



**QUESTION AND ANSWER**

**FOR**

**JUNE 2018**

**TAXATION**

**PAPERS**



TAXATION PROGRAMME EXAMINATIONS

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CERTIFICATE LEVEL

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C1: BUSINESS MANAGEMENT

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MONDAY 11 JUNE 2018

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

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**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.
2. This question paper consists of FIVE (5) questions of twenty (20) marks each. You MUST attempt all the FIVE (5) 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.

**Attempt all the FIVE (5) questions**

**QUESTION ONE**

- (a) In current business environment, medium-sized organisations are increasingly facing competition and environmental change. This inevitably makes such organizations adopt matrix organizational structures.

**Required:**

Discuss briefly **six (6)** benefits that would accrue to the organization for adopting the Matrix Organization Structures. (12 marks)

- (b) Managers assume the role of leaders in organizations and may adopt Authoritarian, democratic or laissez – faire styles of managerial leadership.

**Required:**

(i) Define the term 'leadership' (2 marks)

(ii) Explain briefly the following managerial leadership Styles:

1. The authoritarian / autocratic style (2 marks)

2. The democratic style. (2 marks)

3. The laissez – faire style. (2 marks)

**[Total: 20 Marks]**

**QUESTION TWO**

- (a) The corporate code of ethics (ethical code) guides workers to exhibit ethical behavior in business organizations.

**Required:**

(i) Describe Corporate Code of Ethics and outline any **three (3)** principles of ethical code of ethics. (5 marks)

(ii) Outline any **five (5)** values that would promote ethical behavior among workers in business organisations. (5 marks)

- (b) Partnership forms of business organizations are common among Law and Auditing firms and are established, among other reasons, to pool resources such as skills, experiences, knowledge, finances and assets.

**Required:**

Explain any **five (5)** advantages and **five (5)** disadvantages of Partnerships as forms of business organizations. (10 marks)

**[Total: 20 Marks]**

### **QUESTION THREE**

- (a) State five (5) characteristics that distinguish a public limited company from a sole trader. (10 marks)
- (b) Explain how the social and demographic factors may affect demand of a product. (10 marks)

**[Total: 20 marks]**

### **QUESTION FOUR**

- (a) Briefly explain any five (5) reasons why communication is important to business organisations. (10 marks)
- (b) Discuss the five (5) leadership styles according to Blake and Mouton managerial grid (10 marks)

**[Total: 20 marks]**

### **QUESTION FIVE**

The marketing Function in business organizations is tasked with responsibility of conducting marketing research aimed at reducing barriers that may hinder the implementation of marketing plans.

- (a) (i) Describe the concept of marketing mix (2 marks)
- (ii) Outline the steps you would take in conducting Market research (8 marks)
- (b) Explain any **five (5)** barriers that hinder the implementation of marketing plans. (10 marks)

**[Total: 20 Marks]**

**END OF PAPER**

## **C1- BUSINESS MANAGEMENT SOLUTIONS**

### **SOLUTION ONE**

Matrix structures use cross-functional communication links and elements of supervision in order that complex operations involving a number of functions may be properly co-ordinated. A common approach is to superimpose a customer-focused managerial structure that cuts across the normal vertical functional management hierarchy.

The benefits or advantages that may accrue to the organizations that adopts matrix organization structures include:

- (i) **Improves Flexibility:** - Matrix structures are **flexible:** project teams can be put together, amended and disbanded as required.
- (ii) **Efficient use of resources:-** Matrix structure makes good management of resources which includes human resources.
- (iii) **Boosts team work:-** Matrix structure improves team spirit among workers
- (iv) **Improves workplace communication:-** Matrix structures improves communication among employees and management.
- (v) **Employee empowerment:-** matrix structures builds employee empowerment in the staff involved in projects supervision/leadership
- (vi) **Information flow:-** Matrix structure promotes interdisciplinary information flow within organisational structures
- (vii) **Project integration:-** Matrix structure is a sure way to integrate project objectives in an organization.

#### B (i) Leadership Definition;

Leadership may be defined as getting others to follow or getting people to do things willingly or the use of authority in decision-making. It is related to motivation, interpersonal behaviour and the process of communication. It may also be referred to as a relationship through which one person influences the behaviour or actions of other people To people outside the organization the manager might not necessarily be seen in a leadership role. The emphasis of Leadership is on interpersonal behaviour in a broader context. It is often associated with the willingness and enthusiastic behaviour of Leadership which does not necessarily take place within the hierarchical structure of the organization

The style of managerial leadership is usually exercised within the confines of an organization towards subordinate staff and may take the following formats:

**(i) The authoritarian /autocratic style:**

This style is where the focus of power is concentrated on the manager and all interactions within the group move towards the manager. The manager alone exercises decision-making and authority for determining policy, procedures for achieving goal, work tasks and relationships, control of rewards or punishments

**(ii) The democratic style:**

In this style of leadership power and/or authority is more with the group/team and there is greater interaction within the group. That is, the leadership functions are shared with members of the group and the manager is more part of a team. The group members have a greater say in decision-making, determination of policy, implementation of systems and procedures

**(iii) A laissez-faire style:**

This is the type of leadership where the manager observes that members (or subordinates) of the group are working well on their own and he/she consciously makes a decision to pass the power/authority to members (subordinates) and gives them freedom of action to do as they think best, and does not interfere, but is readily available if help is needed. Members or subordinates are left to face decisions that rightly belong with the manager

## **SOLUTION TWO**

- a) (i) Corporate Code of ethics or ethics code may be defined as a written set of guidelines issued by an organisation to its workers and management to help them conduct their actions or business in accordance with its values and ethical standards. For instance A code of ethics for accountants has been issued by the **International Federation of Accountants (IFAC)**, which represents all the major accountancy bodies around the world.

Principles of the code include:

- Integrity
- Objectivity
- Professional competence and due care
- Confidentiality
- Professional behaviour

## **(ii) Values that would promote ethical behaviour in business organisations**

- **Openness**

For example, employees must be open with their managers if an accounting error is found. Trying to cover it up could not be considered ethical.

- **Trust**

For example, employees must trust that their managers, because of their knowledge and experience, give good guidance and direction.

- **Honesty**

This does not need much expansion, but it is important that honesty with colleagues, suppliers and customers is encouraged.

- **Respect**

This will encourage the proper treatment of stakeholders and reduce the chance that they are treated unethically.

- **Empowerment**

Employees should be empowered to 'do the right thing' and to refuse to behave in away they know to be contrary to the organisation's ethical code.

- **Accountability**

Accountability means that people do not try to avoid issues or obligations. If you are given something to do, you should try to do it to the best of your ability

## **b) Advantages of Partnerships**

Forming partnerships has several advantages that include the following:

- i) A Partnership is easy to set up, as it does not involve long costly procedures.
- ii) Division of labour is possible, as there are many people involved with various skills and experiences.
- iii) More people are involved in the business so more capital can be raised.
- iv) Expenses and management of the business are shared.
- v) The individuality of each partner is not totally lost, as partners maintain many of the personal advantages of the sole proprietorship.
- vi) There is greater continuity in a partnership than in sole proprietorship. In case of death or resignation, the remaining partners can form a new partnership.
- vii) Decision-making is consultative leading to improved quality of decisions.
- viii) A partnership is not required to publish its accounts annually. It is secrecy

### **Disadvantages of Partnerships**

Partnerships have several disadvantages as include;

- i) Decisions may be delayed by disagreements among partners.
- ii) Partners have unlimited liability and are therefore personally liable for the debts of the partnership. Personal assets are at risk.
- iii) Lack of capital may limit expansion as it depends on partners for raising capital.
- iv) When one partner dies or leaves, a new partnership is required, which may be time consuming or awkward.

### **SOLUTION THREE**

#### **(a) Five characteristics that distinguishes a public limited company from a sole trader:**

- (i) A public limited company is formed and owned by more than two people, unlike a sole trader which is owned by one.
  - (ii) A public limited company can sell its shares to the general public through the stock exchange market.
  - (iii) A public limited company has separate legal entity unlike a sole trader who does not have. Separate legal entity means that in the shareholders or owners are separate from the affairs of the company, this is because in law a company is considered to be a person with its own rights.
  - (iv) Shareholders/ owners of a public limited company have limited liability unlike sole trader who has unlimited liability. Shareholders have limited liability because in the event where a company fails to honour its financial obligations, creditors cannot reposes shareholders private properties.
  - (v) Public limited company raises large amounts of capital by selling shares and borrowing unlike sole trader who raise small amount of capital.
  - (vi) There is continuity of business even if one shareholder dies, unlike sole traders whose businesses mostly discontinue once the owner dies.
- (b) Changes in the social and demographic factors may affect demand of a product to either increase or decrease. The following are the factors that may cause demand to increase or decrease:

#### **Religion and cultural beliefs**

Religion has a strong influence on what the followers must consume, how the products must be packed and advertised. Without following the cultural beliefs the product may not be accepted by the target market.



### **Lifestyle**

Demand of certain goods is dependent on the lifestyle of a particular social class. Therefore, certain goods' demand is influenced by lifestyle.

### **Age distribution**

Certain products are specifically consumed according to age group. The increase in the population for a certain age group may increase the demand for a group. For instance in the clothing industry certain fashions are targeted at youths who comprise the largest percentage of the population.

### **Education levels**

The educated population mostly comprises of the middle class in an economy. This means that they are able to access most of the basic needs and therefore the demand for basic needs such as food, shelter usually increases.

### **Sex**

Their certain products that are produced specifically for female or male, also consider who has more influence in making household buying decision. For female are highly influenced by fashion and would like to buy novelty goods. (10 marks)

## **SOLUTION FOUR**

### **(a) Importance of communication in business organisation**

- (i) Communication enables the business organisation to inform the public of the goods and services being offered through advertising.
- (ii) Communication makes it possible for the instructions to be issued out by superiors to perform tasks either through written or verbal.
- (iii) Communication enable ideas to be shared among workers at different levels of hierarchy and business decisions are made.
- (iv) Communication enables the company to receive complaints from customers and use the information to improve on goods and services.
- (v) Communication enables the business to enter new markets both local and international markets.
- (vi) Communication makes it possible for the organisation to be in contact with stakeholders such as suppliers, banks etc

### **(b)**

- (i) **1.1 Impoverished:** This point shows that the manager little concern for both workers and production, he/she is lazy.
- (ii) **1.9 Country Club:** The manager is employee oriented which means he/she pays more attention to employees than production or task.

- (iii) **9.1 Task:** The manager is more concerned with tasks to be performed than relationships with employees.
- (iv) **5.5 Middle of the road:** The manager is at the middle where he/she shows equal concern for production and employees.
- (v) **9.9 Team Management:** This is the ideal leadership style where the manager shows high concern for production and employees.

## **SOLUTION FIVE**

Marketing mix elements is crucial tool to help understand what the customers want as they affect the consumer decisions to buy or not. They are price, product, promotion, place.

- a) The market research process he can use
  - i. Define the problem and research objectives.
  - ii. Develop the research plan for data collection.
  - iii. Data collection and analysis.
  - iv. Interpreting and reporting the findings.
  
- b) The barriers that hinder the implementation of marketing plans are:
  - i. Management culture this is when them seem not to care about marketing plans
  - ii. Political intervention from government legislation
  - iii. Lack of leadership skills and absence of appropriate mix of leadership skills and knowledge
  - iv. Barriers from competitors who may make it hard by simply getting into your way and hinder implementation
  - v. Organisation structure , that is bureaucratic bottlenecks ,like infighting for turf
  - vi. Distributors and resource suppliers delays in delivery of your inputs
  - vii. Few or experiencing a dwindling customer base

**END OF SOLUTIONS**



TAXATION PROGRAMME EXAMINATIONS

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CERTIFICATE LEVEL

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C2: ECONOMICS & FINANCIAL MATHEMATICS

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TUESDAY 12 JUNE 2018

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

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**Attempt all FIVE (5) questions**

**QUESTION ONE**

- (a) Use a diagram to explain how the consumption of merit goods like education can generate positive externalities for society. (5 marks)
- (b) Consider this statement from a politician during a public debate: "Banks do not create money because this is the responsibility of the Bank of Zambia". Do you agree or disagree. Explain your answer. (3 marks)
- (c) Explain **any three (3)** traditional methods used by the Bank of Zambia to control money supply. (12 marks)

**[Total: 20 Marks]**

**QUESTION TWO**

- (a) The World Trade Organisation (WTO) seeks to promote greater **economic growth**, increased **consumer choices**, **reduced costs of production**, and **good governance**, among other things.

Explain how the WTO can achieve each of the four (4) aims mentioned above.

(8 marks)

- (b) Cost, Insurance and Freight (CIF) is an incoterm used when the mode of transporting goods is by sea and by inland motorways.

Describe any **TWO (2) responsibilities for the buyer** and any **TWO (2) responsibilities for the seller** under CIF.)

(4 marks)

- (c) Discuss any two (2) arguments for and any two (2) arguments against the use of progressive taxation in a developing country like Zambia. (8 marks)

**[Total: 20 Marks]**

### **QUESTION THREE**

- (a) PJ Limited is a manufacturing company involved in undertaking high risk projects. The company is considering investing in a project which requires an initial outlay of K50,000.00 according to the company's cash flow projections over the next four year period, the following net cash flows are expected:

<b>Year</b>	0	1	2	3	4
<b>Net Cash Flow (ZMK)</b>	(50,000)	18,000	25,000	20,000	10,000

- (i) Calculate the net present value assuming a 15% cost of capital. (3 marks)
- (ii) Calculate the net present value assuming a 20% cost of capital. (3 marks)
- (iii) Calculate the internal rate of return (IRR) of the above project using the results from (i) and (ii). (4 marks)
- (iv) If the company requires a minimum rate of return of 17%, recommend whether or not the project is worthwhile. (2 marks)
- (b) Define the following:
- (i) Floater (2 marks)
- (ii) Coupon Rate (2 marks)
- (c) A corporation decides to issue 20-year bond in the amount of K 100,000,000. Under the contract, interest payments will be made at the rate of 10% semi- annually. The bonds are priced to yield 5% semi-annually to maturity

**Required:**

What is the issue price of the bond? (4 marks)

**[Total: 20 Marks]**

#### **QUESTION FOUR**

- (a) In conducting a simple regression model for the number of customers and the area of advertising sign used to attract customers, the following data were obtained for six produce stands.

Area of advert sign	0.37	0.3	0.3	0.25	0.3	0.28
Number of customers	240	150	182	95	210	125

Calculate the least-squares regression line for these data. (9 marks)

- (b) At Chipata College of Accounts in Chipata district, 25% of the lecturers are females. 35% of the Lecturers are on Part-time. A Lecturer is chosen at random, what is the probability that the Lecturer is:

- (i) Male (2 marks)  
(ii) Male and Part-time (3 marks)  
(iii) Female or Part-time (2 marks)

- (c) The average number of claims per hour made to a certain insurance company is 1.2. What is the probability that in any given hour either two or three claims will be received? (4 marks)

**[Total: 20 Marks]**

#### **QUESTION FIVE**

- (a) Define the following terms:

- (i) Yield to Maturity (2 marks)  
(ii) Price Value of a Basis Point (PVBP) (2 marks)

- (b) A 10% bond with face value amount K1,000 matures 4 years after issue. Construct the amortization schedule for the bond over its term for the semi-annual rate of 8%. (12 marks)

- (c) Find the present value of K100, 000.00 in perpetuity if the interest rate is 12% per annum. (4 marks)

**[Total: 20 Marks]**

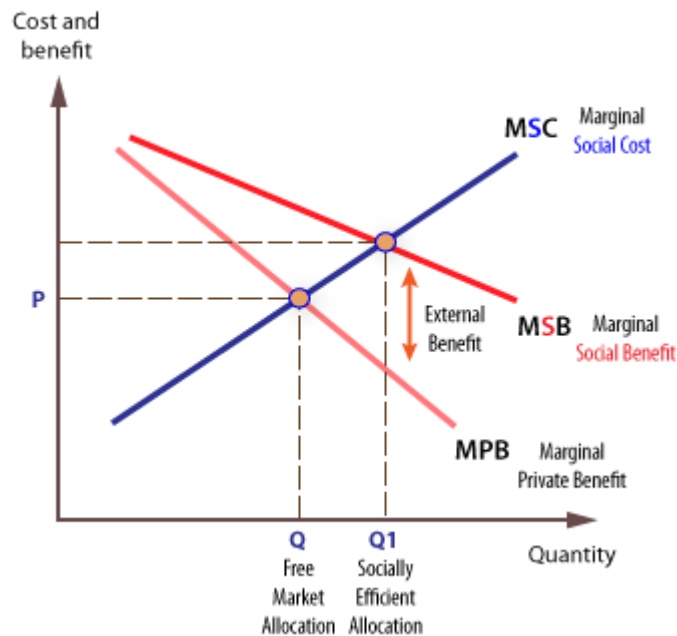
**END OF PAPER**

## C2 -ECONOMICS & FINANCIAL MATHEMATICS SOLUTIONS

### SOLUTION ONE

- (a) Merit goods are products which consumers may undervalue but which the government believes are desirable for consumers as they exhibit positive externalities. Consumers undervalue them because the net private benefit to them is not fully recognised at the time of consumption and it is unlikely that this external benefit will be taken into account when the consumer evaluates its worth. In the case of education as an example of a merit good, pupils and students cannot possibly know the specific private benefit to them of getting an education which results in the consumer under-consuming.

The graph below shows how the failure to recognise the external benefit of consuming a merit good leads to the inefficient free market outcome. The private benefit is less than the social benefit.



- b) Disagree. When a bank makes a loan, it increases deposits, and money supply increases by the amount of the loan because money supply includes checkable deposits. This is different from minting coins or printing notes which is the sole responsibility of the Bank of Zambia.

- c) The traditional methods used by the Bank of Zambia to control money supply are:
- **Open Market Operations (OMO):** This is the buying and selling of government securities by the Bank of Zambia. Buying government securities creates extra bank reserves and loans, thereby expanding the money supply. Selling government securities reduces bank reserves and loans, thereby contracting the money supply.
  - **Discount rate Policy:** This is the rate at which banks borrow from the Bank of Zambia. Lowering the discount rate makes it easier for banks to borrow from the Bank of Zambia and expands money supply. Raising the discount rate discourages banks from borrowing reserves from the Bank of Zambia and contracts the money supply.
  - **Reserve requirements:** This is the money that every deposit taking institution must deposit with the Bank of Zambia to meet its legal requirements. Required reserve ratio and the size of the money multiplier are inversely related. Thus, if the Bank of Zambia decreases the required reserve ratio, the money multiplier and money supply increase. If the Bank of Zambia increases the required reserve ratio, the money multiplier and money supply decrease.

## **SOLUTION TWO**

- (a) The World Trade Organisation (WTO) is the only global international organisation dealing with the rules of trade between nations. Among other things, it seeks to:
- (i) Achieve higher living standards, full employment and sustainable development. The organisation does so by advocating substantial reduction of tariffs and other obstacles to trade. Trade can be a catalyst for greater efficiency and productivity because companies have access to a wider range of high-quality, affordable inputs. They also have access to technology and know-how they could not obtain in a closed economy as open economies tend to grow faster and more steadily than closed economies.
  - (ii) Lower trade barriers through negotiation and operates under the principle of non-discrimination. The result is reduced costs of production (because imports used in production are cheaper), reduced prices of finished goods and services, more choice and ultimately a lower cost of living.



(iii) Help increase productivity and to cut costs even more because of important principles enshrined in the WTO system designed to make life simpler and clearer. It involves transparency (clear information about policies, rules and regulations); increased certainty about trading conditions (commitments to lower trade barriers and to increase other countries' access to one's markets are legally binding); simplification and standardisation of customs procedure, removal of red tape, centralised databases of information, and other measures to simplify trade.

(iv) To help governments take a more balanced view of trade policy. They are better-placed to defend themselves against lobbying from narrow interest groups by focusing on trade-offs that are made in the interests of everyone in the economy. Transparency; greater harmony between countries on other aspects of trade facilitation; clearer criteria for regulations dealing with the safety and standards of products, and non-discrimination also help by reducing the scope for arbitrary decision-making and opportunities for corruption.

(b) **The following are the responsibilities of the buyer:**

- To collect the goods at the port of destination
- To bear all the costs and risks and damage to the goods once they are off-loaded
- To arrange and pay and insurance from the port of destination to their final destination in the importer's country
- To accept delivery and goods when the appropriate documents e.g. Bill of lading, invoices that have been presented.

**The following are the responsibilities of the seller:**

- To arrange and pay for freight charges
- To deliver the goods on board the vessel at the port of shipment
- To arrange and pay for insurance charges while goods are in transit
- To pay loading and unloading costs
- To provide buyer with the appropriate transport document
- To provide buyer with an invoice for the full value of the goods and related costs.

(c) Arguments in favour of progressive taxes

- They follow the ability of the individual to pay. Therefore, higher income individuals are more able to afford to give up more of their income in tax than the lower income earners.
- They enable a government to redistribute wealth. Progressive taxes are hence a tool that can help foster equity in income distribution as well as increase the consumption levels of society because poorer individuals can spend more of their incomes due to the higher marginal propensity to consume.
- Progressive taxes are a counter-balance to indirect taxes that tend to be regressive. In this case they make the tax system fairer and balanced.

Arguments against progressive taxes

- It is usually the poorer societies that have the need to use progressive taxes. The more developed ones do not have so much use for such taxes.
- Higher taxes on extra corporate profits might discourage investment. In this case entrepreneurs may be deterred from creating new companies because the potential return of doing so would not be worth the risks of such an undertaking.
- Progressive taxes might spur tax avoidance and evasion behaviour because individuals and firms that are subject to higher taxes stand to gain more by transferring their wealth to other lower tax regions. In practice, however, such behaviour exists whether taxes are high or low but to a less extent.
- If progressive taxes are too harsh on high income earners or on the wealthy, they may deter initiative and could lead to brain drain where skilled workers opt to go and work outside the country or where investment shifts to other countries.

