, if not thousands, of different activities. It would not be feasible, or even beneficial, to identify every activity that the organisation performs – so judgment will need to be used to identify the significant activities; perhaps based on the amount of time that is spent performing them or based on the expected cost. The cost driver is the factor that causes the cost of an activity to vary. In traditional costing, it was always assumed that the cost driver was volume of production, measured either in terms of the number of units, or a proxy, such as the number of labour hours or the number of machine hours. In ABM however, it is recognised that the cost of a particular activity may depend on something other than volume of output.

ABM does not have to be used in isolation, and can be used alongside performance management improvement strategies, such as Total Quality Management, Six Sigma and Business Process Reengineering, where the information provided can support the projects. ABM enables management to identify which activities or processes it is spending the most on, and where the biggest financial savings can be made. It can also identify activities where management believe big improvements can be made. Typically these are the processes that are highly fragmented, and involve people from many different departments.  (ii) Balanced Scorecard: This is a scorecard that combines financial and non-financial indicators. The balanced scorecard focuses on four different perspectives: Customer: What do existing and new customers value from us Internal: What processes must we excel at to achieve our financial and customer objectives? Innovation and Learning: Can we continue to improve and create future value? Financial: How do we create value for our shareholders?

The balanced scorecard has the following advantages:

- It looks at both internal and external matters concerning the organization
- It is related to the key elements of a company's strategy
- Financial and non-financial measures are linked together

#### (iii) Target Costing

Is a proactive cost control system. Target costing involves setting a target cost by subtracting a desired profit margin from a competitive market price. Target cost is an estimate of a product which is determined by subtracting a desired profit margin from a competitive market price. This target cost may be less than the planned initial product cost but it is expected to be achieved by the time the product reaches the maturity stage of the product life cycle. The target cost is then compared to the estimated cost to establish the cost gap. The cost gap will have to be eliminated by the use of techniques such as functional analysis, value engineering and value analysis to change production methods and/or reduce expected costs so that the target cost is met.

Target costing has the following benefits:

- Customer requirements for quality, cost and time are incorporated into product and process decisions. The value of product features to the customers must be greater than the cost of providing them.
- Cost control is emphasised at the design stage so any engineering changes must happen before production starts.
- Possible elimination of non value added elements and activities in production process.
- Selling price considers what customer might want to pay for the product
- (iv) **The Kaizen costing process:** Kaizen (Kai=change, Zen = good) meaning "change for the better", is the Japanese word for "continual improvement". Kaizen costing aims to reduce current costs by using tools as value analysis and functional analysis.

Kaizen costing aims to reduce costs by using such tools as value analysis and functional analysis. It focuses on obtaining small incremental cost reductions during the production stage of the product life cycle.

Functional analysis is applied at the design stage of a new product, and a target cost for each function is set. The functional target costs are added together and the total becomes the product target cost. There is never a time when change is absent for example, once the product has been in production for a year, the actual cost of the first year becomes the starting point for further cost reduction.

#### **SOLUTION FIVE**

a) The arguments made by the two Directors has some truths and will endeavor to evaluate their points of facts;

Director Operations: His observations that having so many independent systems is **costly** for the organisation, is quite a point of truth and it is usually difficult to bring all the consultants for different systems to agree on anything. Every effort of bringing them together requires money and this could be a change in the national law such as the rebasing of the kwacha. The Government of Zambia on 1<sup>st</sup> January 2013 rebased the kwacha, this meant that the three zeros on the kwacha was removed for example a K10,000 in the new currency was K10. This change of law had to be effected by corporations in form of adaptation of all systems and infrastructure, accounting packages, related software and infrastructure. Imagine how much money the corporations with more than four related but fragmented software had to spend.

The maintenance costs in managing so many systems is quite high than having a single software vendor. The issue of system malfunctioning in the case of one system filtering data from the other system for example a financial management system not receiving data from a stores system for General Ledger processing. The major drawback in maintaining a number of systems is when one system is undergoing an enhancement and you require the other systems to develop patches that could still maintain the handshakes amongst the systems.

The Director of Operations talks about the Enterprise Resource Planning (ERP): an ERP system attempts to integrate all departments and functions of an organisation in a computer system able to meet the needs of users from across the whole organisation. The system includes a number of integrated modules designed to support all of the key activities of an enterprise. This includes managing the key elements of the supply chain such as production planning, purchasing, and inventory control and customer service including order tracking.

Oracle and SAP supply the most popular ERP systems.

Director of Finance: His observations are also correct, it may be seen at a distant that having fragmented systems is expensive but also one thing that we can mull over is that ERP implementations have failed to live up to expectations. ERP system in some organisations has failed to deliver significant efficiency gains and it is relatively expensive. The Director of Finance is correct in pointing out the issue of weakening the vendor power because having one vendor and in this case ERP systems carry hidden costs through requiring organisations to change the way they operate. Some businesses have been restructured simply to fit the restrictions of the ERP software.

My recommendations weigh too much towards the Director of operations and it is therefore advised that the management of SkeemLaka Plc consider procuring an ERP system from renowned vendors such as Oracle or SAP.

- b) Alfred Chandler says structure follows strategy, it is very visible that the structure of SkeemLaka does not support strategy and could be the reason why the Director of Finance is in charge of IS/IT. Ideally they should have a Director overseeing Information Technology strategy. Deciphering from the operations of SkeemLaka, it is evident that Information Technology is regarded as a cost. In short there is no strategy at all and the IT 'strategy' is directed to enhancing its existing base (e.g. in the accounts department) rather than areas where it might prove competitively valuable (e.g. in marketing)
- c) Environmental Management Accounting (EMA) is the generation and analysis of both financial and non-financial information in order to support internal environmental management processes.

EMA attempts to make all relevant, significant environmental costs visible so that they can be considered when making business decisions and so that they can be controlled and reduced.

The news on climate change cannot be grouped under "fake news", our earth has been destroyed by human activities which have been profit motivated by big corporations and the scandals of the recent past such as the BP Oil spillages (The Deepwater Horizon oil spill) in the gulf of mexico have caused public awareness of green issues. The businesses are encouraged to consider environmental effects of their activities and make them as inputs to their decision making. It is now common that firms are able to measure their carbon footprints, how much carbon are they emitting and how best could they reduce them. It is encouraging that SkeemLaka has taken serious steps in helping the farmers appreciate the restoration of a green world. The Board's approval of using EMA is very exciting and this gives the firm added advantage in securing for financing as lenders are very particular with green issues. Some organisations have adopted the Integrated Reporting Council (IIRC) framework and would encourage SkeemLaka Plc to consider using the framework as it also looks at the natural capital as one of the six capitals that organisations should optimise in creating sustainable value.

d) The information systems (IS) Strategy: is the long-term plan for systems to exploit information in order to support business strategies or create new strategic options.

The Information Technology (IT) strategy is concerned with selecting, operating and managing the technological element of the IS strategy.

The Information Management Strategy deals with the roles of the people involved in the use of IT assets, the relationships between them and the design of the management processes needed to exploit IT.

#### **END OF SOLUTIONS**



CA ZAMBIA PROGRAMME EXAMINATIONS

ADVISORY LEVEL

CA 3.6: ADVANCED FINANCIAL MANAGEMENT

FRIDAY 15 DECEMBER 2017

TOTAL MARKS - 100; TIME ALLOWED: THREE (3) HOURS

# **INSTRUCTIONS TO CANDIDATES**

- 1. You have fifteen (15) minutes reading time. Use it to study the examination paper carefully so that you understand what to do in each question. You will be told when to start writing.
- This paper is divided into TWO sections: Section A: One (1) Compulsory scenario question. Section B: Four (4) Optional scenario Questions. Attempt any Three (3) questions.
- 3. Enter your student number and your National Registration Card number on the front of the answer booklet. Your name must **NOT** appear anywhere on your answer booklet.
- 4. Do **NOT** write in pencil (except for graphs and diagrams).
- 5. **Cell Phones** are **NOT** allowed in the Examination Room.
- 6. The marks shown against the requirement(s) for each question should be taken as an indication of the expected length and depth of the answer.
- 7. All workings must be done in the answer booklet.
- 8. Resent legible and tidy work.
- 9. Graph paper (if required) is provided at the end of the answer booklet.

# **SECTION A**

#### This question is compulsory and must be attempted.

#### **QUESTION ONE**

Kaka Group is a large, long-established company whose primary interests are in the Information Communication Technology (ICT) business. It is considering a bid to acquire Bongo Ltd, a reputable ICT company that has developed a monitoring and evaluation (M&E) software called by the name "The Manager". The Manager is an online software that was developed to help improve execution of M&E related activities thereby contributing towards managing for impact. Both companies are listed on the stock exchange. If the acquisition were to succeed, it would create the largest company of its kind in the country. A concern is that this would attract the interest of the competition authorities.

Following the development of The Manager, Bongo Ltd has attracted the interest of many big companies. Recently Bongo Ltd fought off a bid and has made a public statement that it will

defend itself against any future bids. Press comment suggests that The Manager will allow Bongo's earnings to grow at 20% a year for the foreseeable future. This may result in dividend growth of 12% per year for five year and subsequently at a constant rate of 14% for the foreseeable future. However, some industry experts believe that the product was good but populating it in readiness for use was a tedious job that will make its usability difficulty. Moreover, the website on which it is hosted is not easy to remember. This could result in zero growth in dividends because of very little profit, or even losses. Kaka group's sole financial objective is to increase dividends each year. It has no non-financial objective. This financial objective and the lack of non-financial objectives are shortly to be subject to review and discussion by the board.

#### **Financial statements**

Key financial Information for the two companies for the latest financial year is given below.

	Kaka Group	Bongo Ltd
	K'm	K'm
Non-current assets (net book value)	3,087.5	2,451
Current assets		
Inventory	118.75	166.25
Receivables	522.5	403.75
Cash at bank	427.5	42.75
Net assets	<u>4,156.25</u>	<u>3,063.75</u>
Equity and liabilities		
Equity	1 000	000
Issued share capital (ordinary K1 shares)	1,000	900
Revaluation reserve	256.5	190
Retained earnings	<u>712.5</u>	<u>427.5</u>
Total shareholders' funds	<u>1,969</u>	<u>1,517.5</u>
Non-current liabilities		
Debenture	1,327	900
Taxation	<u>143</u>	<u>40.5</u>
	<u>1,520</u>	<u>940.5</u>
Current liabilities		
Bank loans and overdrafts	-	399
Other	<u>717.25</u>	<u>206.75</u>
	717.25	<u>605.75</u>
Total liabilities	<u>2,237.25</u>	<u>1,546.25</u>
Total equity and liabilities	<u>4,156.25</u>	<u>3,063.75</u>

# STATEMENTS OF FINANCIAL POSITION AS AT 31<sup>ST</sup> DECEMBER 2016

# STATEMENT OF PROFIT OR LOSS FOR THE YEAR ENDED 31<sup>ST</sup> DECEMBER, 2016

	Kaka Group	Bongo Ltd
	Km	Km
Revenues	2,624.85	1,757.5

Operating costs	<u>1,852.5</u>	<u>1,311</u>
Operating profit	772.35	446.5
Net interest	<u>118.75</u>	80.75
Profit before tax	653.6	365.75
Tax	<u>175.75</u>	80.75
Earnings after tax	477.85	285
Dividends declared	<u>190.95</u>	128.25
Retained profit for the year	<u>286.9</u>	<u>156.75</u>
Earnings per shares (ngwee)	47.79	31.67

**Note.** Kaka Group's debenture is 10%, repayable 2020. Bongo Ltd's debenture is 9% issued at par value of K1,000 repayable 2021 at premium of 5%.

Share price information (prices in Kwacha)

Share price movements:	Kaka <i>Group</i>	Bongo Ltd
High for last financial year	6.69	5.61
Low for last financial year	4.47	4.18
Share price today (15 March 2017)	6.37	5.37
Asset betas	0.98	1.2

#### **Other Information**

- (1) The average P/E for the industry is currently estimated as 12.
- (2) The return on the market is currently estimated as 14.6% and the risk-free rate as 7%. These rates are expected to remain constant for the next 12 months and are post-tax.
- (3) The average debt ratio for the industry (long-term debt as proportion of total long-term funding) is 30% based on book values. The after tax cost of debt for Kaka group and Bongo Ltd is 11% and 15% respectively.
- (4) Economic forecasts provided by Kaka Group's financial advisors expect no increase in inflation and interest rates for the foreseeable future. Tax rate is 30% per year.
- (5) Kaka Group has appointed a new Finance Director who believes that the maximisation of shareholder wealth should be the sole objective, but the other directors do not agree and think that new objectives should be considered, including target profit after tax and return on investment.

#### **Required:**

Assume you are the financial manager with Kaka Group. Write a report to the Board of Directors of the group that evaluates the proposed acquisition and other strategic issues. Your report should include the following:

(i) Recommend to the board of directors a bid price and offer terms as well as the form of consideration. State any assumptions you have made. All calculations should be included in the appendix to the report. (23 marks)

- (ii) Advise on a strategy for making the offer to Bongo Ltd to minimise the likelihood of outright rejection by its board. (5 marks)
- (iii) A discussion on other risks involved in both making the bid and after. (5 marks)
- (iv) Evaluation of the appropriateness of Kaka's current objective and of the two new objectives being considered. (7 marks)

[Total: 40 Marks]

#### **SECTION B**

#### Attempt any THREE (3) questions in this section.

#### **QUESTION TWO**

IGOT Plc is an all-equity funded company with 90,000 ordinary shares outstanding. The market value per share is K25. The company operates in the manufacturing industry which has experienced an increased business growth. IGOT's board of directors met recently to discuss a new proposed capital restructuring strategy for the business. The proposed capital restructuring would involve issuing K1million of debt in order to purchase part of the shares outstanding. The interest rate on the debt is 10%. The restructuring is aimed at increasing the dividend per share. The boards considers the current dividend policy as very successful. The board believes that the current market value of equity will remain unchanged after implementing the proposal. However, some financial analysts believe the company market value will increase by K0.5million due to the introduction of cheaper debt capital. The earnings before interest and tax (EBIT) is expected to be as follows:

Scenarios	Recession	Normal
EBIT(K'm)	30	55

Companies in the manufacturing industry pay corporate tax at the rate of 25% per year.

#### **Required:**

- (a) Discuss the circumstance under which the shareholders would benefit from the capital restructuring. (6 marks)
- (b) Evaluate the impact of the capital restructuring on the debt ratio, return on equity and earnings per share under the two alternative scenarios. (9 marks)
- (c) Identify the additional information that might assist the board of IGOT Plc in assessing whether the dividend policy has been successful. (5 marks)

[Total: 20 Marks]

#### **QUESTION THREE**

UBZ Freight Plc is a Zambian based transport company that specialises in large scale business to business contracts, delivering items from original manufacturers to assembly plants across the whole of Western and Southern Africa. Fuel is one of the company's main costs, and the Treasurer has decided to purchase oil futures to try and protect the company from the risk of rising fuel prices. The aim is to use any gains on the futures price to offset any increase in costs resulting from a fuel price rise. UBZ forecasts that it will consume approximately 158,000 Nigerian gallons of fuel over the three month period to 31st March 2018 at an average cost of K5·45 per gallon.

Crude oil futures are traded in the market in units of 1,000 Nigerian barrels (42,000 gallons) and on 1 January 2018 the price for delivery in three months' time is N116.00 per barrel. The current spot rate is N1 = K0.504.

Assume that on 31st March 2018 the spot exchange rate is N1 = K0.51 and UBZ is able to close out its contracts at a value of N118.92 per barrel.

Note: Assume the Zambian Kwacha (K) and the Nigerian Naira (N) are freely traded on the futures and other derivatives markets.

#### **Required:**

- (a) Calculate, ignoring transaction costs, the profit or loss arising from the decision to use futures contracts to hedge fuel costs. (10 marks)
- (b) Discuss the risks associated with hedging fuel prices via the purchase of crude oil futures. (10 marks)

[Total: 20 Marks]

#### **QUESTION FOUR**

SOFT Tech is a long established; family owned and run, IT Consultancy Company. The company has experienced rapid growth in recent years. The financial information below relates to the past five years:

Year	Profit (K'm)	Investments (K'm)	Dividend paid (K'm)
2013	6	-	3
2014	7	10	2
2015	10	-	5
2016	11	15	2
2017	16	-	8

Investments have been funded through internal sources of finance but SOFT Tech now requires additional funds to finance significant expansion. The Directors have considered additional bank finance but their preference is for an initial public offering (IPO). However, the Directors are concerned about the implications of an IPO on the corporate finance of the company in the areas of dividend, financing and investment.

#### **Required:**

(a)	Evaluate the current dividend	policy of SOFT Tech	(7 marks)
(a)			(1  marks)

- (b) Advise on the potential risks with an IPO and the actions that can be taken to minimise such risks. (5 marks)
- (c) Discuss the concerns of the Directors regarding the possible implications of becoming a listed company on dividend, financing and investment strategies and the interrelationship between them. (8 marks)

[Total: 20 marks]

# **QUESTION FIVE**

You are a newly appointed Finance Manager of an Educational Institution that is mainly government funded, having moved from a similar post in a service company in the private sector. The mission statement of the Institution is shown in its publicity material as:

'to achieve recognised standards of excellence in the provision of teaching and research.'

The only financial performance measure evaluated by the government is that the Institution has to remain within cash limits. The cash allocation each year is determined by a range of non-financial measures such as the number of research publications the Institution's staff have achieved and official ratings for teaching quality.

However, almost 20% of total cash generated by the Institutions now from the provision of courses and seminars to private sector companies, using either its own or customers' facilities. These customers are largely unconcerned about research ratings and teaching quality as they relate more to academic awards such as degrees.

The head of the Institution aims to increase the percentage of income coming from the private sector to 50% over the next five years. Its total income for the current year will be almost K100 million. It is considering funding the building of a new research centre via an Islamic bank in the Middle East. The total financing will be K50 million over the construction period. The financing will be repaid over 15 years. The head of the Institution has asked you to advise on how the management team can evaluate progress towards achieving this aim as well as meeting the objective set by government for the activities it funds and also to achieve financial balance during the period while providing high quality research and Education.

# **Required:**

- (a) Discuss the main issues that your Institution should consider when setting its objectives. Your discussion should also include advise on:
  - (i) whether a financial objective(s) should be determined, and(ii) whether such an objective(s) should be made public. (10 marks)
- (b) Explain the nature of a *mudaraba* contract and how this form of Islamic finance could be used to finance the planned building of a new research centre. (5 marks)
- (c) Discuss the extent to which an institution maybe exposed to Political risks.

(5 marks) [Total: 20 marks]

# **END OF PAPER**

# CA3.6-ADVANCED FINANCIAL MANAGEMENT SUGGESTED SOLUTIONS

# SOLUTION ONE

To: Board of Directors, Kaka Group
From: Financial Manager
Date: 15<sup>th</sup> March, 2017
Subject: Report on the proposed acquisition of Bongo Ltd

#### Introduction

This report provides a financial evaluation of the proposed acquisition, recommends offer terms and discusses strategic issues.

#### i) Recommended bid price and offer terms

Our calculations show that the intrinsic value of Bongo Ltd as a stand-alone company is somewhere in the range K754.41 million to K4, 480.14 million. The upper value is almost the

current market of K4,833m and taking into account the efficient market hypothesis, the current market value is probably as good a guide to the company's value as any. But it should be remembered that the market will undoubtedly have factored some expected merger gains (see below) into the share price as a result of the recent bid by other bid companies.

# Premium

However, if we are to make a bid, we will not be successful unless we offer a premium over current market value, giving the Bongo's shareholders an incentive to sell. An offer price of approximately K5,100 million is suggested.

# Synergy

It should be noted that if the possibility of merger gains is already factored into Bongo's share price, this offer price can only be justified if we have clear plans for creating synergy from the combination. Before going ahead, I suggest that we thoroughly investigate the possibilities, as indicated below.

# **Revised bid**

When we make our initial bid, the market will assess it. The effect on the share price will depend on whether the market anticipated the sort of bid that we shall be making, but it is possible that we may have to make a revised offer.

# Consideration

A share-for-share exchange should be offered as the terms for this merger, because:

- a) We have insufficient cash considering the amount of the possible offer price indicated above.
- b) As the debt ratios of both companies are above the industry average, I do not recommend any further increase in borrowings to finance this deal.
- c) Our company's shares have an above average P/E ratio that, though not as high as Bongo's, indicates that they are a relatively good 'currency' at the moment.

I recommend that we start with a minimum offer of 5 of our own shares for every 6 in Bongo. At our current share price this would value Bongo's shares at  $5.6 \times 6.37 / 6.4 = K5.57$ , giving a total market value for Bongo's equity of K5,013 million, a premium of 3.7% over the current market value of K4,833 million.

# ii) Strategy for making the offer

To minimise the risk of outright rejection by the Bongo board, our strategy needs to take the following factors into account:

- a) We must follow the Stock Exchange regulations and the law, especially that on insider dealing. We are allowed to approach the board of directors of Bongo for informal talks, but must maintain absolute secrecy until we make a formal offer.
- b) We will need to ensure that Bongo's directors are given key roles on the board of the combined company. This bid is most likely to succeed if management arrangements are those of a genuine merger rather than a takeover by us.
- c) We need to emphasize the similarities between the management styles of our companies, and the advantages of joining forces to compete effectively in Zambia against world competition.

# iii) Risks involved in the Acquisition

#### Risks in making the bid

- a) The company that has previously bid may decide to make a counter offer, resulting in an auction for Bongo's business, bidding up the price to an unrealistic level.
- b) Bongo may appeal for an investigation by the competition authorities, on the grounds that our bid is against the public interest.
- c) Bongo's board may decide to counter our offer by making an offer to acquire us.
- d) Bongo's staff may decide to mobilize public opinion against us. Some key members may leave.
- e) Bongo's directors may have strengthened their contract termination terms: this needs to be investigated.

#### **Risks of post-merger failure**

- a) There may be a conflict of cultures between the management of the two companies. Disagreements at board level may lead to widespread loss of morale.
- b) Key staff of Bongo may leave and set up on their own or join another competing company. For example the other bidder may decide to poach staff rather than making an increased offer for Bongo' business.
- c) Our objective of achieving synergy may not be realised because of poor planning, lack of resolve to tackle the key issues, or shortage of funds for necessary capital investment.

#### iv) **Evaluation of objectives**

Maximisation of shareholder wealth is the theoretically ideal corporate objective. However most organisations now recognise that having this as their sole objective is unrealistic. Whilst there is still the philosophy that shareholders' wealth should be improved as much as possible, this is usually within the constraints of other objectives, such as legal obligations relating to the environment, ethical considerations and health and safety issues.

#### Increasing dividends v maximising shareholder wealth

The objective of increasing dividends each year does not necessarily support the maximisation of shareholder wealth. Maximisation of shareholder wealth is considered the primary objective of a company because investors want their investment to grow. If there are profitable investments available that would increase future wealth, then the entity should ideally be using its funds to finance such investments. By increasing dividends each year, the entity is restricting the funds available for profitable investments and thus its ability to improve shareholder wealth. Most organisations have a target payout ratio (dividends as a percentage of profit available to shareholders) which means that dividends will move in relation to fluctuations in profit. This makes more sense than a situation where dividends are increasing whilst profits are actually falling!

#### **Return on investment**

Some of the directors have suggested accounting ratios such as Return on Investment (ROI) as more suitable objectives. One of the main benefits of such accounting ratios is that they are easy to understand and are comparable across time and between other similar entities in the same industry. However there are several issues with using accounting ratios as objectives, including:

- i) The numbers are easy to manipulate, even when governed by accounting standards.
- ii) The ratios are based on historic numbers rather than future cash flows, which can cause problems with comparisons if the entity is about to undergo, or has just undergone, a substantial change in structure.
- iii) Lack of consideration for non-financial objectives.

**Target profit after tax** is another objective being considered. As with accounting ratios, profit figures are easy to understand and determining whether target has been achieved is a straightforward comparison exercise. However the problem with such a measure is that taxation policies are beyond the control of individual entities. Changes in such policies render comparisons between years useless unless time-consuming (and potentially inaccurate) restatement of figures takes places.

#### Alternative objectives

As indicated above, Bongo Ltd should consider to have objectives related to shareholder wealth. Dividends alone are unlikely to be a good measure of shareholder wealth and should perhaps be considered in conjunction with other measures such as earnings growth. Ratios measuring growth are likely to be more meaningful than absolute measures such as 'increasing dividends' every year and are more likely to make sense. There is no point having such an objective if profits from which dividends are paid are falling.

#### **Conclusion and recommendation**

Given the above evaluation it would seem more sensible for Bongo to have a range of complementary objectives rather than focusing on just one. It may be worthwhile consulting the shareholders themselves to determine what they are trying to get out of their involvement with

Bongo Ltd. From the results of this consultation the directors may be able to come up with suitable objectives for the entity that meet the needs of the majority.

# APPENDIX

# **1.** Share for share workings

The share price of Kaka Group is K6.37

Number of shares in Bongo Ltd is 900million

Assuming the offer price of K5, 100million, the share price of Bongo is K5.67.

Therefore, we will be buying K5.67 a share of Bongo for K6.37 or approximately a minimum of 5 shares for every 6 shares.

# 2. P/E ratios

The current P/E ratio for Bongo Ltd is 17 (5.37/0.3167), giving its equity shares a current market value of K4, 845 million (17 x K285m). It is highly unlikely that any offer below this figure would be attractive to shareholders, who would have no incentive to sell. If we value Bongo Ltd by the industry average P/E of 13.8, Bongo Ltd would be worth 12 x K285 million = K3,420 million. The higher value that Bongo Ltd enjoys at present is because of its above-average growth expectations and, probably, expectations of gains from a possible merger with another company considering the attention it has attracted from big companies.

# **3.** The dividend valuation model

Different calculation assumptions may be offered here. Two or three valuations would be sufficient.

Cost of equity:

 $Ba = B_e x \frac{Ve}{Ve + V_d (1-t)}$ 1.2 = B<sub>e</sub> x <u>4.833</u> 4,833 + 823.53(0.7) B<sub>e</sub> = 1.34

Equity value =  $900 \times 5.37 = K4,833$  million

 Debt value:
 = K301.68

 Interest (90 x 3.352)
 = K301.68

 Redemption value (1,050 x 0.497)
 = K521.85

 Value
 K823.53

Using Capital Asset Pricing Model, the Cost of Equity = 7% + 1.34(14.6%-7%) = 17%

The current dividend is K128.25 million.

#### **Possible valuation method**

Using this cost of equity in the dividend valuation model, we obtain the following possible valuation figures:

(i) If, as some experts believe that very little profit or losses will results in zero dividend growth, the company's equity value would be 128.25/0.17 = K754.41 million which is far way below current market value.

(ii) Assuming there is a dividend growth of 12% per year and subsequently 14% annually, the equity value would be K4, 480.14m as indicated below:

Year	1	2	3	4	5	
	K'm	K'm	K'm	K'm	K'm	
Dividend	143.64	160.88	180.18	201.80	226.02	
Discount@17%	0.855	0.731	0.624	0.534	0.456	
Present values	122.81	117.6	112.43	107.76	103.07	
Total Present value1-5 years Perpetuity after year 5 $= \frac{226.02(1.14)}{0.17 \cdot 0.14} = 4,849.6 \times 0.456$ $= \frac{K3,916.47m}{K4,480.14m}$						

# SOLUTION TWO

a)

1) Assuming no increase in market value of the company

If we assume that the restructuring does not affect the company's value, the wealth of the shareholders is unaffected. For example shareholders own IGOT whose value is K2, 250,000 before the restructuring. After the change in financial structure, they own

about 55.5% (K1, 250,000) of the company's worth plus dividends (K1, 000,000) totaling K2, 250,000. Therefore, Shareholders are indifferent to the restructuring if the value of the company is unchanged.