### SOLUTION THREE

a)

i. At 15%

$$\begin{aligned} NPV_1 &= 18000(1.15)^{-1} + 25000(1.15)^{-2} + 20000(1.15)^{-3} + 10000(1.10)^{-4} - 50000 \\ &= 15652 + 18904 + 13150 + 5718 - 50000 = 3424 \end{aligned}$$

ii. At 20%

$$\begin{aligned} NPV_2 &= 18000(1.20)^{-1} + 25000(1.20)^{-2} + 20000(1.20)^{-3} + 10000(1.20)^{-4} - 50000 \\ &= 15000 + 17361 + 11574 + 4823 - 50000 = -1242 \end{aligned}$$

iii.

$$IRR = \frac{(r_1 \times NPV_2) - (r_2 \times NPV_1)}{NPV_2 - NPV_1} = \frac{(0.15 \times -1242) - (0.20 \times 3424)}{-1242 - 3424} = 0.186690955.$$

Therefore, the internal rate of return is approximately 18.7%

iv) The project is worthwhile because IRR is greater than 17%.

b).

- i) A Floater is a Bond or other debt whose coupon rate changes with market conditions
- ii) Coupon Rate is the rate at which the bond pays interest on its face value at the regular time intervals until the redemption date.

c.  $F = C = 100000000$ ,  $r = 0.05$ ,  $i = 0.025$  and  $n = 40$

$$\begin{aligned} \text{Fair Price} = P &= F \times r \left[ \frac{1 - (1+i)^{-n}}{i} \right] + \frac{C}{(1+i)^n} \\ &= 100,000,000(0.05) \left[ \frac{1 - (1.025)^{-40}}{0.025} \right] + \frac{100,000,000}{(1.025)^{40}} \\ &= 125,513,875.30 + 37,243,062.37 \\ &= 162,756,937.70 \end{aligned}$$

## SOLUTION FOUR

a) Let  $X = \text{Area of advertising sign}$  and  $Y = \text{Number of Customers}$

X	Y	XY	$X^2$
0.37	240	88.8	0.1369
0.30	150	45	0.09
0.30	182	54.6	0.09
0.25	95	23.75	0.0625
0.30	210	63	0.09
0.28	125	35	0.0784
$\sum X = 1.8$	$\sum Y = 1002$	$\sum XY = 310.15$	$\sum X^2 = 0.5478$

Now

$$S_{XX} = \sum X^2 - \frac{(\sum X)^2}{n} = 0.5478 - \frac{(1.8)^2}{6} = 0.5478 - 0.54 = 0.0078$$

$$S_{XY} = \sum XY - \frac{(\sum X)\sum Y}{n} = 310.15 - \frac{(1.8)(1002)}{6} = 310.15 - 300.60 = 9.55$$

Therefore,

$$\beta = \frac{S_{XY}}{S_{XX}} = \frac{9.55}{0.0078} = 1224.36$$

and

$$\alpha = \bar{Y} - \beta\bar{X} = \frac{1002}{6} - 1224.36\left(\frac{1.8}{6}\right) = 167 - 367.31 = -200.31$$

Hence, the least-squares regression line is

$$y = \alpha + \beta x = -200.31 + 1224.36x$$

b) i)  $P(F) = 0.25$

$$P(M) = 1 - P(F) = 1 - 0.25 = \mathbf{0.75}$$

ii) If  $P(PT) = 0.35$  then  $P(FT) = 1 - P(PT) = 0.65$  hence

$P(M \text{ and } PT)$  using the AND LAW IS:

$$= P(M) \times P(PT) = 0.75 \times 0.65 = \mathbf{0.2625}$$

iii)  $P(F \text{ or } PT) = P(F) + P(PT) - P(F \times PT)$  as they are not mutually exclusive.

$$= 0.25 + 0.35 - (0.25 \times 0.35)$$

$$= \mathbf{0.5125}$$

c) Poisson - distribution with  $\mu = 1.2$ . Thus,  $P(X = x) = \frac{e^{-\mu} \mu^x}{x!}$

$$P(X = 2 \text{ or } X = 3) = P(X = 2) + P(X = 3)$$

$$= \frac{e^{-1.2} 1.2^2}{2!} + \frac{e^{-1.2} 1.2^3}{3!}$$

$$= 0.216859832 + 0.086743933$$

$$= 0.3036$$

## SOLUTION FIVE

a)

- i. Yield to maturity (YTM) is the interest rate that will make the present value of a bond's cash flows equal to market price plus accrued interest.
- ii. The Price Value of a Basis Point (PVBP) is a measure used to describe how a basis point change in yield affects the price of a bond.  
Alternatively, it is the measure of absolute value of the change in price of a bond for a one basis point changes in yield.

b)  $F = C = 1000, r = 0.05, i = 0.04 \text{ and } n = 8$

$$\begin{aligned}
P &= F \times r \left[ \frac{1 - (1+i)^{-n}}{i} \right] + \frac{C}{(1+i)^n} \\
&= 1000(0.05) \left[ \frac{1 - (1.04)^{-8}}{0.04} \right] + \frac{1000}{(1.04)^8} \\
&= 336.64 + 730.69 \\
&= 1067.33
\end{aligned}$$

Bond Amortization Table

Payment Number	Outstanding Principal	Periodic Payment	Payment of Interest @ 4%	Principal Repaid
0	1067.33			
1	1060.02	50	42.69	7.31
2	1052.42	50	42.40	7.60
3	1044.52	50	42.10	7.90
4	1036.30	50	41.78	8.22
5	1027.75	50	41.45	8.54
6	1018.86	50	41.11	8.89
7	1009.61	50	40.75	9.25
8	0	1050	40.38	1009.62

c) PV = a/r =  
100000/0.12

= K  
**833,333.33**

**END OF SOLUTIONS**



TAXATION PROGRAMME EXAMINATIONS

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CERTIFICATE LEVEL

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C3: ACCOUNTANCY FOR TAX PRACTITIONERS

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MONDAY 11 JUNE 2018

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

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**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.
2. This question paper consists of FIVE (5) questions of twenty (20) marks each. You **MUST** attempt all the FIVE (5) 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.

**Attempt all FIVE (5) questions**

**QUESTION ONE**

- (a) Danny, Kenny and Teddy are the owners of Arcma, a partnership business that sells Building supplies in the construction sector. You are the accountant of Harp and Company, the accounting firm that prepares the final accounts for Arcma.
- The financial year end is 31 March.
  - The partners maintain a double entry accounting system consisting of a main ledger, payables ledger and receivables ledger.
  - Arcma is registered for VAT.
  - The trial balance for the year ended 31 March 2018 is given below:

Arcma Trial balance as at 31 March 2018

	<b>Dr K</b>	<b>Cr K</b>
Administration expenses	37 424	
Bank	70 918	
Capital account – 1 April 2017 – Danny		50 000
Capital account – 1 April 2017 – Kenny		50 000
Capital account – 1 April 2017 – Teddy		50 000
Cash	5 000	
Closing inventory – statement of financial position	137 900	
Closing inventory – profit and loss account		137 900
Current account – Danny	40 000	
Current account – Kenny	60 000	
Current account – Teddy	60 000	
Equipment at cost	70 000	
Equipment accumulated depreciation		25 152
Opening inventory	140 400	
Purchases	865 000	
Payables ledger control account		140 700
Rent	30 000	
Sales		1 171 400
Receivable ledger control account	82 142	
Suspense account	18 400	
VAT		14 700
Wages	<u>22 668</u>	
Total	<u>1 639 852</u>	<u>1 639 852</u>

On investigation of the balance on the suspense account you discover errors that need to be corrected. There are also year-end adjustments to be made:

- (i) Some equipment was scrapped during the year:

Original cost	<b>K</b>	4 000
NBV at time of disposal		2 048
proceeds		NIL



- (ii) Depreciation needs to be provided for equipment at 20% using the reducing balance method. No depreciation is provided in the year of disposal.
- (iii) A vehicle costing K17,000 was purchased on 31 March 2018. The correct entry was made to the bank, but no other entries were made. No depreciation needed to be provided for the year ended 31 March 2018.
- (iv) The figures from the columns of the sales day book for 15 March have been totaled correctly as:

	<b>K</b>
Sales column	4 000
VAT column	<u>700</u>
Total column	<u>4 700</u>

The amounts have been posted as follows:

	<b>K</b>	<b>K</b>
Debit sales ledger control account		4,700
Credit VAT		700
Sales		<u>4 700</u>

- (v) An amount for the purchase of goods of K1 512 net of VAT has been debited to the opening inventory account.

**Required:**

- (a) Prepare journal entries to account for items (i) to (v).  
**NOTE:** Dates and narratives are not required. (6 marks)
- (b) Prepare Income statement for the partnership for the year ended 31 March 2018. (6 marks)
- (b) On 30 November 2017, Danny retired from the partnership. You have been presented with the following information about the partnership agreement:
- Partner's annual salaries.
 

Danny	K60 000 (40 000 for the period to 30 November 2017)
Kenny	K60 000
Teddy	K60 000
  - Interest on capital accounts is 3% per annum on the balances at the beginning of the year.
  - Profit share, effective until 30 November 2017.
 

Danny	40%
Kenny	30%
Teddy	30%
  - Profit share, effective from 1 December 2017
 

Kenny	50%
Teddy	50%

Assume that profits accrue evenly during the year.

**Required:**

Prepare the appropriation account for the partnership for the year ended 31 March 2018.

(8 marks)

**[Total: 20 Marks]**

**QUESTION TWO**

You are the accountant for Gedams. You have been presented with a list of balances for the year ended 31 May 2017:

	<b>K</b>
Inventory at 1 June 2016	4 800
Motor vehicles at cost	71 400
Computer at cost	7 200
Fixtures and fittings at cost	38 400
Provision for depreciation 1 June 2016:	
Motor vehicles	36 420
Computer	1 800
Fixtures and fittings	7 680
Wages	49 200
Telephone	2 700
Electricity	3 600
Advertising	1 200
Stationery	1 800
Motor expenses	5 100
Miscellaneous expenses	900
Insurance	3 000
Sales	259 200
Purchases	114 600
Receivables	21 600
Allowance for irrecoverable debts 1 June 2016	600
Bank (debit balance)	3 900
Petty cash	300
Payables	9 540
VAT (credit balance)	2 880
Capital	75 000
Drawings	63 420

You are provided with the following information:

- (i) Depreciation charge has not yet been accounted for:
  - Motor vehicles are to be depreciated at 30% on the reducing balance basis.
  - The computer is being depreciated at 25% on the straight line basis.
  - The fixtures and fitting are being depreciated at 20% on the straight line basis.
- (ii) There is an accrual for electricity of K1,200.
- (iii) There is K900 of prepaid insurance.
- (iv) The provision for doubtful debts is to be 4% of the year end receivables.

- (v) K300 of Advertising costs have been included in the stationery account.  
 (vi) The closing inventory has been values at K6,300.

**Required:**

Prepare the final accounts for Gedams for the year ended 31 May 2017.

**[Total: 20 Marks]**

**QUESTION THREE**

The following information relates to the draft financial statements of Mulolo.

Summarized Statements of Financial position as at 30 September 2017

	<b>2017</b>	<b>2016</b>
	<b>K</b>	<b>K</b>
Assets:		
Non-current assets:		
Property, plant and equipment (Note 1)	97 800	72 300
Financial assets: equity investment (Note 2)	<u>13 500</u>	<u>21 000</u>
	<u>111 300</u>	<u>93 300</u>
Current assets:		
Inventory	30 600	21 600
Trade receivables	10 500	11 100
Bank	<u>-</u>	<u>4 200</u>
	<u>41 100</u>	<u>36 900</u>
Total assets	<u>152 400</u>	<u>130 200</u>
Equity:		
Equity shares of K1 each (Note 3)	42 000	24 000
Share premium (Note 3)	-	6 000
Revaluation reserves (Notes 3)	6 000	10 800
Retained earnings	<u>39 000</u>	<u>30 300</u>
	87 000	71 100
Non-current liabilities:		
Finance lease obligations	21 000	20 700
Deferred tax	3 900	2 700
Current liabilities:		
Tax	3 000	3 600
Bank overdraft	8 700	-
Provision for product warranties (Note 4)	4 800	12 000
Financial lease obligation	14 400	6 300
Trade payables	<u>9 600</u>	<u>13 800</u>
Total equity and liabilities	<u>152 400</u>	<u>130 200</u>

Summarized Income Statement for the year ended 30 September 2017

	<b>2017</b>	<b>2016</b>
	<b>K</b>	<b>K</b>
Revenue	175 500	123 000
Cost of sales	<u>139 500</u>	<u>90 000</u>
Gross profit	36 000	33 000
Operating expense	(26 100)	(13 500)
Investment income (note 2)	3 300	2 100
Finance costs	<u>(1 500)</u>	<u>(1 200)</u>
Profit before tax	11 700	20 400
Income tax expenses	<u>(3 000)</u>	<u>(5 400)</u>
Profit for the year	<u>8 700</u>	<u>15 000</u>

**Notes**

The following additional information is available:

1. Property, plant and equipment:

	<b>Cost</b>	<b>Accumulated depreciation</b>	<b>Carrying amount</b>
	<b>K</b>	<b>K</b>	<b>K</b>
At 30 September 2016	100 800	(28 500)	72 300
New finance lease additions	20 100		20 100
Purchase of new plant	24 900		24 900
Disposal of property	(15 000)	3 000	(12 000)
Depreciation for the year		<u>(7 500)</u>	<u>(7 500)</u>
At 30 September 2017	<u>130 800</u>	33 000	97 800

The property disposed of was sold for K24 300.

2. Investments/ investment income

During the year an investment that had a carrying amount of K9,000 was sold for K10,200. No investments were purchased during the year.

Investment income consists of:

<b>Year to 30 September</b>	<b>2017</b>	<b>2016</b>
Dividends received	600	750
Profit on sale of investment	1 200	-
Increase in fair value	<u>1 500</u>	<u>1 350</u>
	<u>3 300</u>	<u>2 100</u>

3. On April 2017 there was a bonus issue of share that was funded from the share premium and some of the revaluation reserve. This was followed on 30 April 2017 by an issue of share for cash at par.
4. The movement in the product warranty provision has been included in the cost of sales.

**Required:**

Prepare a statement of cash flows for Mulolo for the year ended 30 September 2017 in accordance with IAS 7 statement of cash flows, using the indirect method.

**[Total: 20 Marks]**

## **QUESTION FOUR**

Doreen sells Jewellery through stores in the whole country. Over the last three years the business has experienced declining profitability and is wondering if this is related to the sector as a whole. She has recently subscribed to an agency that produces average ratios across many businesses. Below are the ratios that have been provided by the agency for Doreen's business sector based on a year ended 30 June 2017 and the equivalent ratios for Doreen.

	<b>Doreen</b>	<b>Sector Average</b>
Gross profit margin	25%	35%
Net asset (total assets less current liabilities) turnover	1.6 times	1.4 times
Return on capital employed (ROCE)	12.1%	16.8%
Operating profit margin	7.5%	12%
Current ratio	1.55:1	1.25:1
Average inventory turnover	4.5	3 times
Trade payables payment days	45 days	64 days
Debt to equity	30%	38%

The financial statements of Doreen for the year, ended 30 September 2017 are:

### **Statement of Profit or Loss**

	<b>K</b>	<b>K</b>
<b>Revenue</b>		112 000
Opening inventory	24 900	
Purchases	87 800	
Closing inventory	<u>(20 400)</u>	
Cost of sales		<u>(84 000)</u>
<b>Gross profit</b>		28 000
Operating costs		(19 600)
Finance costs		<u>(1 600)</u>
Profit before tax		6 800
Income tax expense		<u>(2 000)</u>
Profit for the year		<u>4 800</u>

### **Statement of financial position**

	<b>K</b>
Assets:	
Non-current assets:	
Property and shop fittings	51 200
Deferred development expenditure	<u>10 000</u>
	<u>61 200</u>
Current assets:	
Inventory	20 400
Bank	<u>2 000</u>
	<u>22 400</u>
Total assets	<u>83 600</u>

	<b>K</b>
Equity and Liabilities	
Equity:	
Equity share of K1 each	30 000
Revaluation reserve	6 000
Retained earnings	<u>17 200</u>
	<u>53 200</u>
Non-current liabilities:	
10% loan notes	<u>16 000</u>
Current liabilities:	
Trade payables	10 800
Current tax payable	<u>3 600</u>
	<u>14 400</u>
Total equity and liabilities	<u>83 600</u>

**Note:**

The deferred development expenditure relates to an investment in a process to manufacture artificial precious gems for future sales by Doreen in the jewellery market.

**Required:**

- (a) Assess the financial and operating performance of Doreen in comparison to its sector averages. (12 marks)
- (b) Explain four possible limitations on the usefulness of the above comparison. (8 marks)
- [Total: 20 Marks]**

**QUESTION FIVE**

On 31 December 2017, the bank column of C Mwango's cash book showed a debit balance of K150 000. The month bank statement written up to 31 December 2017 showed a credit balance of K295 000.

On checking the cash book with the bank statement it was discovered that the following transactions had not been entered in the cash book.

- Dividend of K24 000 had been paid directly to the bank.
- A credit transfer – ZRA VAT refund of K26 000 had been collected by the bank.
- Bank charges of K3 000
- A direct debit of K7 000 for club subscription had been paid by the bank.
- A standing order of K20 000 for C. Mwango's loan repayment had been paid by the bank.
- C. Mwango's deposit account balance of K140 000 was transferred into his bank current account.

A further check revealed the following:

- Two cheques drawn in favour of T Chikonde K25 000 and F Chanda K29 000, had been entered in the cash book but had not been presented for payment.
- Cash and cheques amounting to K69 000 had been paid into the bank on 31 December 2017 but were not credited by the bank until 2 January 2018.

**Required:**

- (a) Starting with debit balance of K150 000 update the cash book (bank column) and then balance the bank account. (8 marks)
- (b) Prepare the bank reconciliation statement as at 31 December 2017. (4 marks)
- (c) C. Mwango has been told that Assets, liabilities, incomes and expenses are elements of financial statements and need to be recognized in the books.

**Required:**

State the recognition criteria of each of the elements stated above. (8 marks)

**[Total: 20 Marks]**

**END OF PAPER**

### C3 ACCOUNTANCY FOR TAX PRACTITIONERS SOLUTIONS

#### SOLUTION ONE

(a)	<b>Journal entries</b>	<b>Dr K</b>	<b>Cr K</b>
i.	Accumulated depreciation (4 000 – 2 048) Disposal(loss) Equipment at cost	1 952 2 048	4 000
ii.	Depreciation expense Accumulate depreciation	8 560	8560
iii.	Vehicles at cost Suspense	17 000	17 000
iv.	Sales (4 700 – 4 000)	700	
v.	Purchases Opening inventory *70 000 – 25 152 = 44 848 – 2 048 disposal = 42 800. ∴ 42 800 x 20% =8 560	1 512	1512

(b) Arcma's Income statement for the year ended 31 March 2018

	<b>K</b>	<b>K</b>
Sales (1 171 400 – 700)		1 170 700
Less: cost of sales		
Opening inventory (140 400 – 1 512)	138 888	
Purchase (865 000 + 1 512)	866 512	
Less closing inventory	(137 900)	(867 500)
Gross profit		303 200
Less: expenses		
Administration expense	37 424	
Rent	30 000	
Wages	22 668	
Loss on disposal	2 048	
Depreciation expense	<u>8 560</u>	
Net profit		<u>100 700</u> <u>202 500</u>



(c) Arcma's Appropriation account for the year ended 31 March 2018

	<b>1 April 2017 to 30 November 2017</b>	<b>1 December 2017 to 31 March 2018</b>
	<b>K</b>	<b>K</b>
Net profit	135 000	67 500
Salaries:		
Danny	(40 000)	-
Kenny	(40 000)	(20 000)
Teddy	(40 000)	(20 000)
Interest on capital:		
Danny	(1 000)	-
Kenny	(1 000)	(500)
Teddy	<u>(1 000)</u>	<u>(500)</u>
	12 000	26 500
Share of profit: Danny	40% (4 800)	-
Kenny	30% (3 600)	50% (13 250)
Teddy	<u>30% (3 600)</u>	<u>50% (13 250)</u>
	<u>-</u>	<u>-</u>

## SOLUTION TWO

### Income statement Account for the year ended 31 May 2017

	<b>K</b>	<b>K</b>
Sales		259 200
Less: Cost of sales		
Opening inventory	4 800	
Purchases	<u>114 600</u>	
	119 400	
Less: closing inventory	<u>(6 300)</u>	<u>(113 100)</u>
Gross profit		146 100
Less: expenses		
Wages	49 200	
Telephone	2 700	
Electricity (3 600 + 1 200)	4 800	
Advertising (1 200 + 300)	1 500	
Stationery (1 800 – 300)	1 500	
Motor expenses	5 100	
Miscellaneous expenses	900	
Insurance (3 000 – 900)	2 100	
Depreciation:		
Motor vehicles	10 494	
Computer	1 800	
Fixtures and fitting	7 680	
Bad debts	<u>264</u>	
Net profit		<u>(88 034)</u> <u>58 062</u>

Statement of Financial position as at 31 May 2017

	Cost K	Accumulated K	NBV K
Non-current assets:			
Motor vehicles	71 400	46 914	24 486
Computer	7 200	3 600	3 600
Fixtures and fittings	<u>38 400</u>	<u>15 360</u>	<u>23 040</u>
	<u>117 000</u>	<u>65 874</u>	51 126
Current assets:			
Inventory		6 300	
Receivable	21 600		
Less: provision for doubtful debts	<u>(864)</u>		
		20 736	
Prepayments		900	
Bank		3 900	
Petty cash		<u>300</u>	
			<u>32 136</u>
			<u>83 262</u>
Financed by:			
Capital			75 000
Net profit			<u>58 062</u>
			133 062
Less: Drawings			<u>63 420</u>
			<u>69 642</u>
Current liabilities:			
Payables		9 540	
Accruals		1 200	
VAT		<u>2 880</u>	
			<u>13 620</u>
			<u>83 262</u>

### SOLUTION THREE

(a) Statement of cash flows for eh year ended 30 September 20X1

	K	K
<i>Cash flows from operating activities:</i>		
Profit before tax	11 700	
Adjustments for:		
Depreciation	7 500	
Profit on sale of property	(12 300)	
Investment income	(3 300)	
Interest expenses	<u>1 500</u>	
	5 100	
Increase in inventories	(9 000)	
Decrease in receivables	600	
Decrease in payables	(4 200)	
Decrease in warranty provision (12 000 – 4 800)	<u>(7 200)</u>	
Cash used in operations	(14 700)	
Interest paid	(1 500)	
Income tax paid (W2)	<u>(2 400)</u>	
Net cash used in operating activities		(18 600)
<i>Cash flow from investing activities:</i>		
Sales of property	24 300	
Purchase of plant	(24 900)	
Sales of investment	10 200	
Dividend paid	<u>600</u>	
Net cash from investing activities		10 200
<i>Cash flows from financing activities:</i>		
Issue of share capital (W1)	7 200	
Payments under finance losses (W2)	<u>(11 700)</u>	
Net cash from financing activities		<u>(4 500)</u>
Decrease in cash and equivalents		(12 900)
Cash and cash equivalent b/f		<u>4 200</u>
Cash and cash equivalent c/f		(8 700)

#### Workings

1. Equity:	Share capital K	Share premium K	Revaluation surplus K	Retained earnings K
B/d	24 000	6 000	10 800	30 300
Bonus issue	10 800	(6 000)	(4 800)	-
SPLOCI		-	-	8 700
Issued for cash	<u>7 200</u>	<u>-</u>	<u>-</u>	<u>-</u>
c/d	<u>42 000</u>	<u>-</u>	<u>6 000</u>	<u>39 000</u>

2. Liabilities::	FINANCE LEASES K	INCOME TAX K
b/d	27 000 *	6 300 * *
Additions	20 100	
SPLCI		3 000
Paid (B)	<u>(11 700)</u>	<u>(2 400)</u>
	<u>35 400</u>	<u>(6 900)</u>

\* Non-current and current

\*\* Deferred and current

## **SOLUTION FOUR**

- (a) Analysis of financial and operating performance of Doreen compared to sector average.