2) Assuming an increase in the market value of the company

If we assume that the restructuring results in an increase in the market value of company, the shareholders will benefit. For example, if the restructuring increases the value of the company by K500,000, the shareholders will now own equity in the company worth K1,750,000(K2,750,000-K1,000,000) plus dividends of K1,000,000 giving a total of K2,750,000. In other words, the increase in company value accrues to the stockholders. Consequently, maximizing the value of the company is equivalent to maximizing the value of the shareholders' position. In other words, if there is a capital structure which maximizes the value of the company, the same capital structure also maximizes the value of the shareholders' position.

b)

The proposed capital restructuring would involve issuing K1, 000,000 of debt in order to purchase (K1, 000,000/K25) =40,000 shares of the company's outstanding ordinary shares; the interest rate on the debt is 10%. The restructuring would leave (90,000-40,000) = 50,000 shares outstanding. The current and proposed capital structures are summarized in the following:

	Current (K)	Proposed (K)
Assets	2,250,000	2,250,000
Debt	Nil	1,000,000
Equity	2,250,000	1,250,000
Debt/Equity ratio	0	1:1.25
Share price	25	25
Outstanding shares	90,000	50,000

The debt ratio will definitely increase after the introduction of debt in the capital structure as indicated in the table above.

Impact on ROE & EPS assuming no debt

	Recession	Normal
EBIT(K'm)	0.3	0.55
Interest @10%	0	0
Tax@25%	(0.075)	(0.138)
Net profit	0.225	0.413
EPS	2.5	4.6
ROE	10%	18.4%

Impact on ROE & EPS after introduction of debt capital structure

	Recession	Normal
EBIT(K'm)	0.3	0.55
Interest @10%	0.1	0.1
EBT	0.2	0.45

Tax@25%	(0.05)	(0.113)
Net profit	0.15	0.337
EPS	3	6.74
ROE	12%	26.96%

Under each capital structure, both ROE and EPS change as EBIT changes. In general, leverage has a beneficial impact on stockholders when EBIT is high and a detrimental impact when EBIT is low. This is due to the fixed interest cost associated with debt financing. When EBIT is low, the fixed obligation to creditors consumes a substantial portion of the company's earnings, so the return to stockholders is relatively low. However, at higher levels of EBIT, the return to creditors remains constant, while the stockholders derive a proportionately larger benefit from the increased earnings.

c)

- i. Information about the preferences of shareholders. The managers need to determine whether shareholders are happy with current levels or whether they would prefer a different level and hence a different level of capital gains.
- ii. Information on who holds the shares. This will help determine shareholder preferences, as individual shareholders may have different objectives from institutional shareholders.
- iii. Forecasts of possible changes in levels of taxation on dividends. These may affect shareholder preferences between dividends and capital gains.
- iv. Forecast levels of investment. As indicated above, these will influence shareholder attitudes in a reasonably efficient market.
- v. Indications of the level of market efficiency. If the market is not efficient, it might (wrongly perhaps) see the failure of dividend increases to match earnings increases as a sign of weakness.
- vi. Information about the movement in the share prices of other companies in the same industry rather than the index of the market as a whole may be a better point of comparison for IGOT's shares.

# SOLUTION THREE

Part (a)

The forecast fuel price is K5·45 per gallon over the relevant three-month period. At the current spot rate of N1 = K0.504, this gives a Kwacha price per gallon for the crude future of  $(116.0 \times 0.504)/42 = K1.392$  per gallon.

Note the disparity between the crude price and the processed price means that it is simplistic to assume that purchasing crude futures will serve as a perfect hedge.

The requirement is for futures to cover 158,000 gallons of fuel. Number of Contracts =  $158 \times 5.45/1.392/42 = 14.73$  contracts. Rounding to the nearest whole number this means 15 futures contracts will be purchased.

Cost = 15 x 116 x 1,000 = K1,740,000

Value of each contract on 31 January 2009 is  $1,000 \ge 118.92 = K118,920$ 

Total value of 15 contracts = K1,783,800

Kwacha value = 1,783,800 x 0.51 = K909,738

A profit of K32,778 has been earned on the futures deal.

# Part (b)

The use of crude oil futures to hedge against movements in price of refined oil (fuel) assumes a correlation between prices in the two markets. In other words it is assumed that an x% rise in the price of crude will be associated with an equivalent x% rise in the price of the refined product. This is simplistic because there may also be changes in the cost of refining itself, which results in an imperfect correlation.

The first risk the company therefore faces is that the hedge will be imperfect and so profits on the futures contracts will not fully offset actual price increases. If the consumption is either higher or lower than anticipated then the resulting fuel cost will differ and there is scope for the realised profit on the futures contract to vary, although any gain on the futures does help to offset any rises in actual costs, albeit imperfectly.

The second risk in this type of transaction lies in the fact that the oil futures are priced in Naira but fuel purchases is paid for in Kwacha. There is therefore a foreign exchange risk. A foreign exchange risk arises from the fact that the futures are priced in Naira, and so any gains from price movements over the three-month period may be counteracted by a falling Naira value. In order to better protect itself the company should take out a forward contracts on the Naira to be sold when the futures contracts mature.

The third risk lies in the need to ensure a match between the futures contract dates and the period over which fuel consumption is recorded. If this is not done then the underlying calculation of risk exposure will be inaccurate. The problem is compounded by the fact that contract sizes are fixed, and therefore it is almost inevitable that the risk will either be under/over hedged.

Finally, futures contract are marked to market on a daily basis and therefore require daily settlement of gains and losses. This imposes a cash flow requirement which may increase the company's exposure to financial risk

# **SOLUTION FOUR**

Part (a)

The current dividend policy of SOFT TECH appears to be as follows:

- In years where there is no major capital investment 50% of available profits are paid as a dividend.
- In years when there is major capital investment a dividend of K2 million is paid out irrespective of the level of profit or cash flow.

This unpredicable and erratic pattern of dividend payouts is typical of a family company where the needs of the business and of individual shareholders can be expected to be major factors behind the dividend payout in each year.

In this case, the history of recent dividend payouts indicates a policy of a constant payout ratio of 50% unless there are strong calls on cash from elsewhere, as there was in 2014 and 2016. However, even in those years of high capital expenditure, a minimum dividend of K2 million was maintained, presumably to provide the minimum annual income required by the major shareholders.

In a private company, shareholders are likely to have a greater influence on dividend policy and so we can conclude that SOFT TECH's shareholders are not wholly dependant on large dividend income and are happy for all surplus cash above a certain minimum payout level to be reinvested in the business where suitable reinvestment opportunities exist. Investing in all available projects that carry a positive NPV should, ultimately, maximise shareholder wealth. Unlike a listed company, SOFT TECH is likely to be more dependent on the use of retained earnings that are held in the form of cash to finance expansion. Using retained earnings that are available in cash form keeps gearing levels low and also reduces shareholder risk.

#### Part (b)

An IPO refers to the issue of shares onto the market – which could be the main stock market such as the Lusaka Stock Exchange or a smaller scale market such as AIM.

The issue of shares will be made through an issuing house (usually an investment bank) which acquires the shares and offers them to the public either at a fixed price (known as an offer for sale) or offers them for tender (known as an offer for sale by tender).

#### Potential risks and remedies:

- The main risk is that not all of the shares are sold to the public and hence the company does not generate sufficient funds. This could be either because the price was perceived to be too high or because the economic conditions have deteriorated and the market for that company is in decline. It could also arise from bad publicity. The main remedy for this is to have the issue underwritten (which means that a third party will promise to buy any outstanding shares). However this can be very expensive. It could also result in a fall in the share price immediately after the issue.
- Another risk is that the issue is over-subscribed. This could be because the price is set too low and hence becomes a bargain. Whilst the company will generate all the funds that it plans an over-subscription could be damaging to its reputation and credibility. It also has the effect of passing profit to the new investor which, with proper pricing, would have come to the company. Therefore it is important that the price of the issue is set at an appropriate level. The use of a tender issue can help avoid this risk.

#### Part (c)

#### Implications of a Listing for Dividend Policy

In listed companies it would be more common to find a policy of paying a stable level of dividend, that is, a constant dividend per share or a dividend per share that is growing at a constant growth rate each year in line with average underlying growth in profits. In general, investors prefer a predictable dividend level that grows at a consistent but sustainable rate.

If SOFT TECH were to list, then the profile of its shareholders will change, as will shareholder expectations about dividend levels.

For listed companies dividend policy is seen as an important indicator of where the company is and what its plans are. That is, dividends give signals to the market about the strength of the company. There is a major difference here between listed companies and privately owned companies where shareholders have inside information about the performance of the company and do not need to rely on the signalling effect of dividends.

Because of this signalling effect for listed companies a typical dividend policy would be one of constant or constantly growing dividend which does not change much year on year.

SOFT TECH is accountable to its shareholders and needs to ensure that the dividend policy matches the expectations of shareholders. Most shareholders will require stable growing dividends year on year and not fluctuating dividends. Major shareholders such as large financial institutions (eg: pension funds) also usually prefer regular dividend payouts so that they can plan their cash flows. Other investors may also have chosen to invest in a particular share due to anticipated future dividend levels.

Another consideration is the share price itself. Once listed, SOFT TECH would be interested in protecting its share price. The market prefers predictable dividend levels, this helps signal stability and hence improve market confidence in the company. This, in turn, protects or improves the share price.

# **SOLUTION FIVE**

Part (a)

In its current position, a financial objective is unlikely to be the major objective of the educational institution. However, as the institution develops its business of offering private sector courses and seminars, such that these account for perhaps 50% of total income, financial objectives will become a more significant element in strategic planning and control.

- The institution should first consider what its mission should be. The current mission is relevant to its research and academic programmes. It must decide whether private sector course are intended simply to provide profits to finance research and academic programmes, or whether there is a new objective in the delivery of these courses. If there is, the mission statement would have to be amended.
- If the purpose of private sector courses is primarily to generate profits to help finance research and academic programmes, there should be financial objectives for sales income and profitability from these courses. The objective might be expressed in terms of achieving sufficient profits from private sector courses to finance a target percentage of research and academic courses. Alternatively, since profitability might be an arbitrary measurement (since many costs of academic programmes and private sector courses, particularly teaching staff costs, are common costs), the objective could be expressed in terms of achieving sales income targets. The aim of the head of the institution that 50% of its income should come from private sector courses within five years could well be adopted as a strategic financial target.
- Income from the government will remain important. There are two financial objectives that could be relevant to the institution with regard to its cash limits. First, it should aim to remain within the cash limits it is set, plus the net cash income from its private sector training. Second, on the assumption that government policy on cash limits will remain consistent, targets could be set for maintaining or increasing the cash limits each year. This will only happen if the institution's staff produce sufficient research publications and achieve appropriate ratings for teaching quality. A target for cash limits would therefore be a supporting target, subsidiary to the more important objective of achieving the targeted standards of excellent in research and teaching.

- Although the institution is a not-for-profit organisation, it has to operate within its income. The institution appears to want to increase its income, of at least diversify its sources of income, in order to develop. Objectives relating to income and controlling spending within income limits therefore seem essential.
- It is unnecessary to make most of the financial objectives public. However, the institution needs to recognise that the nature of what it does will undergo significant changes. Private sector courses will become a major part of its activities, and this will affect the institution's staff. Teaching staff will presumably be expected to teach to both academic students and practicing business executives, and the content of their teaching will have to be adapted for the different types of 'students'. Administrative staff will need to recognise that private sector clients will expect standards of service much higher than academic students would accept. In view of this major change in the character of the institution and its activities, it is important that all staff are fully aware of what is happening, so that they can more readily adapt to the 'new world'.
- It would therefore be sensible to make public a financial objective for increasing the percentage of total income of the institution from private sector training, to a target percentage within a stated period of time (e.g. to 50% of total income within five years).

# Part (b)

One central principle of Islamic finance is that making money out of money is not acceptable, i.e. interest is prohibited. A mudaraba contract, in Islamic finance, is a partnership between one party that brings finance or capital into the contract and another party that brings business expertise and personal effort into the contract. The first party is called the owner of capital, while the second party is called the agent, who runs or manages the business. The mudaraba contract specifies how profit from the business is shared proportionately between the two parties. Any loss, however, is borne by the owner of capital, and not by the agent managing the business. It can therefore be seen that three key characteristics of a mudaraba contract are that no interest is paid, that profits are shared, and that losses are not shared.

If the institution were to decide to seek Islamic finance for the planned building of a research centre and if it were to enter into a mudaraba contract, the institution would therefore be entering into a partnership as an agent, managing the business and sharing profits with the Islamic bank that provided the finance and which was acting as the owner of capital. The Islamic bank would not interfere in the management of the business and this is what would be expected if the institution were to finance the new research centre using debt such as a bank loan. However, while interest on debt is likely to be at a fixed rate, the mudaraba contract would require a sharing of profit in the agreed proportions. However, the problem with this form of financing is how to determine the profit to share since the Institution is in the public service.

# Part (c)

Political risk would be key risk for the education institution to consider as the expansion of the research centre is largely dependent on the Governments relationships and commitment. Many developing countries especially in Africa have had poor policy continuity especially

following a change of Government. The institution faces a significant risk of loss of financing following a change of Government in Zambia and in the Middle Eastern country, with new Governments adopting different policies on education. The Middle East, has also been known to be politically unstable with many cases of regional conflict and wars. These events could impact on the economic development of the Middle East country where the bank is resident, with resources being diverted to combat conflict at the expense of economic trade.



# CA ZAMBIA PROGRAMME EXAMINATIONS

# ADVISORY LEVEL

# CA 3.7: PUBLIC SECTOR AUDITS AND ASSURANCE

# THURSDAY 14 DECEMBER 2017

TOTAL MARKS - 100; TIME ALLOWED: THREE (3) HOURS

# **INSTRUCTIONS TO CANDIDATES**

- 1. You have fifteen (15) minutes reading time. Use it to study the examination paper carefully so that you understand what to do in each question. You will be told when to start writing.
- 2. This paper is divided into TWO sections:
  Section A: One (1) Compulsory scenario question.
  Section B: Four (4) Optional scenario Questions. Attempt any Three (3) questions.
- 3. Enter your student number and your National Registration Card number on the front of the answer booklet. Your name must **NOT** appear anywhere on your answer booklet.
- 4. Do **NOT** write in pencil (except for graphs and diagrams).
- 5. **Cell Phones** are **NOT** allowed in the Examination Room.
- 6. The marks shown against the requirement(s) for each question should be taken as an indication of the expected length and depth of the answer.
- 7. All workings must be done in the answer booklet.
- 8. Present legible and tidy work.
- 9. Graph paper (if required) is provided at the end of the answer booklet.

#### **SECTION A**

#### The question is compulsory and must be attempted

#### **QUESTION ONE**

During the early 1990s, when Zambia reintroduced multi-party democracy, a foreign government donated \$1,000,000 to the government of the republic of Zambia, meant for onward lending to Zambian businessmen. The aim was to support job creation programmes by setting up new enterprises in localities with high unemployment levels.

It is now almost 16 years and very little progress has been recorded in the twelve areas which were funded. Unemployment among the youth in the targeted areas is still high. A parliamentary committee recently undertook a fact finding mission and prepared a report on the three areas which they visited.

#### Area one

This area was given \$80,000 to start fish farming. The Ministry of Livestock and Fisheries provided the required training at a cost of \$5,000 and all of those who attended were paid an allowance of \$100 each totaling \$3,000 and the balance was used to start the project. However, the communities in general, accused the leaders of having used almost 30% of the money for personal benefit. The perpetrators used fake invoices to cover the personal expenditure. The development has been condemned in the strongest terms, however, by some in the local communities as they have warned that if an area does not have a reputation for strong corporate governance practices, capital will flow elsewhere.

No one checks the invoices before payment is processed. The venture is currently operating at 40% capacity, but the government wants it raised to at least 75% capacity. There has been no labour turnover and no significant system changes.

#### Area two

This area received \$220,000 to set up a business in the minerals extraction industry. The local leaders agreed to incorporate a company called Orange Mountain Ltd. A small scale mining licence was given to Orange Mountain Ltd by the Ministry of Mines. Mining equipment was bought at a cost of \$198,000 from a supplier without following recommended tender procedures. Section 12 (2) of the Public Procurement Act, 2008 states that any functions related to procurement shall be carried out only by persons qualified and knowledgeable in procurement in accordance with the Zambia Institute of Purchasing and Supply Act, 2003. The action by the area managers conflicted directly with the initial guidelines given by the foreign country that provided the funds. They are demanding an independent report from government, failure to which further assistance in whatever form will be cancelled. A sizeable section of the community has supported this stance and wants all the culprits prosecuted. They believe this will act as a deterrent to others and restore donor confidence.

Management does not clearly understand the objectives of an effective procurement system. Orange Mountain only has one person in procurement, who is partly qualified. The establishment requires four personnel in procurement and management has promised to recruit an additional person before the end of the year.

Orange Mountain Ltd continues to operate profitably and its cash flows are stable.

# Area three

This area was given \$150,000 to start a block making project. The government seconded an accountant to oversee the successful implementation of the project. An advanced block-making machine was bought at cost of \$100,000 from a company owned by one of the headmen in the area. All procurement procedures were followed but the machine has proved to be of poor quality and keeps breaking down. The financial statements for the year ended 28 February 2017, prepared by the Accountant showed a growth in profit before tax of 12%.

A summary of the financial results is as follows:

	2017	2016
	K'000	K'000
Revenue	10,298	10,000
Gross profit	3,012	2,987
Profit before tax	1,044	932

#### Assets

#### 6,738 6,091

At the beginning of the current year, the provincial leadership told Management to achieve a growth in profit before tax of at least 10% to qualify for additional funding. However, the demand for blocks has reduced due to lack of liquidity in the economy. Management has carried out an impairment review.

The parliamentary committee has recommended that necessary audit work be performed in order to obtain sufficient appropriate evidence to satisfy public interest. The suspected wrongdoings in the funded areas are already in the public domain.

You are an Audit Manager in the National Audit Office and the Auditor General has directed you to be responsible for these audits. The parliamentary committee also wants you to make recommendations which will ensure the targeted economic stimulation is achieved.

#### **Required:**

(a)	(i)	Describe the purpose of forensic auditing and state its relevance	to area one. (4 marks)
	(ii)	Describe six (6) specific steps you will perform in a forensic inv determine whether fraud did occur in area one.	vestigation to (6 marks)
(b)	(i)	Outline the basic principles of value for money (VFM) auditing us	sing
		information for area two.	(6 marks)
	(ii)	Explain the difference between the VFM audits in the public sect audits in the private sector.	tor and VFM (6 marks)
	(iii)	Recommend any four (4) measures which can improve the system of area two. marks)	procurement (4
(c)	(i)	Explain the purpose and authority of the fundamental principles or auditing.	f financial (5 marks)
	(ii)	Explain the importance of risk assessment in the audit of financi and explain two (2) audit risks in area three.	al statements (4 marks)
	(iii)	Describe five (5) audit procedures to be carried out when conduct financial audit in area three.	ing the (5 marks)

(5 marks) [Total: 40 Marks]

#### **SECTION B**

#### Attempt any THREE (3) questions in this section.

#### **QUESTION TWO:**

The National Audit Office in Zambia is a Supreme Audit Institution (SAI) charged with the responsibility of providing external audit services to government ministries and any other institution that receives Government subventions in order to enhance transparency and accountability in collection and utilization of public resources.

There have always been major controversies concerning the independence of the National Audit Office. In 2016, changes were made to the legal framework in order to strengthen this office (The Public Audit Act no. 29 of 2016).

The new law includes the annual audit of the accounts of the National Audit Office by an independent auditor appointed by the State Audit Commission. You are a partner in Ilutula, a firm of Chartered Accountants registered with ZiCA. Your firm was engaged by the State Audit Commission to suggest a job description for the Auditor General, since a performance management system was being introduced in the National Audit Office. You are now reviewing the following draft of the job description proposed by the Audit Manager in charge of public sector audits.

# **JOB DESCRIPTION**

Job Title:	Auditor Ge	neral
Reports to:	Minister of	Finance
Immediate Sul	bordinates:	Director Financial Audits, Director Performance Audits, Director Compliance Audits, Director IT Audits, Director Forensic Audits
&		Other specialised investigations and Director Human Resources.

Purpose of the Job:

Within the limits of human resources policies, to provide full audit services to line ministries and to provide a framework for maintaining good relationship between the Executive, Legislature and Judiciary.

Activities:

- 1. Ensuring the efficient recruitment and selection of suitable and sufficient auditors to meet vacancies identified by departmental managers.
- 2. To audit the accounts relating to any expenditure charged by the Constitution of Zambia or any other law on the general revenues of the Republic and to submit a report to the President not later than 12 months after the end of each financial year.
- 3. Advising line ministries on performance improvements.
- 4. Establishing and maintaining a regular programme of joint consultation with parliament and parliamentary accounts committee (PAC).
- 5. To ensure that the provisions of Part X of the Constitution are being complied with.

Economic Conditions:

Salary will be commensurate with the grade and scope of the post, as laid out in the contract of employment.

40 hours per week with four week holiday per year.

Personal -to-holder vehicle provided.

Qualifications Required:

Over 4 years' experience in auditing, previous experience in the civil service and holder of CA Zambia qualification is essential.

#### **Required:**

(a)	(a) Describe the contents of the Mexico Declaration on Supreme Audit Institu		
	(SAIs) independence.	(8 marks)	
(b)	Explain four (4) main functions of the State Audit Commission.	(4 marks)	
(c)	Explain the deficiencies in the proposed job description for the Auditor	General.	

(8 marks)

#### [Total: 20 Marks]

#### **QUESTION THREE**

Pola Ltd, a government owned entity, was formed ten years ago by an Act of Parliament. It manufactures and supplies pharmaceutical products to all public health institutions. In 2012, a new Finance Director changed the pricing policy after convincing the board that the pricing policy needed to be set at a level to achieve high profitability in order to attract funds from investors. He argued that this is necessary to meet the high research and development commitments. In recent years, the company has encountered public and governmental challenges to the high levels of profitability. Some of the key personnel employed in the company are not qualified.

The overall corporate mission statement is to 'Combat disease in the public interest by developing innovative medicines and services and providing them to healthcare institutions for the treatment of patients within the country'.

Almost 40% of the company's turnover last year was spent on research and development. The company has the largest research and development department of all pharmaceutical companies within the SADC region.

Much research is sponsored by government and the World Health Organization (WHO). Research which has recently been undertaken relates to new treatments for malaria as the disease is now demonstrating some resistance to existing treatments.

Managers are paid bonuses based on meeting profitability targets. All grants received are capitalised.

#### **Required:**

- (a) Explain what is meant by disclosure in the public interest, and give an example of an issue in Pola Ltd, which may require disclosure in the public interest. (4 marks)
- (b) Describe the nature of a performance audit and discuss its relevance in Pola Ltd. (3 marks)
- (c) Describe five (5) audit procedures to be carried out when auditing the bonus payments, in Pola Ltd. (5 marks)

(d) Explain the audit issues you will consider in the audit of grants in Pola Ltd.

(8 marks)

# [Total: 20 Marks]

# **QUESTION FOUR**

The Examination Council of Zambia (ECZ) holds examinations all over the country. Every quarter 260,000 students in 3,000 centres in 400 districts take the examination. The examinations are conventional three-hour examinations with the candidates writing answers in script answer books similar to those used by other African countries.

In 2007, the Government started financing the automation of all key examination processes in order to improve efficiency and make education affordable and accessible to all citizens of the Republic of Zambia. This project was completed at the beginning of 2017.

You work for the National Audit Office and you are responsible for IT audits. The Auditor General has appointed a group of individuals to oversee ethics and quality within the National Audit Office.

The Project Manager for the project, Elizabeth Mwansa believes that all examination centres should use the new system commencing with the examination session in 12 months' time. She is committed to a direct changeover/conversion approach as 'parallel running is just not a possibility in this situation'. However, at a recent sensitisation workshop for examiners, one of the IT examiners, Dominic Mongu criticised the new system as lacking controls and not being user friendly.

# **Required:**

(a) Explain the nature of the ethics control system for Supreme Audit Institutions (SAIs).

(8 marks)

- (b) Describe the purpose of an IT audit and explain its importance in the Examination Council (EC). (2 marks)
- (c) Suggest any four (4) relevant application controls which ought to exist in the Examination Council (CZ) computerized system, giving two examples for each. (8 marks)
- (d) Explain what is meant by data mining.

(2 marks)

#### [Total: 20 Marks]

#### **QUESTION FIVE**

In the 2017 budget, the government made substantial funds for education available to all religious and charitable organisations, yet hardly anybody knows about it. According to provisions in the act, parents and school operators are supposed to have access to these funds, but government offices seem to be sitting on the money.

#### Some of the guidelines are:

- 1. Unemployed parents are eligible to receive cash to cover school fees for their children aged less than 16 years (up to a maximum of three children), at approved schools.
- 2. Working parents with lower incomes are also eligible. However, they can only receive certificates which they can exchange for childcare at approved providers.
- 3. Most churches are among the approved institutions.
- 4. All approved institutions are required to ensure they carefully screen all workers, and they provide adequate supervision.
- 5. All approved institutions face substantial legal liability on the basis of 'negligent hiring' or 'negligent supervision'.

A number of churches and other organisations have started applying for registration following dissemination of relevant information by members of parliament country-wide. Most of the workers in the churches are volunteers.

#### **Required:**

(a)	Explain eight (8) main	risks associated with the programme.	(8 marks)
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- (b) Suggest appropriate controls which can be introduced to mitigate the risks identified in (a) above. (4 marks)
- (c) Describe the framework for compliance auditing. (3 marks)
- (d) Explain five (5) audit procedures to be undertaken when carrying out compliance tests in any of the approved institutions. (5 marks)

# [Total: 20 Marks]

# **END OF PAPER**

# **CA3.7: PUBLIC SECTOR AUDITS AND ASSURANCE SOLUTIONS**

# SOLUTION ONE

#### a) i. Purpose of forensic auditing:

The range of assignments in this area is vast so to give specific definitions for each is not always practicable. Forensic auditing has generally been defined as the process of gathering, analysing and reporting on data, in a pre-determined context, for the purpose of finding facts and/or evidence in the context of financial/legal disputes and/or irregularities and giving preventative advice in this area.

The broad process of conducting a forensic audit bears some similarity to an audit of financial statements in that it will include a planning stage, a period when evidence is gathered, a review process, and a report to the client. However, there are a number of differences in approach e.g. Forensic audits may be challenging and requires a high skill.

Forensic accountants can be engaged to investigate fraud and this could include:

- Quantifying losses from theft of cash or goods
- Identifying payments or receipts of bribes
- Identifying intentional misstatements in financial information, such as overstatement of revenue and earnings and understatement of costs and expenses
- o Investigating intentional misrepresentations made to auditors.