### Profitability:

Doreen has a ROCE significantly lower at 12.1% than the sector average of 16.8%. This is mainly due to the lower than average gross profit margin and consequent low operating profit margin. The operating expenses are actually lower (17.5%) as a percentage of revenue than the sector average of 23% (35% - 12%) so the problem lies between revenue and cost of sales. Inventory turnover is quite okay (4.5 times compared to a sector average of 3 times), but Doreen's mark up of 33.3% ( $25 \div 75 \times 100$ ) is significantly below the sector average of 54% ( $35 \div 65 \times 100$ ). Doreen is maintaining turnover by keeping prices down.

The net asset turnout is slightly higher than the sector average. This is due to the buoyant turnover, as the ratio will have been depressed by the revaluation of property and the capitalization of the development expenditure, which increased the asset base. It is to be hoped that the development expenditure will generate the expected revenue. If it had been necessary to expense it for the year ended 30 September 2017 Doreen would have reported a loss before tax of K3 200. \*

### Liquidity:

Doreen has a current ratio of 1.55:1 compared to the sector average of 1.25:1. Both appear low, but satisfactory. Inventory can be turnover into immediate cash and this is particularly true for Doreen with its high inventory turnover level. The lower than average payables days (45 compared to 64) and the absence of an overdraft suggest Doreen is not suffering liquidity problems.

### Gearing:

Doreen's debt to equity ratio is 30% well below the sector average of 38% and the interest rate on the loan notes is below the ROCE of 12.1%, meaning that the borrowings are earning a good return for the business. The interest cover of 5.25 times ( $8\ 400/1\ 600$ ) is satisfactory. Doreen is not having any problems in servicing its loan and is unlikely to give lenders problems.

### Conclusion:

There are no going concern worries for Doreen, but it does have issues with low profitability. It appears to be selling high volume of cheap items rather than more valuable pieces on which there would be significantly higher profit margins. This may or may not be the most advantageous strategy in the period of recession.

- (b) The following factors may limit the usefulness of comparison based on business sector averages:
1. The companies included in the average may have used different accounting policies. Some may be applying the revaluation basis on their assets and some may not. This will affect asset turnover and ROCE.

2. Some companies in the average may have used some form of creative accounting. Such as sale and leaseback transaction which will have boosted profit for the year and ROCE.
3. The average may include a wide variety of entities with different trading methods and risk profiles. Very high end jewelries may operate on an invoice rather than cost basis and will have receivables included in their current assets.
4. Different ways of calculating ratios for example ROCE and gearing. It is up to the organisation carrying out the comparison to ensure that a standard definition is used, and they may or may not do this.
5. Unless an inflation adjustment is made, ratios compared over a period of time will not be comparable.

### SOLUTION FIVE

(a)

Update Cash book					
2017		K	2017		K
Dec 31	Balance b/d	150 000	Dec	Bank charges	3 000
	Dividends	24 000		Club subscription	7 000
	ZRA-VAT refund	26 000		Loan repayment	20 000
	Deposit Account	<u>140 000</u>		Balance c/d	<u>310 000</u>
		<u>340 000</u>			<u>340 000</u>

- (b) Bank reconciliation statement as at 31 December 2017

	<b>K</b>
Balance per cash book	310 000
Add: Unpresented cheques (250 000 + 29 000)	<u>54 000</u>
	364 000
Less: Banking's not entered on statement	<u>69 000</u>
Balance per bank statement	<u>295 000</u>

- (c) An asset is recognized in the statement of financial position when it is probable that the future economic benefits will flow to the entity and the cost can be measured reliably.

A liability is recognized in the statement of financial position when it is probable that an outflow of resources embodying economic benefits will result from the settlement of a present obligation and the settlement amount can be measured reliably.

Income is recognized in the income statement when increase in future economic benefits related to an increase in an asset or decrease of a liability has arisen and can be measured reliably.

Expenses are recognized when a decrease in future economic benefit related to a decrease in an asset or an increase of a liability has arisen that can be measured reliably.

### END OF SOLUTIONS



TAXATION PROGRAMME EXAMINATIONS

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CERTIFICATE LEVEL

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C4: DIRECT TAXES

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WEDNESDAY 13 JUNE 2018

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

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**INSTRUCTIONS TO CANDIDATES**

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9. Graph paper (if required) is provided at the end of the answer booklet.
10. A taxation table is provided on pages 2 and 3 of this paper.

## 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 from mineral processing		30%
On income from mining operations		30%

## Capital Allowances

### Implements, plant and machinery and commercial vehicles:

Standard wear and tear allowance	25%
Wear and tear allowance if used in manufacturing and leasing	50%
Wear and tear allowance if 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%
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### Farming Allowances

Development Allowance	10%
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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 Taxes for Transporters

Seating capacity	Tax per annum	Tax per day
Less than 12 passengers and taxis	K 900	K 2.40
From 12 to 17 passengers	1,800	4.95
From 18 to 21 passengers	3,600	9.90
From 22 to 35 passengers	5,400	15.00
From 36 to 49 passengers	7,200	19.50
From 50 to 63 passengers	9,000	24.60
From 64 passengers and over	10,800	29.55

#### Property Transfer Tax

Rate of Tax on Realised Value of Land, Land and Buildings and shares	5%
Rate of tax on the realized value on the transfer of intellectual property	5%
Rate of Tax on Realised Value on a transfer or sale of a mining right	10%



**Attempt all FIVE (5) questions**

**QUESTION ONE**

- (a) Taxes in Zambia are administered by the Zambia Revenue Authority (ZRA) whose Chief Executive Officer is the Commissioner General. ZRA was established by an Act of Parliament taking over the responsibility from the Departments of Taxes Customs and Excise.

**Required:**

- (i) Explain the procedure for appointing an individual to the position of Commissioner General of ZRA. (2 marks)
- (ii) Explain the functions of the operating divisions of Zambia Revenue Authority. (4 marks)
- (iii) Explain other sources of revenue for the central government apart from taxation. (4 marks)
- (b) Nzumamah Ngalande, a sole trader, has been in business for many years preparing accounts to 31 December each year. His annual turnover has always averaged K980,000. For the year to 31 December 2018, he estimated the tax adjusted business profits to be K585,000. Provisional income tax was computed and paid on the appropriate due dates throughout the tax year 2018.

The actual taxable business profits for the year ended 31 December 2018 was calculated as K620,000.

**Required:**

- (i) Explain the types of persons liable to pay provisional income tax. (3 marks)
- (ii) Calculate the provisional income tax paid by Ngalande for the tax year 2018, showing the due dates and the amount paid on each due date. (4 marks)
- (iii) Calculate the final amount of income tax payable after giving relief for tax already paid. (3 marks)

**[Total: 20 Marks]**

## **QUESTION TWO**

Jonasi Kaka started his business on 1 October 2017 and will prepare the first accounts to 31<sup>st</sup> December 2018. He estimates that for the period ended 31 December 2018, the summarised statement of profit or loss will be as follows:

	K	K
Sales		1,230,000
Less: Allowable cost of sales		<u>620,000</u>
Gross Profit		610,000
Less: Expenses		
- Allowable expenses	220,000	
- Disallowable expenses	<u>90,000</u>	
		<u>310,000</u>
Net profit		<u>300,000</u>

Expenditure in non-current assets from 1 October 2017 to 31 December 2018 will be as follows:

Date	Details	Cost/ (Proceeds)
		K
2 October 2017	Purchased Office Equipment	14,600
10 October 2017	Purchased Motor car	62,800
20 December 2017	Sold Motor car (bought 10 October 2017)	(48,000)
4 February 2018	Purchased Computers	12,700
20 July 2018	Purchased General machinery	16,500
30 November 2018	Purchased motor van	92,000

It has been agreed with the Commissioner General that Mr. Kaka has private use in the car of 50%.

### **Required**

- (a) Calculate the capital allowances for the tax years affected. (8 marks)
- (b) Explain the basis rules applicable to Mr. Kaka's first accounting period. (3 marks)
- (c) Calculate the final adjusted taxable profit for the tax years affected. (9 marks)

**[Total: 20 Marks]**

### **QUESTION THREE**

Chipangano limited is a small scale manufacturing company. The company has been in business for many years making up accounts to 31 December each year. The company's statement of profit or loss statement for the year ended 31 December 2018 was as follows:

	K	K
Sales		3,320,000
Less: Cost of sales		<u>1,640,000</u>
Gross trading profit		1,680,000
Add: Rent received (gross)	(Note 6)	90,000
Profit on sale of plant		12,000
Royalties received (Gross)		<u>16,000</u>
		1,798,000
Less: Expenses		
Depreciation	88,000	
Bad debts	(Note 1) 24,000	
Entertainment	(Note 2) 9,600	
Loss on sale of machinery	29,900	
Repairs and renewals	(Note 3) 132,000	
Legal fees	(Note 4) 27,000	
Donations and subscriptions (Note 5)	6,400	
Wages and salaries	574,000	
Property expenses	(Note 6) 18,300	
Advertising	(Note 7) 7,400	
Telephone and Electricity (Note 8)	136,000	
General Expenses	(Note 9) <u>112,000</u>	
		1,164,600
Profit before taxation		633,400
Provision for taxation	(Note 11)	<u>(152,800)</u>
Profit after taxation		<u>480,600</u>

The following notes are available:

#### **Note 1: Bad Debts**

	K
Increase in specific provision	24,000
Decrease in general provision	(16,000)
Former employee's loans written off	9,800
Trade debts written off	13,200
Trade debts previous written off now recovered	<u>(7,000)</u>
	<u>24,000</u>

#### **Note 2: Entertainment**

	K
Entertaining suppliers	3,400
Entertaining customers	2,200
Staff Christmas party	<u>4,000</u>
	<u>9,600</u>

#### **Note 3 :Repairs and renewals**

	K
Repainting show room	2,900
Repairs to company cars	44,100
Extension to stock room	<u>85,000</u>
	<u>132,000</u>

<b>Note 4: Legal fees</b>	K
Recovery of trade debts	11,000
Registering of title deeds for newly acquired land	<u>16,000</u>
	<u>27,000</u>

<b>Note 5: Donations and Subscription</b>	K
Donation to approved public benefit organisation	1,400
Donation to LLP a political party	2,600
Professional subscription for staff	<u>2,400</u>
	<u>6,400</u>

**Note 6: Property Expenses**

These expenses relate to the buildings owned by the company which are all rented out to private companies. The rental income received from these properties is shown in the above statement of profit or loss.

**Note 7: Advertising**

In order to increase sales, advertising was carried out in the local radio stations.

<b>Note 8: Telephone and Electricity</b>	K
Telephone and electricity for manufacturing premises	124,400
Private telephone and electricity for the general manager	<u>11,600</u>
	<u>136,000</u>

<b>Note 9: General Expenses</b>	K
Water expenses for factory	14,600
Water expenses for general manager residence	7,200
Canteen expenses for members of staff	36,000
Postage and stationery	4,800
Ground rates for factory	8,400
Other miscellaneous expenses (all allowable)	<u>41,000</u>
	<u>112,000</u>

**Note 10: Capital Allowances**

Capital allowances on implements, plant and machinery and buildings for the tax year 2018 have been agreed at K69,000.

**Note 11: Provision for taxation**

This represents the amount of provisional income tax paid by the company for the tax year 2018.

**Required:**

- (a) Explain the tax treatment of the following expenses when determining the taxable business profit:
- (i) Repairs and renewals (4 marks)
  - (ii) Entertainment expenses (3 marks)
- (b) Calculate the tax adjusted business profit for the year ended 2018. (9 marks)
- (c) Calculate the company income tax payable for the tax year 2018. (4 marks)

**[Total: 20 Marks]**

**QUESTION FOUR**

- (a) Explain the types of persons who are not liable to turnover tax. (6 marks)
- (b) Send Town retired from formal employment on 31 December 2017, and wishes to start his own business. He intends to enter into the following transactions during the tax year 2018:
1. Buy a 50 hectares piece of land in Rufunsa which was offered to him by his friend, Mr. B. Chola, for K32,000. The government valuations department valued this piece of land at K50,000.
  2. Sell his 10 hectares land situated in Kafue for K24,000. The original cost of the land when bought five years ago was K8,000. The market value of a 10 hectare piece of land in that area is now K30,000.
  3. He has two residential properties in Lusaka (One in Rhodes Park and the other in Kabwata South). He is intending to dispose off the Kabwata South property in April 2018 as it gets water logged. He estimates the open market value at K500, 000 but is prepared to be paid K350,000 by a property buyer.
  4. Offer half of the 40 hectares in Kapiri rural to his son who is now in formal employment and the other half of the land to be offered to his nephew (a businessman). The offer to both his son and nephew is a nominal amount of K12,000 each to cover for this land rates he has incurred over the six years period he has owned the land. The market value of the total land is K60,000. The original cost was K11,000 when bought six years ago.
  5. Sell his five tonne motor van for K70,000. The open market value of the motor van is at K63,000. The selling costs are estimated to be K5,700.
  6. Sell his 2,000 shares held in Ndalama PLC (a public limited company) listed on LuSE for K25.0 per share which is the open market value of the shares. The

nominal value of the shares is K1.0 each. These shares were acquired in 2016 at a cost of K10.0 per share.

**Required:**

- (i) Explain the categories of chargeable property for the purposes of property transfer tax. (5 marks)
- (ii) Calculate the property transfer tax payable on each of the above transactions and the total property transfer tax payable. (8 marks)
- (iii) State the due date for payment of property transfer tax (1 mark)

**[Total: 20 Marks]**

**QUESTION FIVE**

Malo Anga resigned from his position as a Procurement Manager of YOYO Ltd on 30 September 2018. His annual basic salary had been K280, 000. In addition he was entitled to the following annual allowances:

	K
Medical allowance	6,000
Entertainment allowance	15,000
Sitting allowance	1,800
Uniform allowance	4,500
Housing allowance	12,000
School children allowance per child	4,800

Malo has three children, who are still young and school going. The company paid him bonus of K6, 800 for his hard work and leave pay of K13, 800.

On 1 August 2018 the company decided to provide Malo with accommodation in a company owned house and the company paid all the auxiliary services connected to the living accommodation amounting to K3, 270 per month.

In addition to the above, Malo’s other income received in the tax year 2018 was:

	K
Treasury bills interest	5,400
Management consultancy fees	12,325
Royalties	25,500
Bank Deposit interest	2,400
Dividends from Zambian companies listed on the LuSE	3,100

All of these figures represent the actual amounts received. Withholding tax had been deducted at source at the appropriate tax rates.

During the tax year 2018, Malo made the following payment

	K
Income tax paid under Pay As You Earn	70,600
Subscription to the Institute of purchasing and supply NAPSA	8,400
School fees for children	5,300
Donation to a local approved public benefit organisation	11,000
Contribution towards the purchase cost of the uniform	9,350
	1,000

**Required:**

- (a) Explain the tax treatment of subscriptions paid by an employee (2 marks)
- (b) Calculate the total amount of Income Tax payable by Malo for the tax year 2018 (18 marks)

**END OF PAPER**

## **C4: DIRECT TAXES SOLUTIONS**

### **SOLUTION ONE**

#### (a) Tax administration

- (i) The procedure followed when appointing a person to the position of the position of Commissioner General, is as follows:
- The Republican President makes consultations in respect of persons who are professionally qualified and knowledgeable in the administration of Taxation.
  - Based on the results from that consultation, the Republican President then appoints a suitable individual to the position of Commissioner General of the Zambia Revenue Authority.

- (ii) The operating divisions of ZRA and their functions:

##### The Domestic Taxes Division

This division is responsible for the administration of Income Tax, Property transfer tax and Mineral Royalty Tax and domestic Value Added Tax. In as far as VAT is concerned, the division grants registration for VAT purposes to eligible traders so that they are able to charge VAT on their taxable supplies and pay that VAT to ZRA. The Division is headed by the Commissioner – Domestic taxes.

##### The Customs Services Division

This is the division that has been set up to deal with Customs duties and import VAT. It is headed by the Commissioner Customs Services. And it is also responsible for promoting international trade.

- (iii) The other sources of revenue for the central government are as follows:

- Privatization of state owned enterprise to private sector
- Borrowing from international and local financial Institutions such as International Monetary Fund (IMF) and other financial institutions
- Issuing government securities such as treasury bills and government bonds
- Donor funding where specific projects are funded by donors e.g. construction of health facilities.

#### (2) Nzumamah Ngalande

- (i) The following persons are liable to pay provisional income tax:
- Any person whose business annual turnover is more than K800,000
  - Any person whose income does not constitute only of income subjected to pay as you earn



- Any person whose taxable income is more than the tax free amount of K39,600

(ii) Ngalande

Provisional income tax paid for the tax year 2018

	K
Estimated taxable profit	<u>585,000</u>

Computation

First K39,600 @ 0%	0
Next K9,600 @ 25%	2,400
Next K25,200 @30%	7,560
Balance K510, 600 @37.5%	<u>191,475</u>
Total provisional tax paid for year	<u>201,435</u>

Provisional tax per quarter: K201,435 /4 = K50,359  
Due Date Amount

	K	
31 March 2018	50,359	
30 June 2018	50,359	
30 September 2018	50,359	
31 December 2018	50,358	

(iii) Ngalande

Computation of final income tax payable for tax year 2018

	K
Taxable business profits	<u>620,000</u>
Computation	
First K39,600 @ 0%	0
Next K9,600 @ 25%	2,400
Next K25,200 @30%	7,560
Balance K545,600 @ 37.5%	<u>204,600</u>
Total tax liability	214,560
Less provisional tax paid	<u>(201,435)</u>
Income tax payable	<u>13,125</u>

## SOLUTION TWO

(a) Capital allowances for the tax years 2017 and 2018

	Cost/ITV	Capital allowances
<b>2017</b>	K	K
<u>Office Equipment</u>		
Cost	14,600	
W&T @25%	<u>(3,650)</u>	3,650
ITV c/f	<u>10,950</u>	
<u>Motor car</u>		
Cost	62,800	
Disposal proceeds	<u>(48,000)</u>	
Balancing allowance	<u>14,800</u> @50%	<u>7,400</u>
Total capital allowances		<u>11,050</u>

**2018**Office Equipment

ITV b/f	10,950	
W&T @ 25%	<u>(3,650)</u>	3,650
ITV c/f	<u>7,300</u>	

Computers

Cost	12,700	
W&T @25%	<u>(3,175)</u>	3,175
ITV c/f	<u>9,525</u>	

General machinery

Cost	16,500	
W&T @ 25%	<u>(4,125)</u>	4,125
ITV c/f	<u>12,375</u>	

Motor van

Cost	92,000	
W&T @ 25%	<u>(23,000)</u>	23,000
ITV c/f	<u>69,000</u>	
Total capital allowances		<u>33,950</u>

- (b) The first accounting period is longer than 12 months, therefore, this period will be split into two notional accounting periods with the first period consisting of less than 12 months and the last accounting period consisting of exactly 12 months.