Forensic accountants may also be engaged to act in an advisory capacity to assist directors in developing more effective controls to reduce the risks of fraud.

- ii. Steps involved include:
  - Establishing the type of fraud that took place in area one, it is alleged that fake invoices were used to disguise personal expenses as business expenses.
  - Determining for how long the fraud has been operating it is likely that the fraud started from the time the funds were released.
  - Identifying how the fraud operated and was concealed there will be need to determine exactly how the fraud was conducted in area one. No one checks the invoices before payment.
  - Gathering evidence evidence will need to collected and must be sufficient to prove the following:
    - That a fraud has taken place
    - Who has committed the fraud and how
    - The amount of financial loss suffered by area one.

The evidence must also be relevant to the alleged case. It is important to keep the evidence safe so that it cannot be challenged in court.

At area one most of the evidence could be obtained by critically reviewing the invoices, and interviewing the suspects and ideally acquiring a confession. The interview will generally be delayed until there is enough evidence to extract a confession which will form a key part of evidence to be presented in court.

• Reporting – once all the evidence has been collected, a report to the client will be produced. This report will summarise all evidence, detail

the amount of financial loss suffered as a result of fraud and identify the suspected fraudster(s). It is likely this report will be used in court.

- The report may also include advice to area one to help prevent a reoccurrence of the fraud. Advice may be in the form of suggested improvements to internal controls and systems.
- Court proceedings the forensic investigation team is likely to be called as an expert witness in any resulting court case. The team members will be asked questions about the investigation and to explain the evidence presented.

# b) i. Basic principles of Value for Money:

Value for Money (VFM) auditing is also known as performance auditing and effectiveness auditing. Traditionally this focused on the elimination of waste and extravagance but today the role is much wider. VFM auditing is concerned with economy, efficiency and effectiveness.

Economy is the achievement of a given result with the least expenditure of money, manpower or other resources. Efficiency extends the idea to that of converting resources into a desired product or service in the most advantageous ratio. Effectiveness brings into account the goals and objectives which the activity under audit is intended to meet.

The auditor must assess the effectiveness of activities without questioning policy decisions made and the objectives they serve. He may give advice on improved management or more effective services but leave policy decisions to elected councillors, members of parliament or appointed board members.

The VFM auditors may make use of various 'performance indicators' and comparisons to help him to assess whether the organisation matches up to criteria of economy, efficiency and effectiveness.

In area 2, it may be necessary to ask the following questions:

- Do proper arrangements (e.g. appropriate departmental management information systems) exist for securing economy, efficiency and effectiveness?
- Are these arrangements operating satisfactorily in practice?

# ii. Value for money in public sector versus VFM in private sector:

The differences between VFM audits in the public sector and VFM audits in the private sector include:

- In the public sector, there is a statutory requirement for some VFM audits. In the private sector, there is no statutory requirement for VFM audits.
- In the public sector the auditors have a responsibility to follow up the VFM audits they make. There should be a post-audit review to make

sure that changes have been made to improve economy, efficiency and/or effectiveness, in line with recommendations in the audit report.

In the private sector, there is no such responsibility for the auditors. Since VFM work is done at the request of management, the auditors' involvement will normally finish with the submission of the audit report.

• A VFM audit in the public sector will not question the policy behind the work that is being audited, because this would be encroaching on political issues.

In the private sector, there is no such political constraint, and VFM audits could, in principle, question why a certain area of work is being performed at all, and for what purpose.

#### iii. Measure to improve procurement system:

Value for money is improved by making changes that reduce costs, increase efficiency or make an operation more effective in achieving its target or objective. Measures to improve the procurement system in area two include:

- Develop a suitable procurement policy and procedures which should take into account relevant legal provisions.
- Recruitment of a qualified procurement officer
- Innovatory leadership willing to take the risks of a serious effort to improve performance should be put in place.
- Hold brainstorming sessions to generate ideas on how productivity might be improved as well as the capacity to evaluate them and translate them into working plans.
- $\circ$  The co-operation of the staff and employees of area two is needed.
- Introduce e-procurement in the long run. This is the term used to describe the electronic methods used in every stage of the procurement process, from identification of requirement through to payment. It can be broken down into the stages of e-sourcing, e-purchasing and epayment.

#### c) i. Purpose and authority of fundamental principles:

Financial auditing focuses on determining whether an entity's financial information is presented in accordance with an applicable financial reporting framework. This is accomplished by obtaining sufficient appropriate audit evidence to enable the auditor to express an opinion on whether the financial information is free from material misstatement whether due to fraud or error. The Zambia Institute of Chartered Accountants (ZiCA) adopted full International Financial Reporting Standards for all entities in 2005. Zambia, now uses a three tier financial reporting framework. Entities are required to use one of the three frameworks depending on the type of entity. The fundamental auditing principles at level 3 (ISSAIs 100-999) draw and elaborate ISSAI 1 - The Lima Declaration and the ISSAIs at level 2 and provide an authoritative international frame of reference defining public-sector auditing.

ISSAI 100 – *Fundamental Principles of Public-Sector Auditing* provides detailed information on:

- The purpose and authority of the ISSAIs;
- The framework of public sector auditing;
- The elements of public sector auditing;
- The principles to be applied in public sector auditing.

The fundamental principles are applicable to all public-sector audit engagements, irrespective of their form or context. However, the principles in no way override national laws, regulations or mandates or prevent Supreme Audit Institutions (SAI) from carrying out investigations, reviews or other engagements which are nonspecifically covered by existing ISSAIs.

The Fundamental Auditing Principles form the core of the General Auditing Guidelines at level 4 of the ISSAI framework. The principles can be used to establish authoritative standards in three ways:

- As a basis on which SAIs can develop standards;
- As a basis for the adoption of consistent national standards;
- As a basis for adoption of the General Auditing Guidelines as standards.

# ii. Risk assessment is important since in conducting a thorough assessment of risk auditors will be able to:

- Identify areas of the financial statements where misstatements are likely to occur early in the audit;
- Plan procedures that address the significant risk areas identified;
- Carry out an efficient, focused and effective audit;
- Minimise the risk of issuing an inappropriate audit opinion to an acceptable level;
- Reduce the risk of reputational and punitive damage.

Although risk assessment is a fundamental element of the planning process, it is important to understand that risks can be uncovered at any stage of the audit and that procedures must be adapted in light of revelations that indicate further risks of material misstatement. It is, ultimately, the responsibility of the most senior reviewer (usually the engagement partner) to confirm that the risk of material misstatement has been reduced to an acceptable level.

# The main audit risks in area 3 are:

• Asset valuation – impairment review may not have been done correctly.

- Pressure to meet targets this may encourage management to manipulate figures.
- Going concern reduced business activity may impact on the oragnisation's ability to continue in the near foreseeable future.

# iii. The audit procedures include:

- Revenue Inquiries of management regarding reasons for the 3% increase in revenue despite the lack of liquidity in the economy. ISA 240 *The Auditor's Responsibilities relating to Fraud in an Audit of Financial Statements*, states that there should be a presumption that there is a risk of fraud in relation to revenue recognition. There is a risk of fraudulent financial reporting in particular, as this area is susceptible to management bias and earnings manipulation. This is a possibility in area three because additional funding is dependent on meeting the set financial target.
- Gross profit percentage Compare with the previous year and any industry average.
- Profit before tax percentage Compare the figure to last year and investigate any inconsistencies further. It is possible that expenses could have been understated to increase the profit before tax. The profit before tax has increased by 12% which is much higher than the increase in revenue. There will be need to review the expenses in detail.
- Cut-off review after-date invoices for expenses and ensure that those relating to the 2017 financial year are accrued for.
- Classification Agree classification between revenue and capital expenditure. A sample of costs capitalized should be agreed to underlying documentation (such as purchase invoices) and the classification agreed. There is a risk that some repair costs may have been incorrectly capitalized to improve profitability and meet the target set.
- Review results of impairment reviews by management, establishing the validity of any assumptions used in the review e.g. discount rates, growth rates etc. The carrying amounts for assets appear overstated.

# SOLUTION TWO

a) The Mexico Declaration on SAI Independence states the following eight core principles which are essential elements of proper public sector auditing:

# **Principle 1**

The existence of an appropriate and effective constitutional/statutory/legal framework and of *de facto* application provisions of this framework

Legislation that spells out, in detail, the extent of SAI independence is required.

# Principle 2

The independence of SAI heads and members (of collegial institutions), including security of tenure and legal immunity in the normal discharge of their duties

The applicable legislation specifies the conditions for appointments, re-appointments, employment, removal and retirement of the head of SAI and members of collegial institutions, who are

- appointed, re-appointed, or removed by a process that ensures their independence from the Executive
- given appointments with sufficiently long and fixed terms, to allow them to carry out their mandates without fear of retaliation; and
- immune to any prosecution for any act, past or present, that results from the normal discharge of their duties as the case may be.

# Principle 3

A sufficiently broad mandate and full discretion, in the discharge of SAI functions SAIs should be empowered to audit the

- use of public monies, resources, or assets, by a recipient or beneficiary regardless of its legal nature;
- o collection of revenues owed to the government or public entities;
- legality and regularity of government or public entities accounts;
- quality of financial management and reporting; and
- economy, efficiency, and effectiveness of government or public entities operations

Except when specifically required to do so by legislation, SAIs do not audit government or public entities policy but restrict themselves so the audit of policy implementation.

While respecting the laws enacted by the legislature that apply to them, SAIs are free from direction or interference from the Legislature or Executive in the

- o selection of audit issues
- o planning, programming, conduct, reporting, and follow-up of their audits;
- organisation and management of their office; and
- enforcement of their decisions where the application of sanctions is part of their mandate.

SAIs should not be involved or be seen to be involved, in any manner, whatsoever, in the management of the organisations that they audit.

SAIs should ensure that their personnel do not develop too close a relationship with the entities they audit, so they remain objective and appear objective.

SAI should have full discretion in the discharge of their responsibilities, they should cooperate with governments or public entities that strive to improve the use and management of public funds.

SAI should use appropriate work and audit standards, and a code of ethics, based on official documents of INTOSAI, IFAC, or other recognised standard-setting bodies.

SAIs should submit an annual activity report to the Legislature and to other state bodies – as required by the constitution, statutes, or legislation – which they should make available to the public.

# Principle 4

Unrestricted access to information

SAIs should have adequate powers to obtain timely, unfettered, direct, and free access to all the necessary documents and information, for the proper discharge of their statutory responsibilities.

# Principle 5

The right and obligation to report on their work

SAIs should not be restricted from reporting the results of their audit work. They should be required by law to report at least once a year on the results of their audit work.

# Principle 6

The freedom to decide the content and timing of audit reports and to publish and disseminate them

SAIs are free to decide the content of their audit reports.

SAIs are free to make observations and recommendations in their audit reports, taking into consideration, as appropriate, the views of the audited entity.

Legislation specifies minimum audit reporting requirements of SAIs and, where appropriate, specific matters that should be subject to a formal audit opinion or certificate.

SAIs are free to decide on the timing of their audit reports except where specific reporting requirements are prescribed by law.

SAIs may accommodate specific requests for investigations or audits by the Legislature, as a whole, or one of its commissions, or the government.

SAIs are free to publish and disseminate their reports, once they have been formally tabled or delivered to the appropriate authority – as required by law.

# Principle 7

The existence of effective follow-up mechanisms on SAI recommendations

SAIs submit their reports to the Legislature, one of its commissions, or an auditee's governing board, as appropriate, for review and follow-up on specific recommendations for corrective action.

SAIs have their own internal follow-up system to ensure that the audited entities properly address their observations and recommendations as well as those made by the Legislature, one of its commissions, or the auditee's governing board, as appropriate.

SAIs submit their follow-up reports to the Legislature, one of its commissions, or the auditee's governing board, as appropriate, for consideration and action, even when SAIs have their own statutory power for follow-up and sanctions.

# Principle 8

Financial and managerial/administrative autonomy and the availability of appropriate human, material, and monetary resources

SAIs should have available necessary and reasonable human, material, and monetary resources – the Executive should not control or direct the access to these resources. SAIs manage their own budget and allocate it appropriately.

The Legislature or one of its commissions is responsible for ensuring that SAIs have the proper resources to fulfill their mandate.

SAIs have the right of direct approach to the Legislature if the resources provided are insufficient to allow them to fulfill their mandate.

# b) The main functions of the State Audit Commission are:

- $\circ$  oversee the undertaking of the functions of the National Audit Office;
- appoint auditors and other staff as are necessary to assist the Auditor-General in the performance of the Auditor-General's functions under the Constitution, the Public Audit Act, 2016, and any other written law;
- exercise disciplinary powers in relation to auditors and other staff of the National Audit Office;
- receive and investigate complaints from any person relating to the performance of functions by the National Audit Office.

# c) Deficiencies in the proposed job description for the Auditor-General are:

- Reporting to the Minister of finance the Auditor-General does not report to the Minister of Finance. The National Audit Office does not belong to any Ministry. The Auditor-General effectively reports to parliament functionally and administratively to the Republican President.
- Purpose of the job (within the limits of human resources policies) the Auditor-General's mandate comes from the Constitution and therefore cannot be limited by human resource policies.
- Recruitment and selection of audit staff this is the responsibility of the State Audit Commission and not the Auditor-General.
- Qualification required the stated qualifications are incorrect. According to the Public Audit Act no. 29 of 2016, a person appointed as Auditor-General

shall be at least 45 years of age and served as an auditor for at least 10 years of which at least five years should have been at senior management level.

# SOLUTION THREE

# a) Meaning of public interest:

The courts have never given a definition of 'the public interest'. This means that the issue is left to the judgement of the auditor. It is often therefore appropriate for the member to seek legal advice. It is only appropriate for information to be disclosed to certain authorities, for example, the police.

The IFAC guides that there are several factors that the member should take into account when deciding whether to make disclosure and these include:

- The size of the amounts involved and the extent of likely financial damage
- Whether members of the public are likely to be affected
- The possibility or likelihood of repetition
- The reasons for the client's unwillingness to make disclosures to the authority
- The gravity of the matter
- Relevant legislation, accounting and auditing standards
- Any legal advice obtained.

# Example:

The employment of personnel who are not qualified may require disclosure in public interest.

# b) Performance audits and their importance to Pola Ltd:

Performance audit focuses on whether interventions, programmes and institutions are performing in accordance with the principles of economy, efficiency and effectiveness and whether there is room for improvements.

This is accomplished by examining performance against suitable criteria and by analysing causes of deviations from the criteria or problems. The aim is to answer key audit questions and to provide recommendations for improvements. The result of the audit is generally a report that contains scope, findings, conclusions and recommendations.

Performance audits will provide the much needed evidence to support profitability figures declared and the bonus payments in Pola Ltd.

# c) Audit procedures for the bonus payments include:

- Obtain a copy of company policy regarding bonus payments and note the criteria used in awarding bonuses.
- Obtain copies of bonus calculations and ensure they are in line with the criteria set out in the company policy.
- Recalculate the mathematical accuracy for a sample of bonus payments.

- Cast the list of bonus payments and agree the total to what is reported in the financial statements.
- Compare the budget and actual bonus payments and ask management to explain the reasons for any significant difference.
- Agree bonus payments per verified list to the cashbook and bank statement.

# d) Audit issues in the audit of grants in Pola Ltd include:

- Materiality needs to be considered. As all grants are capitalised, the figure for the grants is likely to be material. This can also be supported by the nature of the business.
- The key risk is that the grants may have been incorrectly classified. Inspection of the grant application should be performed to determine the correct classification. There will be need to discuss the classification with directors.
- The accounting treatment should be in line with the guidance given in IAS 20 *Accounting for Government Grants and Disclosure of Government Assistance.* The accounting treatments for revenue and capital grants are not the same. Capital grants can be more difficult to audit, particularly if a non-monetary government grant is being accounted for at fair value.

On the other hand, grants where related costs have already been incurred offer no difficulties to account for or to audit.

- Any changes in the accounting method must be disclosed. This must comply with IAS 8 *Accounting Policies, Changes in Accounting Estimates and Errors.* However, it is important to take care not to confuse a change in accounting policy with a change in accounting estimate. A change in policy is rare and per IAS 8 should be accounted for retrospectively, but a change in estimate is accounted for going forward (prospectively).
- The sufficiency and appropriateness of the evidence available needs to be considered. ISA 500 *Audit evidence* gives detailed guidance in this area.
- The impact on the audit report will also require consideration. There is a possibility that a modified opinion could be given should management refuse to make the adjustments deemed appropriate in the circumstances. The type of modification will depend on the materiality and pervasiveness of the matter.

# **SOLUTION FOUR**

a) According to **ISSAI 30**, the main components of the ethics control system are:

- Code of ethics
- Leadership and tone at the top
- Ethics guidance
- Ethics management and monitoring

# **Codes of ethics**

A code of ethics or a code of conduct sets out ethical values and principles, and the way a SAI expects its staff to behave, therefore guiding individual behaviour. It is critical that a SAI's code supports an environment conducive to behaviour. It is critical that a SAI's code support an environment conducive to behaviour consistent with the values and principles expressed in this standard. This induces fostering an understanding that compliance with the SAI's code means abiding by the spirit and not just the letter of the code.

Each SAI sets its code, and policies and procedures in accordance with its culture, and legal and social systems. The level of detail of the code is determined by context and organisational culture. The SAI's code of ethics may be in a variety of forms or formats. Elements to be considered are: statements about the values that guide conduct, descriptions of the associated expected behaviours, specific examples of ethical dilemmas and sensitive situations, ethical conflict resolution, whistle-blowing procedures, and provisions for dealing with misconduct.

Staff are more likely to follow the code if it has been developed in an inclusive and transparent manner.

# Leadership

Building an ethical culture in an organisation starts with its leadership. Leaders demonstrate the tone at the top by:

- setting ethics as an explicit priority;
- o reinforcing this priority by clear, consistent and regular messages;
- o implementing strategies, policies and procedures to promote ethics;
- leading by example;
- maintaining high standards of professionalism, accountability and transparency in decision making;
- encouraging an open and mutual learning environment, where difficult and sensitive questions can be raised and discussed;
- providing an environment in which staff experience fairness of treatment conducive to good relationships among colleagues;
- o recognising good ethical behaviour, while addressing misconduct;
- o ensuring that ethics, policies and procedures are applied consistently and fairly.

# **Ethics guidance**

Clear communication is necessary to increase staff's awareness and understanding of the code of ethics. This can include educating staff on promoting the SAI's values and addressing ethical dilemmas, by offering workshops and training, leadership engagement, and disseminating ethics topics and good practices.

Although ethical behaviour is primarily the responsibility of staff, SAIs can support staff by assigning responsibilities to ethics advisors (in some cases operating as ethics committees, integrity coordinators, ethics officers, or counselors) to give advice on specific issues. Confidentiality and a defined due process are critical elements for the effective use of this assistance.

# Ethics management and monitoring

Incorporating ethics in daily management is essential to reinforce values. This includes recognising ethics as a criterion in recruitment, performance appraisal and professional development. It also implies recognising good ethical behaviour and applying safeguards to specific risks, such as those arising from conflicts of interest or confidentiality issues.

Monitoring controls help the SAI mitigate ethics risks. The SAI may apply the following monitoring controls:

- maintaining registers to track interests, gifts and hospitality;
- conducting self-assessment, internal and external reviews that can be used regularly, as monitoring tools, as a way to identify and analyse vulnerabilities and recommend measures for improving ethics management, and/or as a routine to ensure accountability. Evaluations will have to consider that many ethical requirements refer to soft controls, which require the use of specific appropriate assessment methods. Tools available for these assessments include IntoSAINT (this is a dedicated self-assessment instrument for members of INTOSAI to assess integrity vulnerabilities and control), peer review guidelines, surveys, interviews and feedback questionnaires;
- establishing and implementing policies on ethical misconduct and whistleblowing – these include procedures for reporting cases of misconduct and for timely and adequate response, investigation and sanctioning.

Information gathered from the procedures above can be used to regularly evaluate, update and improve ethics policies. A SAI may report to relevant stakeholders on these evaluations (for example in its annual performance report).

# b) Purpose of IT audits

IT audits are tests of controls in a specific area of the business, the computer system. Increasingly in modern business, computers are vital to the functioning of the business, and therefore the controls over them are key to the business. Hence the purpose of IT audits is mainly to give assurance on the operating effectiveness of controls.

The examination Council (EC) has invested significant sums of money in automation and stakeholders may be interested in seeing the promised improvements, the inefficiency and making education affordable to all citizens of Zambia.

# c) Application controls and examples

These can be tabulated as follows:

Application controls	Examples
1. Controls over completeness of input	Document counts
	One-for-one checking of processed output to source documents
2. Controls over accuracy of input	• Reasonableness test (e.g. exam fees received to total scripts)
	• Existence checks (e.g. student name)
3. Controls over authorisation of input	Manual authorisation
	• Input by authorised personnel
4. Controls over processing	Batch reconciliation
	Screen warning
5. Controls over master files and standing data	• Cyclical reviews of all master files and standing data
	Record counts and hash totals

# d) Meaning of data mining:

Data mining is software normally used in investigations. Data mining software looks for hidden patterns and relationships in large pools of data. It can also be used to predict future behaviour. Some credit card companies have used data mining to predict which customers are likely to switch to a competitor in the next few months. Based on the data mining results, the bank can take action to retain these customers.

The strength of data mining software therefore lies in its ability to discover previously hidden relationships.

#### SOLUTION FIVE

(a)	(b)
Risks	Controls
1. Receipt of cash by unemployed parents –	- Use exchangeable certificates like those
cash is risky and the parents may not use it	used for working parents.
for the intended purpose. It can also be	
misappropriated by the responsible officials.	

2. Definition of lower income may be	-Use experts to determine the lower income
questionable, and discretion may be used in	threshold.
some cases. Abuse may go unnoticed.	
3. Approval of providers – the procedures	-Appoint a committee to scrutinise all
may be open to abuse.	applications before approval. Only those who
	are able to exercise a high level of care
	should be approved.
4. Churches/organisations – some	-Involve the church/organisation mother
churches/organisations may not be genuine	bodies and any relevant regulatory authorities
and could simply be used as conduits for	in the screening process.
defrauding the government.	
5. Lack of inspection – children may be	- Periodic inspection of the school by
molested or abused in many ways.	relevant regulators.
	-Regular, unannounced visits by a supervisor.
	-Use the two-adult rule, which requires that
	two adults be present in the nursery/school
	(or during any children's activities) at all
	times.
6. Use of volunteers and unqualified staff –	-Before employment carry out the following:
1	(1) An interview to determine if the worker
these may have poor attitudes towards work,	was a childhood victim of abuse and if that
may resent formal procedures and lack the	
required competence.	affects the person's competency, and
	(2) an adequate 'background check'.
	Background check would require at least the
	completion of an application form that
	includes church-membership history, prior
	church work with minors, and the
	identification of references.
	Churches/organisations' references identified
	in the application should be contacted to
	determine the applicant's suitability for
	working with minors.
	Apply the six-month rule, a policy that
	restricts eligibility for positions involving the
	custody or supervision of minors to people
	who have been members for at least six
	months.
	Exercise adequate supervision of nursery
	workers.
7. Lack of segregation of duties – internal	-Appoint a finance committee to oversee the
check will be absent and will mean	operations
fraudulent activities may go unnoticed.	· <b>r</b> · · · · · · · · · · · · ·
8. Lack of ethical behaviour – regulators may	-At least two inspectors should be involved in
be bribed so that wrongdoing is not acted	the inspections and there should a deliberate
	policy of rotation.
upon.	poncy of folation.

c) Compliance auditing focuses on whether the activities of the entity have been conducted in accordance with the applicable authorities. The result of the audit may be a conclusion or if it is related to an audit of financial statements a limited or reasonable assurance opinion. ISSAI 400 elaborates on this further.

# d) Compliance tests in an approved institution

- Obtain a copy of the approval certification and verify its authenticity with the regulators.
- Review the school's procedures for accepting pupils.
- Observe and evaluate segregation of duties.
- Inspect the workers qualifications and check whether they are in line with the requirements.
- Check the documents regarding interviews and background checks including other screening processes.
- Physically inspect the facilities to check whether they meet the standards.
- Examine the documentation in use and ensure they meet the minimum acceptable standards.
- Observe the levels of delivery and supervision.
- Observe preparation of cash receipts, cash books and review documentation for evidence of independent check.
- $\circ$  Check the facilities available for safe custody of cash and other valuables.
- Check that cash is regularly banked by inspecting bank statements and supporting documentation.

# END OF SOLUTIONS



# CA ZAMBIA PROGRAMME EXAMINATIONS

# ADVISORY LEVEL

# CA 3.8: PUBLIC SECTOR FINANCIAL MANAGEMENT

# FRIDAY 15 DECEMBER 2017

# TOTAL MARKS: 100; TIME ALLOWED: THREE (3) HOURS

## **INSTRUCTIONS TO CANDIDATES**

- 1. You have fifteen (15) minutes reading time. Use it to study the examination paper carefully so that you understand what to do in each question. You will be told when to start writing.
- 2. This paper is divided into TWO sections:

Section A: One (1) compulsory scenario question.

Section B: Four (4) Optional scenario Questions. Attempt any three (3) questions.

- 3. Enter your student number and your National Registration Card number on the front of the answer booklet. Your name must **NOT** appear anywhere on your answer booklet.
- 4. Do **NOT** write in pencil (except for graphs and diagrams).
- 5. **Cell Phones** are **NOT** allowed in the Examination Room.
- 6. The marks shown against the requirement(s) for each question should be taken as an indication of the expected length and depth of the answer.
- 7. All workings must be done in the answer booklet.
- 8. Present legible and tidy work.
- 9. Graph paper (if required) is provided at the end of the answer booklet.
- 10. Present Value and Annuity tables are attached at the end of this paper.

#### **SECTION A**

#### This question is compulsory and must be attempted.

#### **QUESTION ONE**

Vibongo is a newly created District in the Eastern province of Zambia. A District Commissioner has been appointed and has taken office immediately. A Town Clerk and Director of Finance have been transferred to Vibongo District from other established districts in other provinces of Zambia. Other District officers have been recruited specifically to fill in the positions that have arisen due to the creation of the District. The district political leaders had been elected during the last general elections as the District was created shortly before those elections.

Being a new district, Vibongo needs to put up infrastructure in place and the last council meeting discussed the creation of District recreation facilities by way of a recreation park to provide family activities and adventure rides. The recreation park facility is expected to attract families living within and around the new district.

The recreation park is expected to attract an average of 150 visitors per day for each of the four years following the investment phase, after which major new investment would be required in order to maintain demand. The price of admission to the recreation park is expected to be K18 per adult aged at least 16 years old and K10 per child aged below 16 years. 60% of visitors are forecast to be children. In addition to admission revenues, it is expected that the average visitor will spend K80 on food and drinks, (of which 30% is profit), and K50 on gifts, (of which 40% is profit). The recreation park would open for all the seven days of a week per year throughout the four years' period. The park will therefore be open for 365 days every year.

All costs and receipts, excluding maintenance and construction costs and the realisable value, are expressed at current prices. It is expected that all costs and receipts will rise from current values by the amount of annual inflation per year. Annual inflation in Zambia is currently 3% per year and it is expected to remain unchanged throughout the four years period of the project.

The recreation park would cost a total of K18 million and could be constructed and start working after two years from now. Half of the K18 million would be payable immediately, and half in one year's time. In addition working capital of K5 million will be required at the end of year one. The realisable value of the non-current assets is expected to be K25 million after four years of operation. Operations would commence after the investment phase has been completed.