The first period will consist of three months (from 1 October 2017 to 31 December 2017) and the second period will consist of 12 months (from 1 January 2018 to 31 December 2018).

The basis of assessment for both periods is the current year basis which is the tax year 2017 and 2018 respectively.

- (c) Adjusted business profit for the tax years 2017 and 2018

	K	
Net profit for period	300,000	
Add: Disallowable expenses	<u>90,000</u>	
Profit (Pre C.A)	<u>390,000</u>	
Tax year 2017 – 3/15 X K390,000	<u>78,000</u>	
Tax year 2018 – 12/15 X K390,000	<u>312,000</u>	
	2017	2018
	K	K
Profit (Pre C.A)	78,000	312,000
Less: C.A	<u>(11,050)</u>	<u>(33,950)</u>
Final adjusted profit	<u>66,950</u>	<u>278,050</u>

### SOLUTION THREE

(a) The tax treatment of the expenses is as follows:

(i) Repairs and renewals

If repairs expenditure is incurred on assets recently acquired to remedy normal wear and tear in order to maintain the earning capacity of the asset, the expenditure is treated as revenue and, therefore, allowed for tax purposes.

If the repairs and renewals expenditure is incurred on the newly acquired assets which require substantial expenditure to be incurred to put them in a usable state, the expenditure is treated as capital and, therefore, disallowed for tax purposes.

(ii) Entertainment expenses

Entertainment expenses incurred in entertaining third parties like suppliers and customers are disallowed for tax purposes.

Entertainment expenditure incurred in entertaining employees is an allowable expense for tax purposes.

(b) Chipangano Ltd adjusted taxable business profit for the tax year 2018

	K	K
Net profit before tax		633,400
Add:		
Depreciation	88,000	
Loan to former employee written off	9,800	
Entertaining suppliers	3,400	
Entertaining customers	2,200	
Loss on sale of machinery	29,900	
Extension to stock room	85,000	
Title deeds for newly acquired land	16,000	
Donation to political party	2,600	
Property expenses	18,300	
Canteen expenses	<u>36,000</u>	
		<u>291,200</u>
		924,600
Less:		
Rent received	90,000	
Profit on sale of plant	12,000	
Royalties	16,000	
Decrease in general provision	16,000	
Capital allowances	<u>69,000</u>	
		<u>(203,000)</u>
Adjusted business profit		<u>721,600</u>

**(c) Chipangano Ltd**

Income tax payable for the tax year 2018

	K
Business profits	721,600
Add:	
Royalties	<u>16,000</u>
Total taxable income	<u>737,600</u>
Income tax @ 35% (737,600 x 35%)	258,160
Less:	
Provisional income tax paid	(152,800)
WHTon Royalties: K16,000 x 15%	<u>(2,400)</u>
Income tax payable	<u>102,960</u>

**SOLUTION FOUR**

(a) Persons who are not liable to turnover tax are:

- (i) Any person carrying on business where the annual turnover is over K800,000.
- (ii) Any individual or partnership carrying on the business of public service vehicle for the carriage of persons
- (iii) Any partnership carrying on business irrespective of whether the annual turnover is over K800,000 or not
- (iv) Income of partners arising from the partnership since the partnership producing that profit is excluded from turnover tax.
- (v) Any person whose business earnings are subjected to withholding tax were the withholding tax is the final tax.
- (vi) Any business registered for voluntarily registered for value added tax.
- (vii) Any person who is involved in mining operations as provided under the mines and minerals Development Act.

(b) Property transfer tax for Send Town

- (i) Categories of chargeable property includes:
  - i. Any land in Zambia (including any building on that land)
  - ii. Any building, structure, or other improvements thereon
  - iii. Any share issued by a company in Zambia that is not listed on the Lusaka Stock Exchange (LuSE);
  - iv. Any mining right or an interest in a mining right in Zambia
  - v. Any Intellectual property in Zambia
- (ii) The property transfer tax arising on the transactions listed are as follows:
  1. No property transfer tax arising on the purchase of property as it only arises on the transfer of property.
  2. Property transfer tax will arise on the market value of the property when sold is as follows:  
Property transfer tax: K30,000 X 5% = K1,500

3. The sell of the residential property in Kabwata South will result in property transfer tax based on the market value as follows:  
Property transfer tax:  $K500,000 \times 5\% = K25,000$
4. No PTT will arise on transfer to the immediate family and immediate family include only spouse, blood children, step children or adopted children. The nephew is not part of the immediate family. However, where the immediate family pays a consideration to the transfer, PTT arising will be based on the consideration paid. The PTT arising will therefore be as follows:-
 

Disposal to son – $K12,000 \times 5\%$	600
Disposal to nephew ( $K60,000 \times \frac{1}{2}$ ) $\times 5\%$	<u>1,500</u>
	<u>2,100</u>
5. The transfer of the motor vehicles is outside the scope of property transfer tax as motor vehicles are not property.
6. Transfer of shares listed on the Lusaka Stock Exchange is exempt from property transfer tax, therefore, no PTT arises on disposal of shares of a public limited company (Plc)

Summary – PTT arising

	K
1. Disposal of Kafue land	1,500
2. Disposal of residential property	25,000
3. Disposal hectare land	<u>2,100</u>
	<u>28,600</u>

- (iii) The due dates for payment of the PTT which will arise is on or before the 14<sup>th</sup> of the subsequent month of the disposal date.

**SOLUTION FIVE**

- a) Subscriptions paid to any trade, profession or technical association that is related to the business being carried on are allowed. Those that are paid to such associations which are not related to the trade are not allowed.

b)

Income tax computation for the tax year 2018

	K	K
Earned Income		
Salary ( $K280,000 \times 9/12$ )		210,000
Medical allowance ( $K6,000 \times 9/12$ )		4,500
Entertainment allowance ( $K15,000 \times 9/12$ )		11,250
Sitting allowance ( $K1,800 \times 9/12$ )		1,350

Uniform allowance (K4, 500 x 9/12 - K1000)		2,375
Housing allowance (K12, 000 x 7/12)		7,000
Auxiliary services (K3, 270 x 2 mths)		6,540
Education allowance (K4,800x9/12 x3)		10,800
Bonus		6,800
Leave pay		<u>13,800</u>
Total earned income		274,415
Add investment income		
Gross Mgt. consultancy (K12, 325 x 100/85)	14,500	
Gross royalties (K25, 500 x 100/85)	<u>30,000</u>	
		<u>44,500</u>
Total gross income		318,915
Less allowable deductions		
Subscriptions	8,400	
Donations	<u>9,350</u>	
		<u>17,750</u>
Assessable income		<u>301,165</u>
Tax liability		
First K74, 400	9,960	
Balance K226,765 x37.5%	<u>85,037</u>	
Total tax liability		94,997
Less		
PAYE		70,600
WHT on Management consultancy		
	(14,500x15%)	2,175
WHT on Royalties (30,000x15%)		<u>4,500</u>
		<u>77,275</u>
Income Tax Payable		<u>17,722</u>

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**END OF SOLUTIONS**



TAXATION PROGRAMME EXAMINATIONS

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CERTIFICATE LEVEL

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C5: INDIRECT TAXES

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THURSDAY 14 JUNE 2018

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

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**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 question paper consists of FIVE (5) questions of twenty (20) marks each. You MUST attempt all the FIVE (5) 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. A taxation table is provided on page 2 only.

**Taxation Table for paper C5 Indirect Taxation  
(June and December 2018 Examinations)**

**Value Added Tax**

**Registration threshold** **K800,000**

**Standard Value Added Tax Rate (on VAT exclusive turnover)** **16%**

**Customs and Excise**

**Customs and Excise duties on used motor vehicles**



	<b>Aged 2 to 5 years</b>		<b>Aged over 5 years</b>	
	<b>Customs duty</b>	<b>Excise duty</b>	<b>Customs duty</b>	<b>Excise duty</b>
	<b>K</b>	<b>K</b>	<b>K</b>	<b>K</b>
<b>Motor vehicles for the transport of ten or more persons, including the driver</b>				
<b>Sitting capacity of 10 but not exceeding 14 persons including the driver</b>	<b>17,778</b>	<b>22,223</b>	<b>8,889</b>	<b>11,112</b>
<b>Sitting capacity exceeding 14 but not exceeding 32 persons</b>	<b>38,924</b>	<b>0</b>	<b>13,840</b>	<b>0</b>
<b>Sitting capacity of 33 but not exceeding 44 persons</b>	<b>86,497</b>	<b>0</b>	<b>19,462</b>	<b>0</b>
<b>Sitting capacity exceeding 44 persons</b>	<b>108,121</b>	<b>0</b>	<b>43,248</b>	<b>0</b>
	<b>Aged 2 to 5 years</b>		<b>Aged over 5 years</b>	
	<b>Customs duty</b>	<b>Excise duty</b>	<b>Customs duty</b>	<b>Excise duty</b>
	<b>K</b>	<b>K</b>	<b>K</b>	<b>K</b>
<b>Motor cars and other motor vehicles principally designed for the transport of persons including station wagons and racing cars</b>				
<b>Sedans</b>				
<b>cylinder capacity not exceeding 1000 cc</b>	<b>12,490</b>	<b>10,824</b>	<b>7,136</b>	<b>6,185</b>
<b>Cylinder capacity exceeding 1000 cc but not exceeding 1500 cc</b>	<b>16,058</b>	<b>13,917</b>	<b>8,564</b>	<b>7,422</b>
<b>Cylinder capacity exceeding 1500 cc but not exceeding 2500 cc</b>	<b>16,545</b>	<b>21,508</b>	<b>8,423</b>	<b>10,950</b>
<b>Cylinder capacity exceeding 2500 cc but not exceeding 3000 cc</b>	<b>18,049</b>	<b>23,463</b>	<b>10,528</b>	<b>13,687</b>
<b>Cylinder capacity exceeding 3000 cc</b>	<b>22,561</b>	<b>29,329</b>	<b>12,032</b>	<b>15,642</b>
<b>Hatchbacks</b>				
<b>cylinder capacity not exceeding 1000 cc</b>	<b>10,705</b>	<b>9,278</b>	<b>7,136</b>	<b>6,185</b>
<b>Cylinder capacity exceeding 1000 cc but not exceeding 1500 cc</b>	<b>14,274</b>	<b>12,371</b>	<b>8,564</b>	<b>7,422</b>
<b>Cylinder capacity exceeding 1500 cc but not exceeding 2500 cc</b>	<b>15,041</b>	<b>19,553</b>	<b>8,423</b>	<b>10,950</b>
<b>Cylinder capacity exceeding 2500 cc but not exceeding 3000 cc</b>	<b>16,545</b>	<b>21,508</b>	<b>10,523</b>	<b>13,687</b>

<b>Cylinder capacity exceeding 2500 cc but not exceeding 3000 cc</b>	<b>16,545</b>	<b>21,508</b>	<b>10,523</b>	<b>13,687</b>
<b>Cylinder capacity exceeding 3000 cc</b>	<b>19,553</b>	<b>25,419</b>	<b>12,032</b>	<b>15,642</b>
<b>Station wagons</b>				
<b>cylinder capacity not exceeding 2500 cc</b>	<b>16,545</b>	<b>21,508</b>	<b>9,024</b>	<b>11,731</b>
<b>Cylinder capacity exceeding 2500 cc but not exceeding 3000 cc</b>	<b>18,049</b>	<b>23,463</b>	<b>13,357</b>	<b>17,598</b>
<b>Cylinder capacity exceeding 3000 cc but not exceeding 2500 cc</b>	<b>22,561</b>	<b>29,329</b>	<b>18,049</b>	<b>23,463</b>
<b>SUVs</b>				
<b>Cylinder capacity not exceeding 2500 cc</b>	<b>21,057</b>	<b>27,374</b>	<b>9,024</b>	<b>11,732</b>
<b>Cylinder capacity exceeding 2500 cc but not exceeding 3000 cc</b>	<b>24,065</b>	<b>31,284</b>	<b>13,357</b>	<b>17,598</b>
<b>Cylinder capacity exceeding 3000 cc</b>	<b>28,577</b>	<b>37,150</b>	<b>18,049</b>	<b>23,463</b>
		<b>Aged 2 to 5 years</b>	<b>Aged over 5 years</b>	
<b>Motor vehicles for the transport of goods –with compression-ignitioninternal combustion piston engine (diesel or semi-diesel):</b>	<b>Customs duty</b>	<b>Excise duty</b>	<b>Customs duty</b>	<b>Excise duty</b>
	<b>K</b>	<b>K</b>	<b>K</b>	<b>K</b>
<b>Single cab</b>				
<b>GVW exceeding 1.0 tonne but not exceeding 1.5 tonnes</b>	<b>21,926</b>	<b>9,501</b>	<b>8,770</b>	<b>3,801</b>
<b>GVW exceeding 1.5 tonnesbut not exceeding 3.0 tonnes</b>	<b>26,311</b>	<b>11,402</b>	<b>15,348</b>	<b>6,651</b>
<b>GVW exceeding 3.0 tonnesbut not exceeding 5.0 tonnes</b>	<b>30,697</b>	<b>13,302</b>	<b>17,541</b>	<b>7,601</b>
<b>Double cabs GVW exceeding 3 tonnes but not exceeding 5 tonnes</b>	<b>30,274</b>	<b>0</b>	<b>24,119</b>	<b>10,452</b>
<b>Double cabs GVW exceeding 3.0 tonnes but not exceeding 5.0 tonnes, with spark ignition internal combustion piston engine</b>	<b>30,697</b>	<b>13,302</b>	<b>24,119</b>	<b>10,452</b>

## Panel Vans

<b>GVW exceeding 1.0 tonne but not exceeding 1.5 tonnes</b>	<b>15,348</b>	<b>6,651</b>	<b>8,770</b>	<b>3,801</b>
<b>GVW exceeding 1.5 tonnesbut not exceeding 3.0 tonnes</b>	<b>17,541</b>	<b>7,601</b>	<b>15,348</b>	<b>6,651</b>
<b>GVW exceeding 3.0 tonnesbut not exceeding 5.0 tonnes</b>	<b>21,926</b>	<b>9,501</b>	<b>17,541</b>	<b>7,601</b>

## Trucks

<b>GVW up to 2 tonnes</b>	<b>21,926</b>	<b>9,501</b>	<b>10,963</b>	<b>4,751</b>
<b>GVW exceeding 2.0 tonnes but not exceeding 5.0 tonnes</b>	<b>28,504</b>	<b>12,352</b>	<b>13,156</b>	<b>5,701</b>
<b>GVW exceeding 5.0 tonnesbut not exceeding 10.0 tonnes</b>	<b>24,724</b>	<b>18,955</b>	<b>10,817</b>	<b>8,293</b>
<b>GVW exceeding 10.0 tonnesbut not exceeding 20.0 tonnes</b>	<b>30,905</b>	<b>23,694</b>	<b>11,744</b>	<b>9,004</b>
<b>GVW exceeding 20 tonnes</b>	<b>51,898</b>	<b>0</b>	<b>19,461</b>	<b>0</b>
<b>GVW exceeding 20 tonnes, with spark ignition internal combustion piston engine</b>	<b>37,086</b>	<b>28,432</b>	<b>13,907</b>	<b>10,662</b>

## Value Added Tax

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

## Customs and Excise

### Duty rates on:

- 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. 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**
- On all motor vehicles aged more than five (5) years from year of manufacture K2,000**

**Attempt all FIVE (5) questions**

**QUESTION ONE**

- (a) Mwale Zulu is a logistics and transport graduate from Zambia Logistics and Transport College (ZLTC). Instead of seeking for employment, he decided to venture into a transport business in 2018.
- He imported a 65 Seater coach costing US\$9,800.
- Insurance charges were US \$1,200
- Freight charges were US\$2,300.
- Other incidental expenses amounted to US\$700.
- Mr. Zulu spent K5,800 to transport the coach from the border to his car park.
- All import taxes were paid when the coach arrived at Nakonde Border on 8 February 2018.
- The exchange rate agreed with the Commissioner General was K9.25. However the Bank of Zambia exchange rate at that time was K9.50

**Required:**

- (i) Explain four (4) conditions that should be satisfied for the transaction value method to be applied. (4 marks)
  - (ii) Calculate the customs value (Value for Duty Purposes) of the coach. (4 marks)
  - (iii) Compute the import taxes paid at the Border Post on the coach. (4 marks)
  - (iv) Explain the documents that should be presented at Nakonde Border. (2 marks)
- (b) (i) Explain how the value for duty purposes for export is calculated. (2 marks)
- (ii) Explain any four (4) powers of ZRA officials in relation to importation and exporting of goods. (4 marks)

**[Total: 20 Marks]**

**QUESTION TWO**

- (a) There are a number of instruments used as barriers to free trade but the most important ones are tariffs and quotas.

**Required:**

- (i) Explain the difference between quotas and tariffs (2 marks)
  - (ii) Why are tariffs preferred to quotas (3 marks)
- (b) The Customs Services division of ZRA has a number of functions with regards to importation of goods.

**Required:**

- (i) Explain any four (4) functions of the customs division (4 marks)
  - (ii) State any four (4) goods that are prohibited from importation (2 marks)
  - (iii) Explain any four (4) methods that is used to value imported goods (4 marks)
- (c) Zambia is currently promoting the manufacture of goods locally through Multi-Facility Economic Zones (MFEZ). Goods manufactured from these zones are subjected to excise duty.

**Required:**

Explain any **five (5)** methods used to determine the value for excise duty on goods manufactured in Zambia. (5 marks)

**[Total: 20 Marks]**

### **QUESTION THREE**

- (a) In relation to customs and excise Duties, explain how the Value for Duty Purposes is calculated on the following:
- (i) Imports.
  - (ii) Locally manufactured goods and services.
  - (iii) Export (5 marks)
- (b) Mr. Pepala imported a new Nissan Two tonne light truck from Japan in March 2018 costing \$3,000. The insurance charge was 2% of the F. O. B charge and freight was \$1,500. The freight charge from Nakonde to Mr. Pepala`s premises was K2, 800. The Commissioner General exchange rate at the time of clearance was K9.8 per 1 US\$. However the Bank of Zambia exchange rate was K9.98

#### **Required:**

Calculate the customs and excise duty and the VAT payable on importation of the light truck. (5 marks)

- (c) Customs Services Division uses many official and reference documents in its operations.

#### **Required:**

- (i) Explain why the use of official documents is important when dealing with the Customs Services Division. (2 marks)
- (ii) State what is meant by excise duty. (2 marks)
- (iii) List any four (4) reference documents used in the Customs Services Division. (4 marks)
- (iv) Explain why it is easy to value new imported goods rather than second hand imported goods. (2 marks)

**[Total: 20 Marks]**

### **QUESTION FOUR**

- (a) When clearing a motor vehicle at the ZRA clearing point, there are various procedures which must be followed. Some of the procedures are carried out at the clearing point, whilst other procedures and details are sent to the Lusaka ZRA customs divisions who send back the details to the clearing point.

**Required:**

- (i) Describe the various documents which are necessary for the clearance of a motor vehicle. (6 marks)
  - (ii) Explain why part clearance procedures are now carried out in Lusaka. (2 marks)
- (b) The two VAT accounting schemes are; the normal VAT accounting scheme and the extended accounting scheme.

**Required:**

Explain the above stated two VAT Accounting Schemes. (4 marks)

- (c) In order to claim a VAT bad debt, a business must show proof of the bad debt.

**Required:**

- (i) Explain how a bad debt may arise for VAT and the conditions that must apply. (2 marks)
- (ii) Explain the circumstances under which a bad debt relief can be claimed. (6 marks)

**[Total: 20 Marks]**

**QUESTION FIVE**

Joe Zaza enterprises started trading and opened an outlet on the 1 March 2018 along Lumumba road, in Lusaka. It was trading in assorted goods and building materials and most of them were taxable supplies. The expected Turnover was well above K850,000.

**Required:**

- (a) State the effective date of registration for VAT purposes for Joe Zaza. (1 mark)
- (b) State the obligations that Joe Zaza should observe after having duly registered as a VAT registered supplier. (6 marks)
- (c) There are a number of advantages and disadvantages for VAT registration. Explain
  - (i) The advantages of VAT registration. (3 marks)
  - (ii) The disadvantages of VAT registration. (3 marks)
- (d)
  - (i) Explain the circumstances that may lead Joe Zaza to cancel the VAT registration. (4 marks)
  - (ii) State when the cancellation may take effect. (2 marks)
  - (iii) State the procedure that is followed in cancellation of the registration. (1 marks)

**[Total: 20 Marks]**

**END OF PAPER**

## C5: INDIRECT TAXES SOLUTIONS

### SOLUTION ONE

a)

i) The four (4) conditions that should be satisfied for the transaction value method to be applied are:-

- There should be no restrictions to the use of the goods
- There should be no conditions to deter determination of the VDP
- No part of the proceeds on resale would accrue to the seller, unless included in the value
- No relationship exists to influence the value

ii) Value for duty purpose

	\$
Cost	9,800
Insurance charges	1,200
Freight charges	2 300
Incidental expenses	<u>700</u>
CIF value	<u>14,000</u>

Value for duty purposes = \$14 000 x K9.25 = K129,500

iii) Import taxes paid

	Value K	Tax paid K
Value for duty purposes	129 500	
Customs value @ 15%	<u>19 425</u>	19 425
Excise Duty	148 925	
148 925@ 0%	0	(1mark)
Value added tax @ 16%	<u>23 828</u>	<u>23 828</u>
	<u>172 753</u>	<u>43 253</u>

iv) The following documents should be presented at Nakonde boarder:-

- Invoice or letter of sale indicating the price paid
- Bill of landing (consignment rail note)
- Freight statement
- Insurance certificate



- b)
- i) The value for duty purpose for export is based on free on board (F.O.B) at the place of dispatch or customs port of shipment.  
This excludes insurance and freight charges incurred on exporting
- ii) The four (4) powers of ZRA customs officials are:-
- Power to enter and search tax payer's premises, for money and documents
  - Power to assess, charge and collect tax dues and make recoveries
  - Power to request and examine financial statements of the tax payer for the purpose of obtaining information.
  - Power of charge interest on overdue tax payments
  - Power to charge penalties
  - Power to seize property

## **SOLUTION TWO**

- a)
- i) The difference between quotas and tariffs is that quotas are quantitative restrictions on the quantity or value of a commodity to be imported in a country during a period while tariffs are taxes that are levied on imported goods
- ii) Tariffs are preferred to quotas because:-
- They are taxes that raise tax revenue to the government
  - Administrative corruption is minimized
  - Quotas are more likely to encourage smuggling of goods into the country
- b)
- i) Four functions of the customs divisions are:-
- Collection and management of customs duties.
  - Regulation and control of imports and exports.
  - Facilitation of trade, travel and movement of goods.
  - Providing statistical data to the government on imports and exports
- ii) Goods that are prohibited from importation are:-
- Bases or counterfeit coins.
  - Goods that are indecent, obscene or objectionable.
  - Goods that corrupt the morals of people.
  - Goods that are prohibited by or under the authority of any law

iii) Methods used to value important goods are:-

- **Transaction value**

This is based on the price actually paid or payable including insurance, freight and other incidental costs to the extent that they are paid

- **Deductive value**

This is the price at which identical or similar goods are sold in their quantity in Zambia

- **Computed value**

This is the price based on cost of production, insurance, freight and other costs incurred in the delivery of goods to Zambia.