Maintenance costs (excluding labour) are expected to be K1.5 million in the first year of operation, increasing by K0.4 million per year thereafter. Annual insurance costs are K0.2 million, and the district would apportion K0.25 million per year to the recreation park from existing district overheads. The recreation park would require 150 staff costing a total of K0.4 million per annum (at current prices). Vibongo district will not incur any advertising costs as bill boards will be placed along the main highways at the start of the investment phase. The cost of the bill boards is included in the capital expenditure of K18 million.

The district finance director has stated that Vibongo district has access to a K23 million long term bank loan at 9.5% annual fixed interest rate to provide the necessary finance for the recreation park. The Town Clerk has argued that the district should consider using the grants provided by the central government to finance the investment in the recreation park. A smaller loan may then be taken to supplement the grant, in case of a short fall. The amounts of grants to be provided each year depend on the funds allocated to the Ministry of Local Government and Housing on an annual basis.

Some councilors are of the view that the district should incorporate a company that will be wholly owned by the district. This company would then operate the recreation park on a commercial basis. The whole of the bank loan would form the equity of the company. This will enable the recreation park to make significant economic contributions to Zambia as the company would be subjected to company income tax.

For investment appraisal purposes, all entities in the public sector are expected to use a discounting rate of 8%, which has been provided for in a circular issued by the Minister of Finance. The use of any other discounting rate would not be acceptable.

# **Required:**

- (a) Explain the five (5) components of the business case model developed by the United Kingdom's HM Treasury that would be used as part of the approval process of the recreation park project for Vibongo district.
   (10 marks)
- (b) As an external consultant, prepare a report to the Town Clerk that covers the following:
  - (i) A financial evaluation of the proposed recreation park project using the net present value method of investment appraisal. (15 marks)
  - (ii) A discussion of the appropriateness of the use of the government grant to finance the investment in the play park project. (5 marks)
  - (iii) A discussion of other factors to be considered before a final decision to invest is made and a final recommendation whether to proceed with the investment. (10 marks)

[Total: 40 marks]

# **SECTION B**

# Attempt any THREE (3) questions in this section

# **QUESTION TWO**

You are the Accountant General of Zambia and the Minister of Finance recently presented the national budget amounting to K64,510.30 million. The clerk of the National Assembly

has written to your office indicating that seventy per cent (70%) of the members of parliament are newly elected and they do not understand the institutional framework of the Public Financial Management and why the minister of finance has allocated a significant amount to foreign financing as indicated in the table below:

FUNCTIONAL CATEGORY	Amount K'million	
Total Revenue, Grants & financing	64,510.30	
A. Total Domestic Revenues and Domestic Finance	31,775.99	
I. Domestic Revenue	27,939.79	
Income Tax	9,647.92	
Value Added Tax	4,463.34	
Customs and Excise	7,992.62	
Other Revenue	518.58	
Non Tax Revenue	5,317.33	
II. Domestic Financing	3,836.20	
<b>B.</b> Total Foreign Grants and Financing	32,734.31	
Project Grants	7,231.47	
Programmes and Projects Loans	25,502.84	

The members of parliament strongly feel that this was a high risk.

## **Required:**

- (a) Explain the institutional framework for the Public Financial Management framework for Zambia. (15 marks)
- (b) Explain the Sources of foreign financing and potential risks in relying on foreign borrowing as a significant source of government financing. (5 marks)

#### [Total: 20marks]

#### **QUESTION THREE**

#### JHK Plc

This is a listed company in the telecommunications industry. The company's stated financial objectives are:

(1) To increase the earnings per share year on year by 10% per annum, and

(2) To achieve a 25% per annum return on capital employed.

This company has an equity market capitalisation of K450 million and it also has a variety of debt instruments trading at a total value of K250 million.

## MGN Health Services

This organisation is a newly established purchaser and provider of healthcare services in the public sector. The organization is managed and controlled by the ministry of health and operates as a pilot project at one location in the City of Lusaka.

Its total income for the current year will be almost K90 million. It is considering funding the building of a new healthcare centre in the City of Kitwe through Public Private Partnership (PPP). The total debt will be K22 million. The capital and interest will be repaid over 15 years at a variable rate of interest, currently 9% each year. MGN Health Services' sole financial objective states simply as to achieve financial balance during the year. Its other objectives are concerned with qualitative factors such as 'providing high quality healthcare'.

# **Required:**

- (a) Discuss the reasons for the differences in the financial objectives of the JHK Plc and MGN Health Services. (10 marks)
- (b) Discuss the main differences in the business risks involved in the achievement of the financial objectives of JHK Plc and MGN Health Services and how these risks might be managed. (8 marks)
- (c) Explain how the financial risks introduced into MGN Health Services by the use of PPP might affect the achievement of its objectives and comment on how these risks might be managed. (2 marks)

[Total: 20 marks]

#### **QUESTION FOUR**

Zambia recently underwent a Public Expenditure and Financial Accountability (PEFA) review whose main objective was to assist the country formulate the Public Financial Management Strategy for the country. The initial reviews of the finding were as follows:

- (1) The Ministry of Finance always submits the budget to the legislature on time. However, the country has been preparing activity based budget for the last twenty five years. Most institutions have indicated that it has been a challenge to measure the outputs of their strategic plans. In addition, the budget was supplemented by over 20% at the end of the year.
- (2) Bank reconciliations for all government accounts were not prepared on a monthly basis. Most of the bank reconciliations have unexplained differences and the Auditor General recently unearthed a fraud on one account in the Ministry of General Education which was not reconciled the whole of the year 2015.
- (3) Additional funding has been provided to the office of the Auditor General. This resulted in significant amount of audit work undertaken at public sector institutions with results and recommendations being communicated to the Ministries. However, no action has been taken by the executive.
- (4) The integrated financial Management system (IFMIS) has been introduced and rolled out to line Ministries. However the system is not being used effectively. Most ministries are still capturing transactions outside the system.
- (5) The country recently introduced austerity measures due to erratic revenues that are being received by the Treasury. This has resulted in erratic flow of funds to the Ministries. Most line Ministries are not funded on a monthly basis. As at 31 December 2015, only 20% of the operations budget was funded to line Ministries.

# **Required:**

- (a) Identify shortcomings in the Public Financial Management practice from the initial review and explain how each relates to the relevant pillar of the PEFA framework. Include recommendations of appropriate remedial action. (15 marks)
- (b) Explain the public financial management reforms the country should include when formulating the strategy. (5 marks)

[Total: 20 Marks]

# **QUESTION FIVE**

The Co-operating partners contributing to the Ministry of Health resource envelope are concerned with audit queries that are raised by the Auditor General. In the last three years no significant improvement has been recorded in terms of reduction of the Audit queries as shown in Table 1. They strongly feel that there is a break down in the internal controls of the government system. They are proposing that there is need to revise the legal framework and embark on continuous capacity building of staff handling the core areas of Public Financial Management namely; Procurement, Audit, Accounting and Budgeting.

## Table 1

	2015	2014	2013
ISSUES	( <b>K</b> )	( <b>K</b> )	( <b>K</b> )
Unaccounted Revenue	3,251,333	1,220,260	558,449
Misapplication of Funds	73,637,561	65,158,686	28,153,997
Unretired Imprest	72,371,091	26,400,272	13,460,323
Failure to Follow Procurement Procedures	35,701,492	8,406,729	2,720,434
Irregular Payments	115,350,860	26,358,488	14,467,146
Overpayments	26,559,013	1,575,571	360,684
Undelivered Materials	251,523,804	19,959,462	522,904

# **Required:**

- (a) Outline the specific Acts of Parliament and other legal documents which make up the framework within which Public Financial Management operates in Zambia and indicate why co-operating partners feel there is a need to further reform them. (14 marks)
- (b) Using information in Table 1, explain the measures that could be taken to improve accounting and reporting in order to reduce the number of Audit queries. (6 marks)

#### [Total: 20 marks]

# **END OF PAPER**

#### **3.8 – PUBLIC SECTOR FINANCIAL MANAGEMENT SOLUTIONS**

## SOLUTION ONE

(a) The business case model developed by the United Kingdom's HM Treasury is a model for planning and implementation of public sector projects to ensure that such projects are a success. The model is composed of five components which start with the strategic case. The strategic case is that the intervention should be supported by a case for change which provides the rationale why the project is required. It also provide what the outcomes of the project would be and how it fits within the wider national, regional and/ or local priorities. National priorities would relate to the whole of Zambia while the regional priorities may relate to the province with local priorities relating to the district. Vibongo district would have assessed whether such recreation facilities are required in the area.

The second component is the economic case. This is the case that the intervention represents best public value. This demonstration requires the identification and appraisal of a range of alternatives with a view of producing a short list of options that would be subjected to a detailed cost benefit analysis to enable the preferred option to be subjected to techniques of dealing with risk and uncertainty such as sensitivity analysis. Vibongo district would need to identify a range of alternative ways of providing recreation as opposed to only considering the park.

The third component is the commercial case. The commercial case require demonstration that the preferred option will result in a viable procurement process. This involves the need to specify service requirements and outputs, delivery models and risk allocation and any anticipated charging regime. Accordingly, Vibongo district would have to demonstrate that the option that would have been put forward in the economic case would result in a viable procurement process.

The fourth case is the financial case. This should demonstrated that the preferred option is affordable and as such, it can be funded. The capital and revenue expenditure over the period of the project must be made available together with the assessment impact that it would have on the public sector budgets. Vibongo would need to demonstrate how the proposed investment would impact on the public sector budgets that may be in place as well as those for later years to come.

The fifth component is the management case. There must be the capacity to deliver the preferred option successfully in accordance with sound project management methodologies and with robust monitoring and evaluation, change management, risk identification and mitigation and other processes in place. Vibongo district would have to demonstrate that it has the capacity to deliver the preferred option.

(b) REPORT

To:	The Town Clerk – Vibongo District
From:	External Consultant
Date:	12 December 2017
RE:	EVALUATION OF THE PROPSED RECREATION PARK PROJECT

This report is about the prosed investment in the recreation park in the newly established Vibongo district. The report provides a financial evaluation of the project and discusses the structuring the operations of the proposal and how it may be financed together with a discussion of additional factors to be considered before a final decision is made. The report conclude with a recommendation regarding the proposal.

Detailed computations relating to the financial evaluation of the project are contained in the appendices attached to this report.

(i) Financial Evaluation of the project

Given that there is a two year investment phase for this project, the first operating cash flows are expected from year 2 as computed in the appendix. The investment in the recreation park will produce a positive net present value of K787,000, which shows that the proposal is financially viable, though only marginally. On financial grounds, it would be recommended that the project should be undertaken.

(ii) Use the government grants to finance the investment

The government grants are provided to finance the operations of the councils as opposed to financing proposed capital projects. As mentioned in the scenario, the amounts available each year depend on the allocation in the national budget. In case there is a surplus from a grant in the current year, then there is a possibility that the amount may go towards the payment of the K9 million required now. Such a surplus is however highly unlikely to arise because the amounts that are provided to councils by way of government grants are usually considered to be inadequate to finance the operations. Councils have therefore been encouraged to raise funds through several means, including borrowing.

(iii) Other factors to be considered and final recommendation

The financial projections used in the estimate of the net present value (NPV) may the subject of considerable inaccuracy. It would be useful to know the accuracy of estimates of attendance levels per day and the level of spending per guest in the recreation park, the accuracy of price and cost changes and the accuracy of the estimate of realisable value at the end of the four years' operating period.

For a major investment it is unwise to rely on a single estimate of NPV. Sensitivity analysis or simulation should be used in order to ascertain the impact on the NPV of changes in attendance and other key variable upon which the NPV depends. It would be better to undertake simulation analysis, based upon different possible attendance levels, costs, risk, and so on, in order to estimate a range of possible NPVs, rather than use a single point NPV value.

A crucial question is what happens to cash flows beyond the district's four year planning horizon. The realisable values are asset values, not the value of the recreation park as a going concern. The value as a going concern could be very different from the asset values, and have a major influence on the investment decision.

The strategic importance of the park to local authority and the Zambian economy as a whole must also be investigated, as this may heavily influence the final decision. Any final decision must encompass all relevant non-financial factors of which little detail has been provided. Vibongo district must be satisfied that it can recruit an appropriately skilled labour force for the recreation park, as a failure to do so may result in the project being unsuccessful.

Considering that the project produces a positive NPV, there is a strong belief that it would enable the district earn the minimum possible return on investment. It is therefore recommended that the project should be undertaken although sensitivity analysis or simulation must be undertaken to assess the impact of changes in variables on the NPV

We shall be available to provide any additional service that may be required regarding financial management at the district level.

Signed

External Consultant

# APPENDIX TO THE REPORT

Computation of discounted cash flows

	Year 2	Year 3	Year 4	Year 5
	K'000	K'000	K'000	K'000
Earnings (W1) x 1.03	3,323	3,423	3,526	3,632
Less operating expenses				
Maintenance	(1,500)	(1,900)	(2,300)	(2,700)
Insurance (W2) x 1.03	(212)	(218)	(225)	(232)
Labour (W3) x 1.03	<u>(424)</u>	<u>(437)</u>	<u>(450)</u>	<u>(464)</u>
Net operating cash in flow	1,187	868	551	236
Working capital (W3) x 1.03	(154)	(159)	(164)	5,627
Realizable value of non-current assets				25,000
Net cash flows	1,033	709	387	30,863
DCF at 8%	<u>0.858</u>	0.794	0.735	0.681
Present Values	<u>886</u>	<u>563</u>	<u>284</u>	<u>21,018</u>

Net Present Value Calculation

Sum of present Values of future cash flows

Present Value of investment phase cash flows Year 0 capital outlay Year 1 total capital outlay: K14,000 x 0.926 Net Present Value Workings	9,000 <u>12,964</u> <u>(21,964)</u> <u>787</u>
(1) Computation of the earnings for the first year of operations	
Adult admission: 40% x 150 x K18 x 365 x (1.03) <sup>2</sup> Children admission: 60% x 150 x K10 x 365 x (1.03) <sup>2</sup> Food: 150 x K80 x 30% x 365 x (1.03) <sup>2</sup> Gifts: 150 x K50 x 40% x 365 x (1.03) <sup>2</sup> Total earnings (2) Other operating costs for the first year of operations	K'000 418 349 1,394 <u>1,162</u> <u>3,323</u>
Insurance: K200,000 x (1.03) <sup>2</sup> Labour: K400,000 x (1.03) <sup>2</sup> (3) Working capital investment required in year 1 = K5,000,000 x 1.03	K'000 212 424

# = <u>K5,150,000</u>

Year		Working capital	
		Investment	Change
		K'000	K'000
1		5,150	(5,150)
2	K5,150 x 1.03	5,304	(154)
3	K5,304 x 1.03	5,463	(159)
4	K5,463 x 1.03	5,627	(164)
5		0	5,627

# SOLUTION TWO

(a) Institutional framework for the Public Financial Management framework for Zambia

# The Executive

- (i) Two main divisions in the Ministry of Finance and their responsibilities are:
  - (1) Economic Management and Finance Division oversees economic management, financial management, and internal controls.
  - (2) Budget and Economic Affairs Division facilitates preparation of the national annual budgets and its implementation.
  - (3) Also has responsibility for management of Government investments and the development and implementation of effective debt management strategies.

# (ii) **Responsibilities of the Auditor General under the Constitution include**:

- (1) audit of the accounts of (i) state organs, state institutions, provincial administration and local authorities, and (ii) institutions financed from public funds;
- (2) audit of the accounts that relate to the stocks, shares and stores of the Government;
- (3) conducting financial and value for money audits, including forensic audits and any other type of audit, in respect of a project that involves the use of public funds;
- (4) ascertain that money appropriated by Parliament or raised by the Government and disbursed (i) has been applied for the purpose for which it was appropriated or raised, (ii) was expended in conformity with the authority that governs it, and (ii) was expended economically, efficiently, and effectively.

# (iii) **Responsibilities of the National Assembly under the Constitution include**:

- (1) ensuring equity in the distribution of national resources amongst the people of Zambia;
- (2) appropriating funds for expenditure by State organs, State institutions, provincial administration, local authorities and other bodies;
- (3) scrutinising public expenditure, including defence, constitutional and special expenditure;
- (4) approving public debt before it is contracted.

# (iv) Local Government

- (1) The Ministry of Local Government and Housing is the central government body with responsibility for overseeing local government.
- (2) Councils are required to prepare budgets for the services they deliver in accordance with centrally determined guidelines and these are scrutinised and approved by the Ministry of Local Government and Housing.
- (3) Accounts are required to be prepared and are audited by auditors appointed

by the Ministry, with audit reports submitted to both the council and Ministry.

(4) Each council is required to submit a report indicating actions to be taken to respond to issues raised in the report, and these are consolidated by the Ministry and scrutinised by Parliament

While a national decentralisation policy exists to devolve service delivery as far as possible to the local level, at present the majority of services are still financed and delivered by central government entities at either the national or provincial level. Local government is therefore a relatively minor element of the wider PFM framework, although one that is expected to grow in importance. Part VI of the Local Government Act 1991 provides the main legal financial framework for councils.

## (b) **Sources of foreign financing and risks**

## Source of foreign financing and risk

Borrowing abroad, a country might end up in an external debt crisis

Foreign borrowing allows to finance the fiscal deficit without creating money supply-driven inflationary pressures or crowding out domestic lending to the private sector. However, external credit flows tend to be volatile, and subject to sudden stops as it may become unsustainable

By providing not only financing but also foreign exchange, foreign borrowing may induce a real exchange rate appreciation, thus hampering competitiveness and possibly lowering investment and economic growth

External debt is typically denominated in foreign currency and this creates additional constraints on monetary policy and exchange rate management. For instance, according to foreign currency-denominated debt lowers the evaluation of solvency because it heightens the dependence of debt service on the evolution of the exchange rate, which is often volatile and subject to shocks and crises.

When there are currency mismatches in the balance sheets of local agents, currency devaluations are contractionary since they induce negative net wealth effects. Under these circumstances, the central banks are reluctant to let the exchange rate float and tend to intervene aggressively in the foreign exchange market and hold more international reserves.

# SOLUTION THREE

(a) There has been a convergence in the objectives of public and private sector organisations. Private sector organisations increasingly need to take notice of the views of a wider group of stakeholders in addition to shareholders. On the other side, the public sector has increasingly adopted management and financial practices based upon private sector models and there has been an increased focus on the need for accountability. It is still the case, however, that private sector companies have as a central objective the need to maximise shareholder wealth.

The differences in the objectives between JHK Plc and MGN Health Services arise from the differences in their type. JHK Plc is a private sector organisation while MGN Health Services is a public sector organization.

# Earnings Per Share (EPS) in the private sector

EPS and growth in EPS has been used by private sector organisations as a measure of success and EPS growth can be compared with other organisations. Growth in EPS is seen as an important means of assessing company performance both by the market and by shareholders. However, organisational decisions need to be based upon a broader set of criteria.

EPS is not appropriate to the public sector where there is more attention on issues such as economy, efficiency and effectiveness and obtaining value for money.

## **Returns and investment**

Private sector organisations will need to set targets in terms of the return on capital employed in order to ensure that the needs of shareholders are met. The latter will expect a return which adequately compensates them for the risks which they are taking.

Public sector organisations may set targets in terms of a required return on capital but ultimately other factors are more important in assessing their success and the acquisition of resources may be more closely linked to political issues than purely financial ones.

Most private sector organisations will use investment decision criteria based upon investment appraisal, calculating NPV's using a weighted cost of capital, or a risk adjusted rate based upon this. The cost of capital for public sector organisations is effectively fixed by the Ministry of Finance. It is unlikely to be risk adjusted and any public sector evaluation may take into consideration social costs and benefits.

While private sector companies can freely borrow funds in the marketplace, subject to the normal market judgements of their ability to repay and use the money effectively, public sector organisations normally work within a cash limited budget within a single fiscal year. This sometimes means that there are difficulties in adequately funding long term investments as there is a pre-occupation with staying within short term financial limits.

(b) There is a difference between the Private and Public sectors in terms of the management of risk. Private sector organisations generally have to compete for customers and ensure that they charge a price which covers cost, generates a profit, but is nevertheless competitive with other suppliers. The main risk they face is a loss of customer demand.

Public sector services are often provided free of charge to the user, or at minimal cost to the user. The health sector has the problem of managing capacity to meet demand and this can lead to prioritisation and effectively rationing, with waiting lists as a consequence. Other areas of the public sector may need to have contingency plans for sudden changes in state funding, which will impact upon financial viability. The public sector may thus face risks of both excess demand and reduced funding because of demand changes or changes in political priorities.

Managing risk in the private sector may therefore entail:

- (1) meeting the needs of customers and of stakeholders
- (2) undertaking market research to get a better understanding of customers and markets
- (3) taking steps to assess and manage risks via insurance, hedging of foreign exchange and interest rate risks.

Managing risks in the public sector may therefore entail:

- (1) monitoring of economy, efficiency and effectiveness and value for money
- (2) using internal markets to purchase services and establish 'fair' transfer prices
- (3) using private sector funds where appropriate to give longer term investment horizons.
- (c) The PPP would limit the longer term fiscal flexibility because the government, through MGN Health Services would be required to make contractual payments to the private sector partner (s), with such payments extending into the longer term. Because such payments will be contractual, MGN Health Services must ensure that they are made even if their payment would hinder the achievement of MGN Health Services objectives.

The risks arising should be reduced by ensuring that the government sets overall limits on PPP which should not be exceeded. The proposed PPP should therefore ensure that the overall limit on PPP already in place will not be exceeded.

#### SOLUTION FOUR

(a) Shortcomings and how each relates to the relevant pillar of the PEFA framework

#### Failing

#### **Relevant Pillar**

1. Most institutions have indicated that it has been a challenge to measure the outputs of their strategic plans. In addition, the budget was supplemented by over 20%.

Pillar I – Budget reliability. Based on the approval of a supplementary budget of over 20%, this leads to a huge variance of the expenditure against the revenues that were projected. In addition, the institutions indicated that they had challenges in measuring outputs. This is an indication that the budget is prepared based on previous years' activities other than institutions thinking through activities their and programmes.

#### Recommendation

The budget should be prepared based on outputs. It should be forward looking considering what is the expected output from government activities and programmes.

2. All Pillar VI Accounting and Bank reconciliation should government accounts were not Reporting. Failure to prepare be prepared monthly. reconciled bank reconciliation Unexplained differences on а on monthly basis. Most of monthly basis indicated a should be explained and have unexplained finances differences and the Auditor General unearthed a fraud on one account was not reconciled the whole of 2015.

- 3. Recommendations audit findings being communicated to the Ministries. However. no action has been taken by the executive.
- 4. System is not being used effectively. Most ministries are still capturing transactions outside the system

5. Erratic flow of funds to the Ministries. Most line Ministries are not funded on a monthly basis. Only 20% of the operations budget has been released.

the bank reconciliation lack of control over public

remedial action taken immediately by bringing the issues to the attention of the respective bank.

of Pillar VII – External Scrutiny and Audit

Public Sector Audit appears to have been enhanced, lack of action from the executive entities results in failure to implement the recommendations of the audit

Pillar VI - Accounting and Reporting Accurate and reliable records maintained. and are

information is produced and disseminated at appropriate meet decisiontimes to making, management, and reporting needs. The absence of information in the system affects decision making and in the this could result government not being accountable

Pillar V - Predictability and control in budget execution Predictability of in-year

resource allocation – assesses the extent to which the central Ministry of Finance is able to forecast cash commitments and requirements and provide reliable information on the availability of funds to budgetary units for service delivery. Failure to disburse funds on a

monthly basis is a sign of weaknesses in cash management

The audit report findings should be delivered to an independent audit committee of the public sector . Follow up work should be undertaken to confirm recommendations are implemented.

Identification of skills gap and continuous capacity building should be undertaken for all staff using the system.

Implement measures such as :Consolidation of cash balances: Review frequency of bank and cash balance consolidation. Cash forecasting and monitoring: Examines whether а cash flow forecast is prepared for the year and fiscal the frequency of update based on actual cash flows.

- (b) Public financial management reforms
  - 1. Planning and Budgeting: Reforms in implementing the output based budget to enable ministries measure outputs
  - 2. Accounting and Reporting: Capacity building focusing on skills gap to enable Ministries utilise the system
  - 3. Auditing: Reforms to establish Independent audit committee of the Public Sector
  - 4. Treasury Reforms : Introduction of Treasury reforms focusing on banking relationship; on how banks could interface with government accounting system and skills training on preparation of automated bank reconciliation
  - 5. Revenue reforms: Introduction of efficient ways of collecting revenues and also minimise corruption; example use of VISA cards. Revising of policies on revenue; through broadening tax base.

## SOLUTION FIVE

- (a) The main legal documents which govern PFM in Zambia are:
  - (i) The Constitution, which defines the fundamental principles and established precedents including the respective roles and powers of the legislature, executive and judiciary. It contains specific provisions relating to public finance and the budget including guiding principles of public finance.
  - (ii) The guiding principles relating to public finance include transparency and accountability, fairness relating to the burden of taxation, allocation of current resources to ensure equity between regions and the generations, and also prudence in the use of resources. A recent amendment also accelerated the timing of the budget cycle.
  - (iii) The Public Finance Act 2004 prescribes the control and management of public finances in Zambia, including the control of statutory corporations. The Financial Regulations 2006 provide specific guidance on financial related matters for officials under the Public Finance Act 2004.
  - (iv) The Local Government Act 1991 defines the functions of local authorities and prescribes the control and management of public finances by local government entities, including arrangements for audit.
  - (v) The Public Procurement Act, 2008 and Regulations, 2011 prescribes the powers, functions, and composition of the Zambia Public Procurement Authority and all procuring entities as well as the methods, rules, processes and the code of conduct of all those involved in procurement.
  - (vi) The National Payment Systems Act, 2007 prescribes payment system regulations. The Loans and Guarantees (Authorization) Act of the Laws of Zambia authorises the Minister responsible for Finance to contract loans on

behalf of the Republic.

(vii) The Public Audit Act 2016 prescribes the duties and powers of the Auditor General and establishes the National Audit Office.

Co-operating partners feel that there is a need to further reform them for the following reasons:

- (i) Is fragmented and outdated
- (ii) It does not fully capture recently introduced reforms and internationally accepted best practices
- (iii)It needs revision relating to medium-term planning and budgeting, and the adoption of international accounting and reporting standards
- (iv)It should extend the coverage of the law to general government and financial oversight of the wider public sector, and provision on the management and monitoring of fiscal risks
- (v) It does not sufficiently strengthen existing institutions, including the National Assembly and its powers to scrutinise the budget and the independence of the Auditor General
- (b) From the information in Table 1 the measures that could be taken to improve accounting and reporting in order to reduce on the number of Audit queries are as follows:

Invest in Integrated systems to ensure that goods procured are issued through the system

Reconciliation of receivables accounts (imprest) should be done on a monthly basis Revenue reforms: Introduction of efficient ways of collecting revenues and also minimise corruption; example use of VISA cards.

Provide adequate skills training on procurement procedures to those handling procurement and accounting systems.

Review existing legal framework on financial management

Review the internal audit process of government; consider reforms of establishing an independent audit committee

# END OF SOLUTIONS