- **Residual basis of value/fall back method**

This is the price arrived at by using all other methods flexibly.

- **Transaction value of identical goods**

This is the price of identical goods imported by another importer into Zambia from the same source, including insurance, freight and other incidental costs

- **Transaction value of similar goods**

This is the price of similar goods imported by another importer into Zambia from the same source, including insurance freight and other incidental costs

c) The methods are:-

- The price at which a licensed manufacturer of excitable goods offers the goods for sale on the open market
- The lowest price at which identical goods in the same quantity are sold in Zambia.
- The lowest price at which identical goods in different quantities are sold within Zambia by another licensed manufacturer in the open market
- The lowest price at which similar goods in the same quantity or almost the same quantities are sold within Zambia by another licensed manufacturer in the open market
- The lowest price at which similar goods in different quantities are sold within Zambia by another licensed manufacturer in the open market
- The price at which the goods would fetch less profit and other costs beyond the manufacturing level

### SOLUTION THREE

a)

- (i) The value for duty purposes on imports is based on the cost, insurance and freight (C.I.F) charges. The duty rate is charged or determined on the transaction value of the item.
- (ii) For locally manufactured goods and services, the value for duty purposes is also determined on the transaction value based on cost, insurance and freight (if any) – (C.I.F).
- (iii) The value for duty purposes for exports is based on the free on board (F.O.B) value i.e. the duty excludes insurance and freight on computation.

b) Mr Pepala – Light Truck taxes and cost.

	<b>US\$</b>		
Cost	3, 000		
Insurance (2% X 3,000)	60		
Freight	<u>1, 500</u>		
	<u>4,560</u>		
		Taxes	
		K	K
VDP	<u>4,560</u> X	K 9.8	44,688
Custom duty 15% X K44, 688		<u>6, 703</u>	6,703
Value for excise duty purposes		51,391	
Excise duty 10% X K51,391		<u>5,139</u>	5,139
Value for VAT purposes		56,530	
VAT 16%		<u>9, 045</u>	<u>9, 045</u>
Total cost/taxes		<u>65,575</u>	<u>20,887</u>

c) (i) All persons dealing with the Customs Services Division must do so on official documents. This is important because it provides audit trail, establishes accountability and follow laid down procedures.

(ii) Excise duty is a levy/tax charged on goods of a luxurious nature such as alcoholic beverages, soft drinks, motor vehicles, perfumes etc.

(iii) Reference documents include:-

- The Customs and Tariff Book
- The Harmonised System Explanatory Notes
- The Compendium of Classification Opinions
- The Compendium of Policies and Procedure
- Ports of Entry and Routes Order

(iv) Second hand imported goods cause problems for valuation purposes as in most cases, the value used are subjective and are prone to manipulation by the importer in order to reduce the imported value for duty purposes. Brand new goods however, are easy to ascertain for value purposes as the internet can be used to ascertain the manufacturers invoice value.

#### **SOLUTION FOUR**

(a) (i) When clearing an imported motor vehicle, ZRA customs division will require proper documents as follows:-

- Purchase invoice
- Road rail consignment
- Bill of lading / manifest
- Insurance certificate
- Freight statement
- Contract of sale

(ii) Part of the motor vehicle clearance procedures now have to be done by the Lusaka customs division though the motor vehicle is at the clearance point (or border). This is done in order to remove the clearance subjectivity at clearance points and the biasness and corruption prevalent at the clearance points.

(b) When VAT is accounted for some special schemes are available namely, the normal accounting scheme and an extended accounting scheme.

A normal accounting scheme for VAT is where both credit and cash transactions occurring in a month have to be accounted for.

The due date is on the 16<sup>th</sup> of the subsequent month.

An extended accounting scheme (extended tax period) is where VAT is accounted for at an extended tax period of 3 months instead of the normal one month period. This is normally granted where the trader's business is not continuous on a daily basis.

- (c) (i) A bad debt for VAT arises where the business pays for VAT on a credit sale of goods or service but the business does not receive the amount due (both the principal and the VAT element)

**For the VAT bad debt relief to be effective, the following conditions must apply;**

- The creditor proves the amount in insolvency or bankruptcy.
- The property or title has passed to the person or business to whom they were supplied.
- The value of the supply does not exceed its open market value.
- The bad debt has been outstanding for at least 18 months.

(ii) ZRA may agree to the bad debt relief if the following documents are lodged;

- A copy of the tax invoice issued for the debtor that has become a bad debt.
- Evidence that the VAT bad debt claim was actually remitted to ZRA.
- Copies of correspondence between the supplier and the administrator, receiver or liquidator of the insolvent customer.

## **SOLUTION FIVE**

JOE ZAZA

(a) The effective date for VAT registration is 1<sup>st</sup> March 2018

(b) Obligations

- Notify Zambia Revenue Authority when the business starts or change in circumstances
- Display the VAT registration certificate
- Charge VAT on taxable supplies
- Complete and submit returns by the due date which is specified by ZRA
- Maintain sufficient records for at least 6 years
- Cooperate with ZRA officers
- Provide information to ZRA officers

(c) (i) **Advantages of VAT registration**

- The trader will be able to reclaim input VAT on expenses as long as that input VAT is recoverable

- The impression of a substantial business will be given since traders should only register if the turnover is substantially high
  - Business will compete well with other businesses which are registered for VAT in that their costs will not be distorted by being VAT inclusive
- (ii) **Disadvantages of VAT registration**
- VAT registration results in increased administrative costs
  - Non –registered customers who get supplies from the trader will have an increased cost
  - Penalties will be charged if the trader fails to pay VAT or to submit the VAT return
- (d) (i) **Circumstances leading to the cancellation of VAT registration**
- Where there is change in the legal status of the entity
  - If the business ceases to trade permanently
  - If the business is sold
  - If the business as a VAT registered trader ceases to make taxable supplies
- (ii) **When the cancellation may take effect**
- When the value of taxable supplies falls consistently below the VAT registration threshold
  - If upon being granted registration, fails to commence a business on a certain date
- (iii) **Procedure to follow for cancellation**  
The de-registration must be in writing, addressed to the commissioner General through the nearest ZRA offices

**END OF SOLUTIONS**



TAXATION PROGRAMME EXAMINATIONS

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CERTIFICATE LEVEL

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C6: LAW FOR TAX PRACTITIONERS

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FRIDAY 15 JUNE 2018

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

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**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.
2. This question paper consists of FIVE (5) questions of twenty (20) marks each. You MUST attempt all the FIVE (5) 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.

**Attempt all FIVE (5) Questions**

**QUESTION ONE**

Blair was selling a book at K450, which he wished to sell to his friend Mark. Mark was in dire need of that book and promised to call Blair on 5 May, 2017. Mark, being a student pursuing an accountancy course decided to work on a part time basis at Southern Sun Hotel to raise the said amount of money.

He was to be paid by the end of March, but unfortunately, the signatory to the account had travelled out and therefore, he could not get the payment. On 4 May, he decided to approach Blair with K400, stating that this was the only money he had at that time.

**Required:**

- (a) State giving reasons whether an agreement was made or not. (5 marks)
- (b) Define a counter-offer and explain the effect of a counter-offer. (5 marks)
- (c) Explain the following rules of consideration:
  - (i) Consideration must move from the promisee (3 marks)
  - (ii) Consideration must not be past (3 marks)
  - (iii) Consideration must be sufficient, it need not be adequate (4 marks)

**[Total: 20 Marks]**

**QUESTION TWO**

- (a) Chuluka Ben bought three tables from Shopleft Ltd. A sales representative from Shopleft persuaded him to do so. Two days later, he discovered that one of the table's legs had a fault and he took it back to Shopleft Ltd who refused to accept it, saying they already sold it to him and had nothing to do with Chuluka Ben any more. He has now come to you for help.

**Required:**

- (i) State two (2) remedies available to Chuluka Ben in the above case. (2 marks)
- (ii) Explain the remedies you have stated above. (2 marks)

(iii) Chuluka Ben now wants to buy a spring mattress on hire purchase from Shopleft Ltd.

Explain to him two (2) features of a hire purchase agreement. (4 marks)

- (b) Define the following:
  - (i) Finance lease (3 marks)
  - (ii) Negotiable instruments (3 marks)
  - (iii) Holder in due course (3 marks)
  - (iv) Transfer of property in goods (3 marks)

**[Total: 20 Marks]**



### **QUESTION THREE**

The Judiciary of Zambia is the branch of the Government of the Republic of Zambia. Under the Constitution of Zambia, Justices and Magistrates are independent of the government and subject only to the Constitution and the law.

According to the constitution the structure of the judicature shall comprise the Supreme Court of Zambia, the High Court of Zambia, the Industrial Relations Court, the Subordinate Court, the Local Court and such lower Courts as may be prescribed by an Act of Parliament.

#### **Required:**

- (a) Discuss in detail, the functions of the judiciary (5 marks)
- (b) Explain in detail the role and emergency of equity. (5 marks)
- (c) Discuss in detail, the Golden rule of statutory interpretation (5 marks)
- (d) Explain the jurisdiction of the Land Tribunal as provided under the Lands Act, Cap 184 of the laws of Zambia. (3 marks)
- (e) Define an insurable interest in insurance law (2 marks)

**[Total: 20 Marks]**

### **QUESTION FOUR**

- (a) State the ways in which an agency relationship can be created (5 marks)
- (b) Discuss the three (3) main elements of negligence. (9 marks)
- (c) Define a contract of sale. (3 marks)
- (d) List any three (3) remedies available to the buyer under the sale of goods. (3 marks)

**[Total: 20 Marks]**

### **QUESTION FIVE**

- (a) Explain the duties of carriers under the contract of Sale. (8 marks)
- (b) Differentiate between choses in action and choses in possession. (4 marks)
- (c) State two (2) duties of a buyer under a contract of sale (2 marks)
- (d) Nomsa and Stacey are about to enter or form a partnership. Nomsa is not sure of what a partnership entails and decides to approach you for advice. Please advise Nomsa on any least two (2) disparities between a Partnership and a Limited Company. (4 marks)
- (e) State remedies which available for breach of contract of employment. (2 marks)

**[Total: 20 Marks]**

**END OF PAPER**

## C6 LAW FOR TAX PRACTITIONERS SOLUTIONS

### SOLUTION ONE

- (a) For an agreement to be formed, two elements have to be present which are offer and acceptance. An offer being defined as a definite promise to be bound on certain specific terms and acceptance being the unconditional expression of willingness to be bound by the terms of an offer. Once offer and acceptance co-incide then an agreement is formed (mirror image). However, where new terms are introduced before accepting, this introduces a counter offer which cancels the original offer. Therefore, in this case, the original offer of K450 was replaced by the counter offer of K400. In this way an agreement was not made since the terms of the offer and acceptance did not correspond. Example, **Hyde v Wrench[1840] 3 Beav 334**, the defendants wrote the plaintiffs offering to sell his farm for £1,000; the plaintiff made another offer of £950 which the defendant did not accept. It was held that there was no binding contract as the plaintiff had rejected the original offer thus cancelling the original offer.
- (b) A counter offer is a proposal that is made as a result of an undesirable offer. A counter offer rejects the original offer and permits a person to decline a previous offer allows offer negotiations to continue. The effect of a counter offer is that it cancels the original offer.
- (c) (i) Consideration must move from the promisee means that the promisee can only enforce the promise if they themselves, and not a third party, provided consideration for that promise.
- (ii) Consideration must not be past-past consideration is defined as an act done before a contract is made. It is consideration that is already given or some act that is already performed and therefore, cannot be induced by the other party's act. It is considered not to be consideration at all. A promise must be made before an act for it to be consideration.
- (iii) Consideration must be sufficient, it need not be adequate-according to the law, consideration for a contract must be sufficient but it need not be adequate. The principle of consideration is to ensure that promises are enforced to the parties that promised to exchange something of value in the view point of the law.

## SOLUTION TWO

(i) Remedies available to Chuluka Ben (Buyer):

- Reject the goods or get a refund
- Rescission
- Damages
- Specific performance

(ii) The remedies are explained below:

- *Reject the goods* – the buyer can reject the defective goods and claim a refund from Shopleft Ltd.
- *Rescission* – He can rescind (cancel) the contract on the ground that Shopleft Ltd misrepresented (fraudulently) on the condition of the table before buying it.
- Damages – He can sue for monetary compensation for the wrong goods and breach of contract.
- Specific Performance – Chuluka Ben as a buyer can sue for specific performance, i.e. having Shopleft perform their part of the contract by supplying him with a table in good condition.

(iii) Features of Hire Purchase:

- Deposit – The buyer pays a deposit before getting the item
- Hirer does not become owner until last instalment is paid
- Parties are not committed to sell until the buyer exercises his option to buy.
- The owner of the goods could repossess the goods where the hirer fails to finish payments.
- Property in the goods does not pass until the final instalment is paid.

(iv) Definitions of the following:

(a) *Finance Leases* – A finance lease involves the lease of an asset, such as machinery, to a commercial customer under an arrangement which is non-cancellable or only cancellable on payment of a financial penalty. The lessor provides the funding for the equipment but maintenance is done by the lessee. The lessee has no option to purchase the equipment. The equipment remains property of the lessor until the end of the agreement or when the asset is duly paid for by the lessee.

(b) *Negotiable Instruments* – This is a written instrument, signed by the maker or drawer of the instrument, that contains an unconditional promise or order to pay an exact sum of money on demand or at an exact future date to a specific person, or order, or to its bearer.

(c) *Holder in Due Course* – This is a person who takes the negotiable instrument for value, in good faith, and without notice that it is overdue or defective. This is a holder who has taken the bill, complete and regular on the face of it, without notice that it was overdue, previously dishonoured or encumbered in any way and took it in good faith without notice of any defect in title of the person who negotiated it.

(d) *Transfer of Property in Goods* – This is one of the aims of the Sale of Goods Act 1893. It simply means that the seller must transfer the whole property in the goods to the buyer once the buyer has paid for the goods or once all the conditions attached to the sale have been fulfilled.

### **SOLUTION THREE**

- a) The functions of the Judiciary include the administration of justice through resolving disputes between individuals or between individual and the state, interpreting the constitution and the laws of Zambia, promoting the rule of law, and protecting the human rights of individuals and groups.
- b) In jurisdictions following the English common law system **equity** is the body of law which was developed in the English Court of Chancery and which is now administered concurrently with the common law. For much of its history, the English common law was principally developed and administered in the central royal courts: the Court of King's Bench, the Court of Common Pleas, and the Exchequer. Equity was the name given to the law which was administered in the Court of Chancery. The Judicature Reforms in the 1870s effected a procedural fusion of the two bodies of law, ending their institutional separation. The reforms did not effect any substantive fusion, however. Judicial or academic reasoning which assumes the contrary has been described as a "fusion fallacy". Jurisdictions which have inherited the common law system differ in their current treatment of equity. Over the course of the twentieth century some common law systems began to place less emphasis on the historical or institutional origin of substantive legal rules. In England, Australia, New Zealand, and Zambia, equity remains a distinct body of law. The main function of equity was basically to mitigate the harshness of common law
- c) The Golden rule , as was seen in the case of **Grey v. Pearson (1857) 6HL CAS 61**, allows a judge to depart from a word's normal meaning in order to avoid absurdity in the event of ambiguity in a statute. A meaning must therefore be given which best express the intention of the parties.
- d) The tribunal has the jurisdiction to inquire into and make awards in matters relating to ;

- (i) Land under the Lands Acts
  - (ii) Payment of compensation
  - (iii) Matters affecting land rights and obligations
  - (iv) Other functions as designated
- e)** An **insurable interest** is a stake in the value of an entity or event for which an **insurance** policy is purchased to mitigate risk of loss. ... Entities not subject to financial loss from an event do not have an **insurable interest** and cannot purchase an **insurance** policy to cover that event.

## **SOLUTION FOUR**

The formation of a principal/agent relationship could be in the following ways:

- (i) By express appointment, no formality for the appointment of an agent is required and be written or oral.
  - (ii) Agency by estoppel-this where there is an agency by implication or conduct. Whilst a person cannot be bound by a contract made without his consent, proof that his conduct appeared that he had appointed an agent would entail that he will be estopped from denying the existence of authority.
  - (iii) Agency by ratification-This is where the principal ratifies and adopts the acts of his agent which were done without his authority, creating an agency relationship.
  - (iv) Agency of necessity-this type of agency arises where a person takes urgent action on behalf of another in an emergency. Such a person must show that he had acted in the best interest of the principal, the action was reasonable and there was no way of contacting the principal.
- (b) In order to establish the tort of negligence, the claimant must prove the following:
- A duty of care owed, where the defendant owes the plaintiff certain obligations;
  - Breach of duty-the duty of care is breached if the defendant does not take reasonable care in the circumstances.
  - Resultant damage-injury, loss or harm must be suffered by the plaintiff due to the breach of duty.
  - **Donoghue v Stevenson [1932] AC 562 (HL)**, the plaintiff fell ill after taking a bottle of ginger beer containing remains of a dead snail. When the

action was taken to court, the manufacturers of the drink were held liable and ordered to pay the plaintiff damages for injury suffered.

- (c) A contract of sale is a contract by which the seller transfers or agrees to transfer property in goods to the buyer for a money consideration called the price
- (d) The remedies available to the buyer under the contract of sale are: Rejection of the goods; rescission for innocent misrepresentation, damages and specific performance.

## SOLUTION FIVE

### Duties

- a) i) To carry all goods of the class he professes for anybody who delivers them to him , provided he has room in his carriage and the person offers to pay the proper charges.
  - ii) To carry the goods by his ordinary routes
  - iii) To deliver the goods to the consignee at the designated place
  - iv) To receive and carry all goods offered for carriage
  - v) To take utmost care of the goods from the moment of receipt to the place of destination
  - vi) To deliver the goods within reasonable time depending on the case by case basis.

- b) **A chose in action** is essentially a right to sue. It is an intangible personal property right recognized and protected by the law, that has no existence apart from the recognition given by the law, and that confers no present possession of a tangible object. Another term is a thing in action. A chose in action, sometimes called a chose in suspense, in its more limited meaning, denotes the right to enforce payment of a debt by legal proceedings, obtain money by way of damages for contract, or receive recompense for a wrong. A chose in possession is an item of tangible personal property that can be physically possessed by the owner and can be transferred by delivery. Possession of a chose in possession is prima facie evidence of ownership.

**Chose in possession** is opposed to chose in action, and denotes not only the right to enjoy or possess a thing, but also the actual or constructive enjoyment of it. The possession may be absolute or qualified. It is absolute when the person is fully and completely the proprietor or owner of the thing; it is qualified when he "has not an exclusive right, or not a permanent right, but a right that may sometimes subsist and at other times not subsist.

- c) Accept the goods and make payments

- d) Limited companies are formed under the Companies Act, Cap 388. A partnership is

formed under an agreement, the Partnership deed. There is separate existence between the company and members in a company, whereas a partnership and partners does not have this separation, and the firm and partners are one unit.

A company is responsible for its debts, and member's liability for the debts of the company is limited to the shares they have bought or have agreed to buy. In a partnership the liability is joint and several, meaning that the creditor may sue the firm or the individual partners or both the firm and partners.

- Damages or compensation
- Re-employment or re-instatement
- An appropriate remedy depending on circumstances

## **END OF SOLUTIONS**



**TAXATION PROGRAMME EXAMINATIONS**

DIPLOMA LEVEL

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D1: BUSINESS INFORMATION MANAGEMENT

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WEDNESDAY 13 JUNE 2018

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

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**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.
2. This question paper consists of **FOUR (4)** questions of Twenty Five (25) marks each. You must attempt all the **FOUR (4)** 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.

**Answer all FOUR (4) questions**

**QUESTION ONE**

- (a) The Feasibility Study consists of three parts namely:
  - (i) Technical
  - (ii) Operational



(iii) Economical

Explain what is considered or done in the different Feasibility Studies that can be conducted when developing a system. (12 marks)

- (b) List any five (5) testing methods/techniques that can be used to test the system that is being developed for an external client (5 marks)
- (c) The key elements of an organisation are its people, structure, operating procedures, politics and culture.

**Required:**

List five (5) major business functions or specialized task performed by business organisations. (5 marks)

- (d) Explain what Data Redundancy is. (3 Marks)

**[Total: 25 Marks]**

**QUESTION TWO**

- (a) The internet has transformed traditional business operations into a hypercompetitive electronic marketplace. Companies must strategically position themselves to compete in the e-commerce environment.

Compare and contrast the **brick-and –mortar strategy** and the **click-and-mortar strategy** (10 marks)

- (b) Managers in organisations are found at different levels. With the aid of a diagram, explain the levels of management in an organisation (9 marks)
- (c) Information System security is a critical issue in every organisation.

Explain the following security risks to information systems and how they can be prevented:

- (i) Denial of Service (DoS) attack (2 marks)
- (ii) Eavesdropping (2 marks)
- (iii) Password cracking (2 marks)

**[Total: 25 Marks]**

**QUESTION THREE**

- (a) Describe in detail the components of Expert systems (12 marks)
- (b) Fire is a serious hazard to computers systems. Destruction of data can be more costly than the destruction of hardware. A proper fire safety plan is an essential feature of security procedures, in order to prevent fire, detect fire and put out the fire.

**Required:**

- Explain what the Fire safety can include or take into consideration. (8 marks)
- (c) Explain what is meant by the term Total Quality Management (TQM). (5 marks)
- [Total: 25 Marks]**

#### **QUESTION FOUR**

- (a) Data and knowledge management coupled with communication and information flow have become very important considerations in the information systems development project.

**Required:**

- Distinguish between Data Mining and Data Warehousing. (6 marks)
- (b) Briefly explain the stages involved in project management (10 marks)
- (c) Describe any three (3) models of e-commerce (9 marks)

**[Total: 25 Marks]**

**END OF PAPER**

#### **D1 BUSINESS INFORMATION MANAGEMENT SOLUTIONS**

##### **SOLUTION ONE**

a)

**i) TECHNICAL**

- the technical issues that are raised during the feasibility stage of investigation include queries on whether the intended technology exists

- the proposed system provide adequate response to equerries regardless of the number of users
- the system can be expanded if developed, are there technical guarantees of accuracy, reliability, ease of access and data security.
- the hardware functional or absolute and or will need least equipment

## **ii) OPERATIONAL**

- This test of the feasibility asks if the system will work when it is developed or installed.
- It also analyses management support of the project/ users, if current is well liked and whether the users see the need for change hence avoiding resistance to change
- if the current business methods are accepted by the users, whether the users where part/ involved in the planning and the development of the project.
- Questions are asked concerning the harm the proposed system might produce in any area or respect, will there be loss of control, will individual performance be poorer than before and will customers be affected in a negative way?

## **iii) ECONOMICAL**

- The financial costs to the organization in terms of the profits or losses the project will bring.
- The benefits must equal or exceed the costs.
- The system that is developed and installed should be good investment for the organization.
- The questions that are raised are to estimate the following.
  - cost conduct the full system investigation
  - the cost of hardware and software for the class of application

b) List any five (5) testing methods/techniques that can be used to test the system that is being developed for an external client

- i) Unit testing
- ii) Integrated testing
- iii) User acceptance testing
- iv) System testing
- v) White box testing
- vi) Black box testing
- vii) Alpha testing
- viii) Beta testing

c) The key elements of an organisation are its people, structure, operating procedures, politics and culture.

List five (5) major business functions or specialized task performed by business organizations

- Sales and marketing
- Manufacturing and production
- Finance
- Accounting
- Human resources

d) What is Data Redundancy?

Data redundancy is the presence of duplicate data in multiple data files. Data redundancy occurs when different divisions, functional areas, and groups in an organization independently collect the same piece of information.

## SOLUTION TWO

a) Compare and contrast the brick-and –mortar strategy and the click-and-mortar **strategy**

### a) **Brick-and-mortar strategy**

- Operates solely in the traditional physical markets, shop or business office
- It can operate even with internet or ecommerce
- It focuses on one distinct way of doing business
- It makes customers have a feel or physical touch of product or good being bought
- Always assisted by someone who will explain or illustrate the product to customer or demonstrate on how to use or operate it

### **Click-and –mortar strategy**

- Operates in the physical location but have added the ecommerce or use of the internet to the business activities
- Transactions occur in both physical and virtual environments
- It fully maximizes commercial opportunities in both domains
- Design and development of complex computing systems are required to support strategy
- Different skills are necessary to support the strategy to be used effectively

b) Manages in organisations are found a different levels.

With the aid of a diagram, explain the levels of management in an organisation

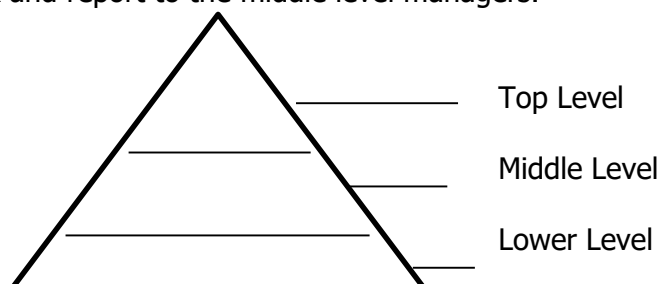
### Levels of management

There are basically three levels of management in an organisation; the top-Level (strategic) management, Middle-level (tactical) management and the lower-level (operational) management.

**Top-level management** are the top executives of the company. They set decisions that affect the whole organisation. They are responsible for developing the company's vision and making the executive decisions that affect the organization's future.

**Middle-level management** accountable to senior management, middle-level managers devote most of their work to organisational and directional functions such as controlling the work of lower-level managers and implementing policy. They basically carry out goals set by top management.

**Lower-level management** also called first line managers or supervisors, they are responsible for day to day work in the organisation. They supervise the flow line workers on their day to day work and report to the middle level managers.



- c) Information system security is a critical issue in every organisation.  
Explain the following security risks to information systems and how they can be prevented

#### Computer security risks

**i) Denial of service (DoS) attack**

- This is a security threat where the attacker attempts to prevent legitimate users from accessing the information system service they deserve.
- It is a cyber-attack in which the perpetrator seeks to make the system resources unavailable to its intended users.
- The most common types of DoS attack are when the attacker floods the network server with request for authentication whose return addresses are not valid and since servers can only handle a certain number of requests at once, it cannot process users' requests once it is overloaded, thus denying the legitimate users access to the resource they need.
- Denial of service attacks are difficult to prevent but one can install firewalls, up-to-date antivirus software including applying email filters.

**ii) Eavesdropping**

- Eavesdropping is unauthorised interception or listening of communication between two points on a network
- It is an electronic attack where digital communications are intercepted by an individual for whom they are not intended.
- Eavesdropping can be avoided by encrypting the data that is being transmitted on computer networks.

**iii) Password cracking**

- This involves various measures used to discover computer passwords
- It is usually done by repeatedly guessing the password using a computer algorithm for various reasons but mostly for gaining unauthorised access.
- Password cracking can be avoided by choosing strong password that has characters that are a combination of letters and numbers in both upper and lower case.

### **SOLUTION THREE**

- a) Describe in detail the components of expert systems

- Inference engine: this is the main processing element of the expert system. The engine chooses rules to execute. If there are no rules, the inference must obtain information from the user
- Knowledge Base: this is a collection of rules or other information derived from the human expert. Rules are normally structured in the form of *if ...then* statements.
- User Interface: this the method by which the expert system interacts with a user. This can be through a dialog box, command prompts and other input methods.

- b) Fire is a serious hazard to computers systems. Destruction of data can be more costly than the destruction of hardware. A proper fire safety plan is an essential feature of security procedures, in order to prevent fire, detect fire and put out the fire.

Explain what the Fire safety can include or take into consideration?

Fire safety includes:

- Site preparation e.g. appropriate building materials, fire doors
- Detection e.g. smoke detectors
- Extinguishing e.g. fire extinguisher, ceiling sprinkler
- Training for staff in observing fire safety procedures, no flammable fluids & no smoking in computer room
- Weather may be a threat, wind, rain and storm can all cause substantial damage to buildings
- Lightning & electrical storms pose an additional threat with power supply, causing power failures one way of combating this is by the use of Uninterrupted Power Supply (UPS). This will protect equipment from fluctuations in the supply. Power failure can be protected against by the use of a generator

- c) Understanding of the term Total Quality Management (TQM)

Total Quality Management (TQM) is a business management strategy used to improve the quality of the products and services offered by an organisation. The concept makes quality the responsibility of all the people and functions within an organisation where everyone is expected to contribute to the overall improvement of quality.

Total Quality Management, is a method by which management and employees can become involved in the continuous improvement of the production of goods and services. It is a combination of quality and management tools aimed at increasing business and reducing losses due to wasteful practices.

## **SOLUTION FOUR**

- a) Data and knowledge management coupled with communication and information flow have become very important considerations in the information systems development project.

Distinguish between Data Mining and Data Warehousing.

- a) Data warehouse is a technique for collecting, storing and managing data from various sources for business information. It is the technologies and features required to use data strategically. This pool of data is available for query and analysis. This is a method of centralizing a pool of related data.

Data mining is a method of looking for hidden, valid and potentially useful patterns in huge data sets. It is a way of discovering new trends, unknown relationships and depth in data.

- b) Briefly explain the stages involved in project management
- Initiation Stage  
Project description  
Project approvals
  - Planning Stage  
Planning in terms human and financial resources  
Timing constraints and the mitigation
  - Execution Stage  
This the stage when the actual tasks are carried out in order to achieve the project objectives
  - Monitoring and Controlling Stage  
Monitoring and evaluating and making sure that controls are being done
  - Closing Stage  
Closing of the project and handing over to the rightful owner
- c) Describe any three models of e-commerce  
Main models of e-commerce:
- i. **B2B**: this model of e-commerce involves a business organisation selling its goods and services to another business organisation
  - ii. **B2C**: In this model business organisations sell directly to their consumers without a middleman involved. Both the buyers and the sellers are business entities.
  - iii. **C2C**: In model involves consumers selling fellow consumers
  - iv. **G2C** : The model involves the government to citizens
  - v. **C2B** : The model involves consumer to business
  - vi. **B2G** : The model involves business to government
  - vii. **G2B** : The model involves government to business

**END OF D1 SOLUTIONS**





TAXATION PROGRAMME EXAMINATIONS

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DIPLOMA LEVEL

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D2: FINANCIAL MANAGMENT

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FRIDAY 15 JUNE 2018

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

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**INSTRUCTIONS TO CANDIDATES**

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8. Present legible and tidy work.
9. Graph paper (if required) is provided at the end of the answer booklet.
10. Formulae, Present Value, and Annuity tables are provided at the end of this question paper.

**Attempt all (FOUR) questions**

**QUESTION ONE**

WT Ltd has 10% debenture capital of K250, 000 with 6 years to maturity. The par value of the debentures is K1,000 each. The interest payments are payable semi-annually and the debentures are redeemable at a discount of 5% to the par value. WT Ltd uses a yield to maturity of 8% to appraise all its investments. The company recently engaged a new consultant. He is skeptical about the suitability of this discount rate for the company and he recently recommended the use of the weighted average cost of capital as a discount rate for all WT investments. WT Ltd acquired 75% of the ordinary shares of CCP Ltd 5 years ago for K60,000. CCP Ltd balance sheet had total assets of K48,000 on the date of acquisition. CCP Ltd has maintained a return on capital employed of 10% and a dividend payout ratio of 40% over the last 10 years. CCP Ltd has ordinary share capital of K40,000 and Reserves of K12,000 while WT Ltd has reserves of K150,000 and ordinary share capital of K200,000.

**Required:**

- (a) Calculate the market value of the debentures using the yield to maturity of 8%.  
(6 marks)
- (b) Explain what is meant by the weighted average cost of capital and why many companies use it as a discount rate in investment appraisal. (8 marks)
- (c) Calculate the amount to be recognized in the consolidated financial statements of WT Ltd for:
  - (i) Goodwill on acquisition (6 marks)
  - (ii) Reserves (5 marks)

**[Total: 25 Marks]**

**QUESTION TWO**

- (a) Explain the following concepts:
  - (i) Agency Problem (2 marks)
  - (ii) Alternative investment market (2 marks)
  - (iii) Goodwill (3 marks)
  - (iv) Factoring (3 marks)
- (b) Discuss the relationship between investment, financing and dividend decisions as key decisions made by a financial manager. (6 marks)
- (c) Explain the **THREE (3)** main types of market efficiency and comment on how information plays a pivotal role in investment decisions made by financial managers. (9 marks)

**[Total: 25 Marks]**

### **QUESTION THREE**

Solar Power and refrigeration investments has 200,000 ordinary shares in issue and the current market price is K12 per share. The company also has 50,000 preference shares in issue with a market price of K15 each. The company's outstanding loan notes have 14 years to maturity, a face value of K1,000,000 with a coupon rate of 5% per annum.

#### **Additional information**

- (i) Solar Power and refrigeration pays corporation tax at 35% per annum and it has a dividend pay -out ratio of 16%.
- (ii) The company maintains a return on capital employed of 20%.
- (iii) The company recently paid a dividend of 50 ngwee per ordinary share and K2 per preference share.
- (iv) The loan notes have an internal rate of return of 8%.

#### **Required:**

Using the information given above, calculate the weighted average cost of capital of Solar Power and refrigeration investments using market values as weights.

**[Total: 25 Marks]**

### **QUESTION FOUR**

ABC limited is considering investing in a project that will cost ZMW 50m to be paid at the beginning of the first year of operation. The investment project provides the following information:

	<b>Year 1</b>	<b>Year 2</b>	<b>Year 3</b>	<b>Year 4</b>
<b>Sales volume (units/year)</b>	1,040,000	1,248,000	1,434,000	1,576,000
<b>Selling price (K/unit)</b>	60.00	60.00	60.00	60.00
<b>Variable costs (K/unit)</b>	20.00	20.40	21.22	21.86
<b>Fixed costs (K/year)</b>	1,400,000	1,470,000	1,558,000	1,682,000

The above information takes into consideration a selling price inflation rate of 8% per year and variable cost inflation of 6% per year. The incremental fixed costs related to the investment project are in nominal terms with the 4-year sales volume expected to continue for the foreseeable future. ABC Ltd pays a 30% corporate tax a year in arrears.

The directors of ABC Ltd require the evaluation of investment projects over the four years of operation, with an assumed terminal value at the end of the fourth year of 5% of the initial investment cost. The use of both the net present value and discounted payback must be used, with a maximum discounted payback period of two years. The real after-tax cost of capital for this company is 14% and its nominal after-tax cost of capital is 24%.

#### **Required:**

- (a) Calculate the following for this planned investment project:
  - (i) The net present value (7 marks)
  - (ii) The discounted payback period (2 marks)
- (b) Using the findings in (a), explain to the directors of ABC Ltd whether this investment project is financially acceptable or not. (3 marks)

(c) In appraising investments, there will always be an element of risk and uncertainty.

**Required:**

Discuss the following techniques that can be applied to assess the impact of risk on a project:

- |       |                                  |           |
|-------|----------------------------------|-----------|
| (i)   | Payback period technique         | (3 marks) |
| (ii)  | Adjusted Discount Rate technique | (4 marks) |
| (iii) | Sensitivity Analysis technique   | (6 marks) |

**[Total: 25 marks]**

**END OF PAPER**

### Formula Sheet

Economic order quantity

$$= \sqrt{\frac{2C_n D}{C_H}}$$

Miller – Orr Model

$$\text{Return point} = \text{Lower limit} + \left(\frac{1}{3} \times \text{spread}\right)$$

$$\text{Spread} = 3 \left[ \frac{\frac{3}{4} \times \text{transaction cost} \times \text{variance of cash flows}}{\text{interest rate}} \right]^{\frac{1}{3}}$$

The Capital Asset Pricing Model

$$E(r_i) = R_f + \beta_i (E(r_m) - R_f)$$

The asset beta formula

$$\beta_a = \left[ \frac{V_e}{(V_e + V_d(1-T))} \beta_e \right] + \left[ \frac{V_d(1-T)}{(V_e + V_d(1-T))} \beta_d \right]$$

The Growth Model

$$P_0 = \frac{D_0(1+g)}{(r_e - g)}$$

Gordon's growth approximation

$$g = b r_e$$

The weighted average cost of capital

$$\text{WACC} = \left[ \frac{V_e}{V_e + V_d} \right] k_e + \left[ \frac{V_d}{V_e + V_d} \right] k_d(1-T)$$

The Fisher formula

$$(1+i) = (1+r)(1+h)$$

Purchasing power parity and interest rate parity

$$s_1 = S_0 \times \frac{(1+h_c)}{(1+h_b)} \qquad f_0 = S_0 \times \frac{(1+i_c)}{(1+i_b)}$$

**Present Value Table**

Present value of 1 i.e.  $(1 + r)^{-n}$

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

Periods (n)	Discount rate (r)										
	1%	2%	3%	4%	5%	6%	7%	8%	9%	10%	
1	0.990	0.980	0.971	0.962	0.952	0.943	0.935	0.926	0.917	0.909	1
2	0.980	0.961	0.943	0.925	0.907	0.890	0.873	0.857	0.842	0.826	2
3	0.971	0.942	0.915	0.889	0.864	0.840	0.816	0.794	0.772	0.751	3
4	0.961	0.924	0.888	0.855	0.823	0.792	0.763	0.735	0.708	0.683	4
5	0.951	0.906	0.863	0.822	0.784	0.747	0.713	0.681	0.650	0.621	5
6	0.942	0.888	0.837	0.790	0.746	0.705	0.666	0.630	0.596	0.564	6
7	0.933	0.871	0.813	0.760	0.711	0.665	0.623	0.583	0.547	0.513	7
8	0.923	0.853	0.789	0.731	0.677	0.627	0.582	0.540	0.502	0.467	8
9	0.914	0.837	0.766	0.703	0.645	0.592	0.544	0.500	0.460	0.424	9
10	0.905	0.820	0.744	0.676	0.614	0.558	0.508	0.463	0.422	0.386	10
11	0.896	0.804	0.722	0.650	0.585	0.527	0.475	0.429	0.388	0.350	11
12	0.887	0.788	0.701	0.625	0.557	0.497	0.444	0.397	0.356	0.319	12
13	0.879	0.773	0.681	0.601	0.530	0.469	0.415	0.368	0.326	0.290	13
14	0.870	0.758	0.661	0.577	0.505	0.442	0.388	0.340	0.299	0.263	14
15	0.861	0.743	0.642	0.555	0.481	0.417	0.362	0.315	0.275	0.239	15
<hr/>											
(n)	11%	12%	13%	14%	15%	16%	17%	18%	19%	20%	
1	0.901	0.893	0.885	0.877	0.870	0.862	0.855	0.847	0.840	0.833	1
2	0.812	0.797	0.783	0.769	0.756	0.743	0.731	0.718	0.706	0.694	2
3	0.731	0.712	0.693	0.675	0.658	0.641	0.624	0.609	0.593	0.579	3
4	0.659	0.636	0.613	0.592	0.572	0.552	0.534	0.516	0.499	0.482	4
5	0.593	0.567	0.543	0.519	0.497	0.476	0.456	0.437	0.419	0.402	5
6	0.535	0.507	0.480	0.456	0.432	0.410	0.390	0.370	0.352	0.335	6
7	0.482	0.452	0.425	0.400	0.376	0.354	0.333	0.314	0.296	0.279	7
8	0.434	0.404	0.376	0.351	0.327	0.305	0.285	0.266	0.249	0.233	8
9	0.391	0.361	0.333	0.308	0.284	0.263	0.243	0.225	0.209	0.194	9
10	0.352	0.322	0.295	0.270	0.247	0.227	0.208	0.191	0.176	0.162	10
11	0.317	0.287	0.261	0.237	0.215	0.195	0.178	0.162	0.148	0.135	11
12	0.286	0.257	0.231	0.208	0.187	0.168	0.152	0.137	0.124	0.112	12
13	0.258	0.229	0.204	0.182	0.163	0.145	0.130	0.116	0.104	0.093	13
14	0.232	0.205	0.181	0.160	0.141	0.125	0.111	0.099	0.088	0.078	14
15	0.209	0.183	0.160	0.140	0.123	0.108	0.095	0.084	0.074	0.065	15

### Annuity Table

Present value of an annuity of 1 i.e.  $\frac{1 - (1 + r)^{-n}}{r}$

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

Periods (n)	Discount rate (r)										
	1%	2%	3%	4%	5%	6%	7%	8%	9%	10%	
1	0.990	0.980	0.971	0.962	0.952	0.943	0.935	0.926	0.917	0.909	1
2	1.970	1.942	1.913	1.886	1.859	1.833	1.808	1.783	1.759	1.736	2
3	2.941	2.884	2.829	2.775	2.723	2.673	2.624	2.577	2.531	2.487	3
4	3.902	3.808	3.717	3.630	3.546	3.465	3.387	3.312	3.240	3.170	4
5	4.853	4.713	4.580	4.452	4.329	4.212	4.100	3.993	3.890	3.791	5
6	5.795	5.601	5.417	5.242	5.076	4.917	4.767	4.623	4.486	4.355	6
7	6.728	6.472	6.230	6.002	5.786	5.582	5.389	5.206	5.033	4.868	7
8	7.652	7.325	7.020	6.733	6.463	6.210	5.971	5.747	5.535	5.335	8
9	8.566	8.162	7.786	7.435	7.108	6.802	6.515	6.247	5.995	5.759	9
10	9.471	8.983	8.530	8.111	7.722	7.360	7.024	6.710	6.418	6.145	10
11	10.37	9.787	9.253	8.760	8.306	7.887	7.499	7.139	6.805	6.495	11
12	11.26	10.58	9.954	9.385	8.863	8.384	7.943	7.536	7.161	6.814	12
13	12.13	11.35	10.63	9.986	9.394	8.853	8.358	7.904	7.487	7.103	13
14	13.00	12.11	11.30	10.56	9.899	9.295	8.745	8.244	7.786	7.367	14
15	13.87	12.85	11.94	11.12	10.38	9.712	9.108	8.559	8.061	7.606	15
(n)	11%	12%	13%	14%	15%	16%	17%	18%	19%	20%	
1	0.901	0.893	0.885	0.877	0.870	0.862	0.855	0.847	0.840	0.833	1
2	1.713	1.690	1.668	1.647	1.626	1.605	1.585	1.566	1.547	1.528	2
3	2.444	2.402	2.361	2.322	2.283	2.246	2.210	2.174	2.140	2.106	3
4	3.102	3.037	2.974	2.914	2.855	2.798	2.743	2.690	2.639	2.589	4
5	3.696	3.605	3.517	3.433	3.352	3.274	3.199	3.127	3.058	2.991	5
6	4.231	4.111	3.998	3.889	3.784	3.685	3.589	3.498	3.410	3.326	6
7	4.712	4.564	4.423	4.288	4.160	4.039	3.922	3.812	3.706	3.605	7
8	5.146	4.968	4.799	4.639	4.487	4.344	4.207	4.078	3.954	3.837	8
9	5.537	5.328	5.132	4.946	4.772	4.607	4.451	4.303	4.163	4.031	9
10	5.889	5.650	5.426	5.216	5.019	4.833	4.659	4.494	4.339	4.192	10
11	6.207	5.938	5.687	5.453	5.234	5.029	4.836	4.656	4.486	4.327	11
12	6.492	6.194	5.918	5.660	5.421	5.197	4.988	4.793	4.611	4.439	12
13	6.750	6.424	6.122	5.842	5.583	5.342	5.118	4.910	4.715	4.533	13
14	6.982	6.628	6.302	6.002	5.724	5.468	5.229	5.008	4.802	4.611	14
15	7.191	6.811	6.462	6.142	5.847	5.575	5.324	5.092	4.876	4.675	15

## D2 FINANCIAL MANAGEMENT SOLUTIONS

### SOLUTION ONE

- a) Market Value of debentures = PV interest payments (annuity) + present value of capital repayment amount.

#### Workings

Interest  $10\% * k1000 * 0.5 = k50$

Number of periods to maturity  $6 * 2 = 12$

$K50 * \text{annuity factor for 12 periods @ } 4\% + k1000 * 0.95 * \text{PVIF 12 periods at } 4\%$

$K50 * 9.385 + k950 * 0.625 = K1063$

- b) The weighted average cost of capital is the average cost of the different elements within the capital structure of a company, using weightings based on the market values of each of the different elements. The computed WACC represents the cost of the capital currently employed. This represents financial decisions taken in previous periods.

In many cases it will be difficult to associate a particular project with a particular form of finance. A company's funds may be viewed as a pool of resources. Money is withdrawn from this pool of funds to invest in new projects and added to the pool as new finance is raised or profits are retained. Under these circumstances it might seem appropriate to use an average cost of capital as a discount rate.

The correct cost of capital to use in investment appraisal is the marginal cost of the funds raised (or earnings retained) to finance the investment.

The marginal cost of capital (MCC) is the additional cost the firm will pay to raise an additional kwacha of capital, assuming the capital is raised using the optimal capital proportions.

The WACC might be considered the most reliable guide to the marginal cost of capital, but only on the assumption that the company continues to invest in the future, in projects of a standard level of business risk, by raising funds in the same proportion as its existing capital structure.

- c) Pre-acquisition reserves of subsidiary  
Profit after tax  $10\% * K48000 = K4800$   
Earnings retention rate  $1 - 0.4 = 0.6$   
Retained earnings on acquisition  $= K4800 * 0.6 = K2880$

#### GOODWILL COMPUTATION

Consideration		K60000
Ordinary Share capital	K40000	
Reserves	K2880	
Total	K42880	
Total x shareholding 75%		K32160
Goodwill		K27840

#### RESERVES

Parent Reserves		K150000
Add: Post acquisition reserves of CCP:		
K12000 - K2880	= K9120 * 75%	K6840
Reserves for WT Group		K156840



## SOLUTION TWO

a) Briefly explain the following terms:

- (i) **Agency Problem** – is a conflict that arises when managers behave in a manner that is not in the best interest of the shareholder.
- (ii) **Alternative investment market** – is a second tier market for securities of smaller growing companies that have not yet met the full listing requirements.
- (iii) **Goodwill** - Goodwill is an intangible asset that arises when one company purchases another for a premium value. The value of a company's brand name, solid customer base, good customer relations, good employee relations, and any patents or proprietary technology represents goodwill.

Goodwill is considered an intangible asset because it is not a physical asset like buildings or equipment.

- (iv) **Factoring** – the outsourcing of the credit control department to a third party. The debts of the company are effectively sold to a factor (normally owned by a bank). The factor takes on the responsibility to collect the debt for a fee.

b) Investment, financing and dividend decisions are very closely interrelated. Investment decisions cannot be taken without consideration of where and how the funds are to be raised to finance the investment. The type of finance available will, in turn, depend to some extent on the nature of the project – its size, duration, risk, capital asset backing etc...

Dividends represent the payment or returns on the investment back to the shareholders, the level and risk of which will depend upon the project itself, and equally how it is financed.

Fixed debt finance, for example, can be cheap (particularly where a tax shield is applied) but requires a fixed payment to be made out of project earnings, which can increase the risk of the shareholders' dividends.

c) **Market Efficiency**

**Operational efficiency** – efficiency is met when costs are low

**Allocative efficiency** – efficiency is met when funds are swiftly channeled to those companies which would make their best use

**Information processing efficiency** – efficiency in this sector reflects the extent to which information regarding the future prospects of a security is reflected in its current price. There are three forms of information processing efficiency: 1. The Weak form – concerned with past information. 2. The Semi-strong form – for all publicly available information; and 3. The Strong form – information both private and publicly available.

Information processing efficiency is vital to the decision making process by financial managers as it means the results of management decisions will be quickly and accurately reflected in share prices. Without efficient information processes, market analyses would be inaccurate and this could result in forgone opportunities the market could have offered, or hasty, unprofitable decisions

### SOLUTION THREE

#### MARKET VALUES

Ordinary shares 200,000 \* K12 = K2,400,000

Preference Shares 50,000 \* K15 = K750,000

Loan Notes = PV of annuity of interest payments + PV of capital repayment

$K500,000 * 0.05 = K25,000$

$K25000 * \text{PVAF for 14 years at 8\% per annum} + K500000 * \text{PVF}$

$K25000 * 8.244 + K500000 * 0.340$

$K206100 + K170000$

$K376100$

#### COST

Cost of equity

Gordon's growth approximation

$g = br$

$b = 1 - 0.16$

$= 0.84$

$r = 0.2$

$g = 0.84 * 0.2$

$= 0.168$

$= 16.8\%$

$K_e = \{[D/P_0] / P_0\} + g$

$[K0.5 (1+0.168)] / K12 + 0.168$

$0.2167$

$= 21.67\%$

Cost of Loan notes

$8\% * (1 - 0.35)$

$8\% * 0.65$

$5.2\%$

Cost of preference shares

$K_p = [D/P_0] * 100$

$= [K2/K15] * 100$

**13.333%**

#### WACC

SOURCE	MARKET VALUE K	COST	COST*MKT VALUE K
Equity	2400000	0.2167	520080
Preference shares	750000	0.1333	99975
Loan Notes	376100	0.5200	195572
	3526100		815627

$\text{WACC} = [815,627 / 3,526,100] * 100$

$= 23.13\%$

**SOLUTION FOUR**

(a) COMPANY ABC

i.

<b>SOLUTION</b>					
<b>Year</b>	<b>1</b>	<b>2</b>	<b>3</b>	<b>4</b>	<b>5</b>
<b>Sales Income</b>	67,392,000	87,340,032	108,385,620	128,647,836	
<b>Variable costs</b>	22,048,000	28,605,957	36,241,998	43,494,048	
<b>Contribution</b>	<b>45,344,000</b>	<b>58,734,075</b>	<b>72,143,623</b>	<b>85,153,788</b>	
<b>Fixed Costs</b>	1,400,000	1,470,000	1,558,000	1,682,000	
<b>Cash Flow Before Tax</b>	<b>43,944,000</b>	<b>57,264,075</b>	<b>70,585,623</b>	<b>83,471,788</b>	
<b>Corporate Tax</b>	-	13,183,200	17,179,222	21,175,687	25,041,536
<b>After-tax Cash Flow</b>	<b>43,944,000</b>	<b>44,080,875</b>	<b>53,406,400</b>	<b>62,296,101</b>	<b>(25,041,536)</b>
<b>Terminal Value</b>	-	-	-	2,500,000	-
<b>Projected Cash Flow</b>	<b>43,944,000</b>	<b>44,080,875</b>	<b>53,406,400</b>	<b>64,796,101</b>	<b>(25,041,536)</b>
<b>Discount at 24%</b>	0.8065	0.6504	0.5245	0.4230	0.3411
<b>Present Values</b>	<b>35,438,710</b>	<b>28,668,623</b>	<b>28,010,977</b>	<b>27,407,040</b>	<b>(8,541,862)</b>
<b>PV of Future Cash Flows</b>	110,983,488				
<b>ICO</b>	50,000,000				
<b>NPV</b>	<b>60,983,488</b>				

<b>WORKINGS</b>				
<b>Year</b>	<b>1</b>	<b>2</b>	<b>3</b>	<b>4</b>
<b>Sales volume (units/year)</b>	1040000	1248000	1434000	1576000
<b>Selling price (K/unit)</b>	60	60	60	60
<b>Inflated by 8% per year</b>	64.8	69.984	75.58272	81.6293376
<b>Income per year</b>	67392000	87340032	108385620.5	128647836.1
<b>Year</b>	<b>1</b>	<b>2</b>	<b>3</b>	<b>4</b>
<b>Sales volume (units/year)</b>	1040000	1248000	1434000	1576000
<b>Variable costs (K/year)</b>	20	20.4	21.22	21.86
<b>Inflated by 6% per year</b>	21.2	22.92144	25.27335952	27.59774635

<b>Variable costs per year</b>	22048000	28605957.12	36241997.55	43494048.24
<b>Year</b>	<b>1</b>	<b>2</b>	<b>3</b>	<b>4</b>
<b>Fixed costs</b>	1,400,000	1,470,000	1,558,000	1,682,000

ii.

<b>Year</b>	<b>1</b>	<b>2</b>	<b>3</b>	<b>4</b>	<b>5</b>
<b>Present Values</b>	35,438,710	28,668,623	28,010,977	27,407,040	(8,541,862)
<b>Cumulative Net Present Value</b>	(14,561,290)	14,107,333	42,118,309	69,525,349	60,983,488
<b>Pay Back Period</b>	<b>Year</b>	<b>Months</b>			
	1.000	0.508			
<b>Discounted Payback (years)</b>	<b>1.508</b>				

(b) The investment project is financially acceptable under the NPV decision rule because it has a substantial positive **NPV of K 60,983,488**. The discounted payback period of **1.5 years** is greater than the maximum target discounted payback period of two years and equally so, from this perspective the investment project is financially acceptable. Both indicators prove that the investment is viable and financially acceptable.

### (c) Risk and Uncertainty

#### i. Payback Period

Estimates of cash flows several years ahead are quite likely to be inaccurate and unreliable. It may be difficult to control capital projects over a long period of time. Risk may be limited by selecting projects with short payback periods, in addition to positive NPVS.

#### ii. Adjusted Discounting rates

The discount rate we have assumed so far is the rate that reflects either the cost of borrowing funds in the form of a loan rate or it may reflect the underlying return of the business (i.e. the return required by the shareholder), or a mix of both. If an individual investment or project is perceived to be more risky than existing investments, the increased risk could be used as a reason to adjust the discount rate. The application of increased discount rate is often successful in eliminating marginal projects. The addition to the usual discount rate is called the Risk Premium.

#### iii. Sensitivity Analysis

Sensitivity analysis typically involves posing what if questions? For example, what if demand fell by 10%, selling price was decreased by 5%, etc...

Alternatively, we may wish to discover the maximum possible change in one of the parameters before the project is no longer viable. This maximum possible change in one of the parameters before the project is no longer viable. This maximum possible change is often expressed as a percentage:

Sensitivity margin = NPV / PV of flow under consideration

Advantages:

- Allows managers to make better judgments by providing them with information as to the critical estimates
- Simple to calculate and understand

Disadvantages:

- Does not assess the chance of a variable changing
- Ignores the interrelationships between variables
- Does not provide a decision rule

**END OF SOLUTIONS**



TAXATION PROGRAMME EXAMINATIONS

DIPLOMA LEVEL

D3: BUSINESS TAXATION

WEDNESDAY 13 JUNE 2018

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

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**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 question paper consists of **FOUR (4)** questions of twenty (25) marks each. You MUST attempt all the **FOUR (4)** questions.
3. Enter your student number and your National Registration Card Number on the front page 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 the required depth of the answer.
7. You must write ALL your answers 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. A taxation table is provided on pages 2,3 and 4 of this paper

**Taxation table for paper D3 – Business Taxation (June and December 2018 Examinations)**

**Income Tax**

**Standard personal income tax rates**

<b>Income band</b>	<b>Taxable amount</b>	<b>Rate</b>
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%

**Mineral Royalty**

**Mineral Royalty on Copper**

<b>Range of Norm Price</b>	<b>Mineral Royalty Rate</b>
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**

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

K1to K4,200

K4,200.01to K8,300

K8,300.01 to K12,500

K12,500.01 to K16,500

K16,500.01 to K20,800

Above K20,800

**Turnover Tax per month**

3% of monthly turnover above K3,000

K225 per month+3% of monthly turnover above K4,200

K400 per month+3% of monthly turnover above K8,300

K575 per month+3% of monthly turnover above K12,500

K800 per month+3% of monthly turnover above K16,500

K1,025 per month+3% monthly of turnover above K20,800

**Annual turnover**

K1to K50,400

K50,400.01to K99,600

K99,600.01 to K150,000

K150,000.01 to K198,000

K198,000.01 to K249,600

Above K249,600

**Turnover Tax per annum**

3% of annual turnover above K36,000

K2,700 per annum+3% of annual turnover above K50,400

K4,800 per annum +3% of annual turnover above K99,600

K6,900 per annum+3% of annual turnover above K150,000

K9,600 per annum+3% of annual turnover above K198,000

K12,300 per annum +3% of annual of turnover above

K249,600

**Presumptive Tax for Transporters**

**Seating capacity**

**Tax per annum**

**Tax per day**

Seating capacity	Tax per annum K	Tax per day K
From 64 passengers and over	10,800	29.60
From 50 to 63 passengers	9,000	24.70
From 36 to 49 passengers	7,200	19.70
From 22 to 35 passengers	5,400	14.80
From 18 to 21 passengers	3,600	10
From 12 to 17 passengers	1,800	5.0
Less than 12 passengers and taxis	900	2.50



## 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%
Rate of Tax on Realised Value on a transfer of Intellectual Property	5%

## Value Added Tax

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

## Customs and Excise

### Customs and Excise duties on used motor vehicles

<b>Motor vehicles for the transport of ten or more persons, including the driver</b>	<b>Aged 2 to 5 years</b>		<b>Aged over 5 years</b>	
	<b>Customs duty</b>	<b>Excise duty</b>	<b>Customs duty</b>	<b>Excise duty</b>
	<b>K</b>	<b>K</b>	<b>K</b>	<b>K</b>
Sitting capacity of 10 but not exceeding 14 persons including the driver	17,778	22,223	8,889	11,112
Sitting capacity exceeding 14 but not exceeding 32 persons	38,924	0	13,840	0
Sitting capacity of 33 but not exceeding 44 persons	86,497	0	19,462	0
Sitting capacity exceeding 44 persons	108,121	0	43,248	0

### Aged 2 to 5 years

### Aged over 5 years

<b>Motor cars and other motor vehicles principally designed for the transport of persons including station wagons and racing cars</b>	<b>Customs duty</b>	<b>Excise duty</b>	<b>Customs duty</b>	<b>Excise duty</b>
	<b>K</b>	<b>K</b>	<b>K</b>	<b>K</b>

#### **Sedans**

cylinder capacity not exceeding 1000 cc	12,490	10,824	7,136	6,185
Cylinder capacity exceeding 1000 cc but not exceeding 1500 cc	16,058	13,917	8,564	7,422
Cylinder capacity exceeding 1500 cc but not exceeding 2500 cc	16,545	21,508	8,423	10,950
Cylinder capacity exceeding 2500 cc but not exceeding 3000 cc	18,049	23,463	10,528	13,687
Cylinder capacity exceeding 3000 cc	22,561	29,329	12,032	15,642

#### **Hatchbacks**

cylinder capacity not exceeding 1000 cc	10,705	9,278	7,136	6,185
Cylinder capacity exceeding 1000 cc but not exceeding 1500 cc	14,274	12,371	8,564	7,422
Cylinder capacity exceeding 1500 cc but not exceeding 2500 cc	15,041	19,553	8,423	10,950
Cylinder capacity exceeding 2500 cc but not exceeding 3000 cc	16,545	21,508	10,523	13,687
Cylinder capacity exceeding 3000 cc	19,553	25,419	12,032	15,642

**Station wagons**

cylinder capacity not exceeding 2500 cc	16,545	21,508	9,024	11,731
Cylinder capacity exceeding 2500 cc but not exceeding 3000 cc	18,049	23,463	13,357	17,598
Cylinder capacity exceeding 3000 cc but not exceeding 2500 cc	22,561	29,329	18,049	23,463

**SUVs**

Cylinder capacity not exceeding 2500 cc	21,057	27,374	9,024	11,732
Cylinder capacity exceeding 2500 cc but not exceeding 3000 cc	24,065	31,284	13,357	17,598
Cylinder capacity exceeding 3000 cc	28,577	37,150	18,049	23,463

**Aged 2 to 5 years****Aged over 5 years****Motor vehicles for the transport of goods –with compression-ignitioninternal combustion piston engine (diesel or semi-diesel):****Customs duty****Excise duty****Customs duty****Excise duty****K****K****K****K****Single cab**

GVW exceeding 1.0 tonne but not exceeding 1.5 tonnes	21,926	9,501	8,770	3,801
GVW exceeding 1.5 tonnesbut not exceeding 3.0 tonnes	26,311	11,402	15,348	6,651
GVW exceeding 3.0 tonnesbut not exceeding 5.0 tonnes	30,697	13,302	17,541	7,601
Double cabs GVW exceeding 3 tonnes but not exceeding 5 tonnes	30,274	0	24,119	10,452
Double cabs GVW exceeding 3.0 tonnes but not exceeding 5.0 tonnes, <b>with spark ignition internal combustion piston engine</b>	30,697	13,302	24,119	10,452

**Panel Vans**

GVW exceeding 1.0 tonne but not exceeding 1.5 tonnes	15,348	6,651	8,770	3,801
GVW exceeding 1.5 tonnesbut not exceeding 3.0 tonnes	17,541	7,601	15,348	6,651
GVW exceeding 3.0 tonnesbut not exceeding 5.0 tonnes	21,926	9,501	17,541	7,601

**Trucks**

GVW up to 2 tonnes	21,926	9,501	10,963	4,751
GVW exceeding 2.0 tonnes but not exceeding 5.0 tonnes	28,504	12,352	13,156	5,701
GVW exceeding 5.0 tonnesbut not exceeding 10.0 tonnes	24,724	18,955	10,817	8,293
GVW exceeding 10.0 tonnesbut not exceeding 20.0 tonnes	30,905	23,694	11,744	9,004
GVW exceeding 20 tonnes	51,898	0	19,461	0
GVW exceeding 20 tonnes, <b>with spark ignition internal combustion piston engine</b>	37,086	28,432	13,907	10,662

### **Customs and excise duty on new vehicles**

- 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: 30%
  - Excise duty:
    - 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 tonnes:
  - Customs duty 15%
  - Excise duty 10%
- 3 Buses/coaches for the transport of more than ten persons
  - Customs duty: 15%
  - Excise duty:
    - Seating capacity of 16 persons and less 25%
    - Seating capacity of 16 persons and more 0%
- 4 Trucks/lorries with gross weight exceeding 20 tonnes
  - Customs duty: 15%
  - Excise duty: 0%

The minimum amount of customs duty on motor vehicles is K6,000.

Import VAT is added to the sum of VDP, customs duty and excise duty. It is determined at the standard rate of 16%

**Attempt all FOUR (4) questions**

**QUESTION ONE**

Mansa Copper Mines (MCM) plc is an 80% owned subsidiary of AK minerals a multinational mining company. MCM plc is engaged in the mining of copper in the Luapula province of Zambia. The statement of profit or loss for the year ended 31 December 2018 is provided below:

	K
Revenue (note 1)	22,600,400
Cost of sales (note 2)	<u>(11,700,000)</u>
Gross profit	10,900,400
Operating expenses (note 3)	<u>(3,500,200)</u>
Profit from operations	7,400,200
Finance costs (note 4)	(2,100,000)
Other income (note 5)	<u>500,000</u>
Profit before tax	5,800,200
Income tax expense (note 6)	<u>(2,320,080)</u>
Profit for the year	<u>3,480,120</u>

**The following additional information is available:**

**NOTE:**

1. The figure for revenue represents the gross sales of copper. The average copper price in the tax year 2018 was \$4,700 per metric tonne as quoted by the London Metal Exchange (LME). Mineral royalty tax paid during the year has not been accounted for in the statement of profit or loss.
2. Cost of sales includes depreciation charge on tangible non-current assets amounting to K1,960,250 and amortization expenses on intangible assets amounting to K1,050,400.
3. Operating expenses include construction of community school at a cost of K1,060,000, construction of mine road within the mine site amounting to K870,000, donation to political party amounting to K130,700 and audit fees amounting to K300,000. The remainder consists of revenue expenses which are allowable for tax purposes.
4. Finance costs consist of interest on loan. The loan was obtained from another mining company which is not related to MCM plc. The debt to equity ratio of MCM plc is 5: 1.
5. Included in other income is profit on sale of drilling plant amounting to K280,000 and royalties amounting to K220,000 (gross). Withholding tax has already been deducted at source.
6. The income tax expense in the statement of profit or loss represents the provisional income tax paid by the company during the tax year 2018.
7. The income tax values of non-current assets as at 1 January 2018 were as follows:

Drilling plant	K150,000
Haulage vehicles	K1,250,000

The drilling plant was acquired in 2015 at a cost of K600,000. This plant was sold in the tax year 2018 for proceeds of K400,000 making a profit of K280,000 (see note 5 above). The haulage vehicles were acquired in the tax year 2016 at a cost of K2,500,000.

The company acquired the following assets during the tax year 2018:

Range Rover car (3200 cc)	K650,000
Toyota Prado car (3100 cc)	K400,000
Smelter equipment	K1,100,000

The Range Rover and the Toyota Prado cars are used by the managing director and chief finance officer respectively on a personal-to-holder basis.

8. The company has employed ten (10) differently abled persons on full time basis who are registered with Zambia Centre for Persons Living with Disabilities. The company has accommodated them in company owned houses for which they pay no rent. The total emoluments paid by the company to these disabled employees amounted to K500,000 included and is in the operating expenses.

**Required:**

- (a) Calculate the adjusted mining profit for the tax year 2018. (19 marks)  
(b) Calculate the total income tax payable by the company for the tax year 2018. (6 marks)

**[Total: 25 Marks]**

**QUESTION TWO**

**For the purposes of this question, assume that today's date is 31 December 2018 and that the tax rates for the tax year 2018 apply throughout.**

Gold Bank Plc has been in business for many years, and has always prepared accounts for years ending on 31 March. On 1 October 2017, Diamond Bank Plc international, a multinational bank which is resident in foreign country acquired 100% of the equity of Gold Bank Plc. As a result of its acquisition, Gold bank changed its accounting period to align its accounting period with that of the parent. Therefore after preparing the accounts for the year ended 31 March 2017, the company prepared the next accounts on 30 September 2018 and will prepare accounts annually thereafter.

Gold Bank Plc made a final taxable profit of K1, 220,000 for the year ended 31 March 2017.

The statement of profit or loss of Gold Bank Plc for the period from 1 April 2017 to 30 September 2018 shows a net profit as per accounts of K4,937,300 which was arrived at after accounting for the following items:

- (1) Irrecoverable loans losses written of amounting to K950,000
- (2) An increase in general provision against loan losses of K460,000
- (3) Increase in specific provision against loan losses of K80,000

- (4) Loan losses previously written off recovered during the period of K350,000
- (5) Depreciation of assets of K145,000
- (6) Profit on disposal of office furniture of K12,400
- (7) Trading gains of K160,000 out of which K50,000 were unrealised trading gains and the remaining K110,000 were realised trading gains.
- (8) Rental income of K250,000 (gross)
- (9) General allowable business expenses of K1,450,000

**Other information**

Gold Bank plc had the following transactions in capital assets during the period:

- (1) On 10 April 2017, Gold Bank Plc completed the construction of new central administration offices at a cost of K420,000 (VAT exclusive) which were brought into use immediately.
- (2) On 16 June 2017, Gold Bank Plc acquired office equipment at a cost of K139,200 inclusive of Value Added Tax.
- (3) On 1 July 2018, Gold Bank Plc purchased a motor car to be used as pool car, with a cylinder capacity of 2,000cc at a VAT inclusive cost of K232,000.
- (4) On 1 September 2018, the company acquired a motor van with cylinder capacity of 3000cc, at a VAT inclusive cost of K174,000, to be used wholly and exclusively for business purposes.
- (5) The only assets qualifying for capital allowances held by the Gold Bank Plc on 1 April 2017 was office furniture which was acquired at a VAT inclusive cost of K104,400 in November 2016. Following its acquisition by the Diamond Bank Plc, the office furniture became surplus to the requirement of the Gold Bank Plc and was therefore sold on 5 November 2017 for VAT inclusive proceeds of K81,200.

**Required:**

- (a) In respect of the period from 1 April 2017 to 30 September 2018:
  - (i) Compute the tax adjusted profits before capital allowances. (3 marks)
  - (ii) Determine the tax years in which the profits generated during the period will be assessed to income tax and explain how the tax adjusted profits before capital allowances you have computed in (a) (i) above, will be dealt with in computing the final taxable profit for each relevant tax year. (6 marks)
  - (iii) Compute the final taxable profits after capital allowances for each relevant tax year. (13 marks)

- (b) Explain what is meant by overlap profits and calculate the amount of overlap profits arising on the change of the accounting date in (a) above. (3 marks)

**[Total: 25 Marks]**

### **QUESTION THREE**

- (a) Acquisition of non-current assets can be financed by outright purchase, hire purchase and leasing. Each of the options has taxation implications.

**Required:**

Explain the income tax and value added tax implications of financing the purchase of non-current assets using the following options:

- (i) Hire purchase (3 marks)  
(ii) Outright purchase (2 marks)

- (b) Waterproof Ltd is a VAT registered Zambian resident company which manufactures plastic water tanks. The directors of the company intends to buy manufacturing equipment on 1 January 2018 at a cost of K458,200 (VAT inclusive). The directors now wish to know the taxation implications of the intended following finance options:

- (i) Obtain a loan of K458,200 at an interest rate of 22% per annum from a Zambian bank. The loan will then be used to purchase the equipment outright.
- (ii) Purchase the equipment under a finance lease whose terms requires Waterproof Ltd to pay a deposit of K100,000 followed by five K82,386 annual lease rentals whose implicit interest is 15% per annum.
- (iii) Purchase the equipment under an operating lease. The terms of the lease are that Waterproof Ltd will be required to pay annual lease rentals of K69,600 (VAT inclusive) for five years.
- (iv) Issue of 2000 K1 ordinary shares for K229.1 each. The proceeds of the issue will then be used to purchase the equipment outright. The share issue costs are expected to be K15,000.

**Required:**

Advise the directors of Waterproof Ltd, using appropriate calculations, of the income tax and value added tax implications of each of the above options.

(13 marks)

- (c) Jojo, a sole trader, imported a 1900 cc Toyota Allion car for exclusive use in his business on 23 January 2018. The car was manufactured in Japan in January 2016. The cost of the car was \$2,760 (free on board). Jojo incurred insurance costs of \$500, transportation costs of \$800 and other incidental costs of \$250 up to the Nakonde border post. Other incidental costs incurred in transporting the vehicle from Nakonde to Monze amounted to \$1,500.

At the date of entry into Zambia, the exchange rate provided by the Bank of Zambia and approved by the Commissioner General was K9.70 per US\$1.

**Required:**

Calculate the total import taxes paid by Jojo on the importation of the car.

(7 marks)

**[Total: 25 Marks]**

**QUESTION FOUR**

Nkonde has been a sole trader for many years now running the famous Nkonde Farms in Chipata. He prepares accounts to 31 December each year and his annual turnover has always exceeded K800,000. Nkonde has always involved his son Chikonde, in running the business, as an employee, paying him an annual salary of K144,000. Nkonde's own annual salary is K360,000.

On 1 July 2018, Nkonde decided to start running the farming business as a partnership after taking his son Chikonde, into the business as a partner. Nkonde will continue preparing accounts to 31 December each year. The partnership agreement provided for annual partnership salaries of K420,000 for Nkonde and K180,000 for Chikonde. The balance of profits or losses are to be shared between Nkonde and Chikonde in the ratio 7:3 respectively.

The summarised statement of profit or loss for the year ended 31 December 2018 is presented below:

	Note	K	K
Gross profit			1,626,080
Other income:			
Profit on sale of tractor		6,500	
Discount received		<u>200</u>	
			<u>6,700</u>
			1,632,780
<i>Expenses</i>			
Entertainment expenses	(1)	17,000	
Professional fees	(2)	84,000	
Salaries and wages	(3)	970,400	
General expenses	(4)	<u>65,100</u>	
			<u>(1,136,500)</u>
Net profit			<u><u>496,280</u></u>

**Note 1: Entertainment expenses:**

	K
Entertaining customers	3,100
Birthday party for Nkonde's daughter	4,900
Gifts of Nkonde Farm branded milk, to customers worth K60 each	6,000
Gifts of vegetables worth K30 per customer	<u>3,000</u>
	<u><u>17,000</u></u>



**Note 2: Professional fees**

	K
Accountancy services	18,600
Subscriptions to Farmer's Co-operative Society	5,400
Alimony payments to his former wife	24,000
Legal fees in connection with defending title to farm land	14,300
Legal fees in connection with the drafting the partnership agreement	8,200
Fees in connection with acquisition of new lease of farm land	<u>13,500</u>
	<u>84,000</u>

**Note 3: Salaries and wages**

	K
Nkonde's salary	392,000
Chikonde's salary	162,000
Farm workers salaries and wages	<u>416,400</u>
	<u>970,400</u>

Other employees in the business are generally entitled to a similar level of remuneration as that of Chikonde.

**Note 4: General expenses**

	K
Discounts allowed	1,120
Trade debts written off	6,700
Insurance	8,300
Depreciation	21,200
Motor vehicle running expenses	11,400
Miscellaneous allowable expenses	<u>16,380</u>
	<u>65,100</u>

The motor vehicle running expenses relate to a motor car which is partly used by Nkonde for private purposes. It has been agreed with the Commissioner General that the business use of the vehicle is 20%.

**Note 5: Drawings**

During the year Nkonde withdrew farm produce with a cost of K10,500 from the business for family use without making any entries in the statement of profit or loss shown above. He makes a mark-up of 20% on all farm produce.

**Note 6: Implements, plant and equipment**

At 1 January 2018, implements, plant and machinery qualifying for capital allowances included the following:

Asset	Income Tax Value at 1 January 2018		Original cost
	K		
Delivery Truck	115,000		230,000
Motor Car	54,000		90,000

The following expenditure was incurred during the year:

	K
Dwelling houses for farm employees (each unit costing K45,000)	450,000
Farm implements	26,000
Tractor	45,000
Development expenditure on a new banana plantation	22,000

**Required:**

- (a) Calculate the capital allowances for the year 2018 (6 marks)
- (a) Calculate the tax adjusted business profit for the year 2018 (7 marks)
- (c) Calculate the amount of income tax payable by Nkonde and Chikonde for the tax year 2018. (12 marks)

**[Total: 25 Marks]**

**END OF PAPER**

### D3: BUSINESS TAXATION SOLUTIONS

#### SOLUTION ONE

##### (a) Mansa Copper Mines plc

##### Adjusted mining profit for the tax year 2018

	K	K
Profit before tax		5,800,200
Add:		
Depreciation	1,960,250	
Amortisation	1,050,400	
Construction of community school	1,060,000	
Construction of mine road	870,000	
Donation to political party	130,700	
Finance costs: K2,100,000 x 2/5	840,000	
Personal-to-holder cars:		
Range rover car	40,000	
Toyota prado car	40,000	
Free residential accommodation: (K500,000 x30%)	<u>150,000</u>	
		<u>6,141,350</u>
		11,941,550
Less:		
Profit on disposal	280,000	
Royalties	220,000	
Mineral royalty tax (K22,600,400 x 5%)	1,130,020	
Capital allowances (w1)	1,342,500	
Differently abled persons (K1,000 x 10)	<u>10,000</u>	
		<u>(2,982,520)</u>
Adjusted mining profit		<u>8,959,030</u>

##### Workings

##### Capital allowances

	K
Drilling plant : K150,000 – K400,000) (balancing charge)	(250,000)
Haulage vehicles: K2,500,000 x 25%	625,000
Range Rover car: K650,000 x 20%	130,000
Toyota Prado car: K400,000 x 20%	80,000
Smelter equipment: K1,100,000 x 25%	275,000
Community school: K1,060,000 x 25%	265,000
Mine road: K870,000 x 25%	<u>217,500</u>
Total capital allowances	<u>1,342,500</u>

##### (b) Mansa Copper Mines Plc

##### Income tax payable for the tax year 2018

	K
Adjusted mining profit	8,959,030
Investment income	
Royalties	<u>220,000</u>
Total taxable income	<u>9,179,030</u>

Income tax	
Mining profits: K8,959,030 x 30%	2,687,709
Non-mining income: K220,000 x 35%	<u>77,000</u>
Income tax liability	2,764,709
Less:	
Provisional income tax paid	(2,320,080)
WHT-Royalties: K220,000 x 15%	<u>(33,000)</u>
	411,629
Mineral royalty tax: K22,600,400 x 5%	<u>1,130,020</u>
Total tax payable	<u><u>1,541,649</u></u>

## SOLUTION TWO

(a) (i) COMPUTATION OF TAXABLE PROFITS BEFORE CAPITAL ALLOWANCES FOR 2018

	K	K
Profit for the period		4,937,300
Add		
Increase in general provision for loan losses	460,000	
Depreciation	<u>145,000</u>	
		<u>605,000</u>
		5,542,300
Less:		
Unrealised trading gains	50,000	
Profit on disposal of office furniture	12,400	
Rental income	<u>250,000</u>	
		<u>(312,400)</u>
Taxable profit before capital allowances		<u><u>5,229,900</u></u>

- (ii) Gold Bank Plc has always prepared its accounts to a date falling between 1 January and 31 March, inclusive in the year. So the preceding year basis has always applied. And following the change of accounting date to 30 September, the basis of assessment changes to the current year basis.

For the tax year 2016, the basis period is the year ended 31 March 2017 and for the tax year 2018, the basis period is the 12 months ended 30 September 2017 which is the new accounting date. But this accounting date does not exist and therefore the profits adjusted for tax purposes but before capital allowances for 18 months to 30 September 2018 shall be expanded to equal profits for 24 months. The expanded profits will then be shared between the two tax years, 2017 and 2018.

This will be done as follows:

$$\begin{aligned} \text{Expanded taxable profits} &= \text{K}5,229,900 \times 24/18 \\ &= \underline{\underline{\text{K}6,973,200}} \end{aligned}$$

$$\begin{aligned} \text{Profit chargeable for tax year 2017} &= \text{K6,973,200} \times 12/24 \\ &= \underline{\text{K3,486,600}} \end{aligned}$$

$$\begin{aligned} \text{Profit chargeable for tax year 2018} &= \text{K6,973,200} \times 12/24 \\ &= \underline{\text{K3,486,600}} \end{aligned}$$

(iii) The final assessments for all the relevant tax years are as follows:

Tax year	Basis period	Taxable Profit before capital allowances	Capital allowance	Final Taxable profit
		K	K	K
2016	y/e 31 March 2016	1,220,000	-	1,220,000
2017	y/e 30 September 2017	3,486,600	(60,900)	3,425,700
2018	y/e 30 September 2018	3,486,600	(97,300)	3,389,300

#### WORKINGS

##### (1) COMPUTATION OF CAPITAL ALLOWANCES

	K	K
Year ended 30 Sept 2017		
<u>Office furniture</u>		
Wear and tear allowance (K104,400 x 25/29) x 25%		22,500
<u>Administration buildings</u>		
Wear and tear allowance (K420,000 x 2%)		8,400
<u>Office equipment</u>		
Wear and tear allowance (K139,200 x 25/29) x 25%		<u>30,000</u>
Total allowances		<u>60,900</u>

##### Year ended 30 September 2018

<u>Office furniture</u>		
ITV B/f [K104,400 x 25/29 = K90,000 - ( 90,000 x 25% x 2)]	45,000	
Proceed (K81,200 x 25/29)	<u>70,000</u>	
Balancing charge		(25,000)
<u>Administration buildings</u>		
Wear and tear allowance (K420,000 x 2%)		8,400
<u>Office equipment</u>		
Wear and tear allowance (K139,200 x 25/29) x 25%		30,000
<u>Pool Car</u>		
Wear and tear allowance		

(K232,000 x 20%)	46,400
<u>Motor Van</u>	
Wear and tear allowance	
(K174,000 x 25/29) x 25%	<u>37,500</u>
	<u>97,300</u>

(b) Overlap profits are profits which are assessed in more than one tax year.

There are overlap profits arising as profits for the period from 1 April 2017 to 30 September 2018 have been expanded to 24 months when they were only for 18 months. The amount of overlap profit is:

$$\begin{aligned} \text{Overlap profit for period} &= \text{K6,973,200} - \text{K5,229,900} \\ &= \underline{\underline{\text{K1,743,300}}} \end{aligned}$$

### SOLUTION THREE

(a) The following are the taxation implications:

- (i) Hire purchase
  1. Hire purchase interest (difference between the cash price of the asset and total repayments) is an allowable deduction when computing the taxable business profits.
  2. Capital allowances are claimable on the cash price of the qualifying asset.
  3. Value added tax on the cash price of the asset is claimable provided the VAT is one which is recoverable.
- (ii) Outright purchase
  1. Capital allowances are claimable on the cost of the qualifying asset
  2. Value added tax is claimable on the cost of the asset provided the VAT is one which is recoverable.

(b) Taxation implications of the financing options

- (i) Loan
  1. Interest cost of K100,804 ( $\text{K458,200} \times 22\%$ ) per annum will not be an allowable expense when computing the taxable business profit of the company because the loan was used to finance the purchase of a non-current asset.
  2. Capital allowances at a rate of 50% will be claimable on the VAT exclusive cost of the equipment. i.e  $\text{K458,200} \times 25/29 \times 50\% = \text{K197,500}$ .
  3. The input VAT incurred on the purchase of the equipment will be claimable. i.e  $\text{K458,200} \times 4/29 = \text{K63,200}$ .
- (ii) Finance lease
  1. Finance lease interest will be an allowable expense when computing the taxable business profits of the company.
  2. Capital allowances on the VAT exclusive cost of the asset will be claimable at 50%. i.e  $\text{K458,200} \times 25/29 \times 50\% = \text{K197,500}$ .

3. The input VAT incurred on the purchase of the equipment will be claimable. i.e  $K458,200 \times 4/29 = K63,200$ .

(iii) Operating lease

1. The operating lease rentals exclusive of VAT will be allowed when computing the taxable business profits of the company i.e  $K69,600 \times 25/29 = K60,000$ .
2. No capital allowances will be claimable by the company on the leased equipment.
3. The input VAT on operating lease rentals will be claimed by the company. i.e  $K69,600 \times 4/29 = K9,600$ .

(iv) Issue of ordinary shares

1. The share issue costs will not be allowed when computing the taxable business profits of the company.
2. Dividends payable on the shares are not allowable expenses when computing the taxable business profits.
3. Capital allowances will be claimed on the VAT exclusive cost of the asset at a rate of 50% i.e  $K458,200 \times 25/29 \times 50\% = K197,500$ .
4. The input VAT incurred on the purchase of the equipment will be claimed. i.e  $K458,200 \times 4/29 = K63,200$ .

(c) **Jojo**

Value for duty purposes	\$
Cost	2,760
Insurance	500
Freight charges	800
Other incidental costs	<u>250</u>
	4,310
Exchange rate	<u>K9.70</u>
VDP in Zambian kwacha	<u>41,807</u>

	<b>Value of the vehicle</b>	<b>Import taxes</b>
Value for customs duty	41,807	
Customs duty - Fixed	<u>16,545</u>	16,545
	58,352	
Excise duty - Fixed	<u>21,508</u>	21,508
	79,860	
Import VAT @16% of k79,860	<u>12,778</u>	12,778
	<u>92,638</u>	
Total import taxes		<u>50,831</u>

## SOLUTION FOUR

### a) COMPUTATION OF CAPITAL ALLOWANCES

Year ended 30 Sept 2018	K	K
<u>Delivery truck</u>		
Wear and tear allowance (K230,000 x 25%)		57,500
<u>Motor car</u>		
Wear and tear allowance (K90,000 x 20%) x 25%		4,500
<u>Dwelling Houses</u>		
Wear and tear allowance (K20,000 x 10)		200,000
<u>Farm implements</u>		
Wear and tear allowance (K26,000 x 100%)		26,000
<u>Banana plantation</u>		
Wear and tear allowance (K22,000 x 10%)		2,200
<u>Tractor</u>		
Wear and tear allowance (K45,000 X 100%)		<u>45,000</u>
		<u><u>335,200</u></u>

### b) COMPUTATION OF TAXABLE BUSINESS PROFIT

	K	K
Net profit as per accounts		496,280
Add		
Entertaining farm workers	3,100	
Birthday party for Nkonde's daughter	4,900	
Gifts of vegetables	3,000	
Alimony to former wife	24,000	
Legal fees in connection with new lease	13,500	
Nkonde's salary	392,000	
Chikonde's Salary	162,000	
Depreciation	21,200	
Motor vehicle running expenses (K11,400 x 80%)	9,120	
Drawings (K10,500 x 120/100)	<u>12,600</u>	
		<u>645,420</u>
		1,141,700
Less: Capital allowances (W)	335,200	
Profit on sale of tractor	<u>6,500</u>	
		<u>(341,700)</u>
		<u><u>800,000</u></u>



c) DIVISION OF PROFITS

	Total K	Nkonde K	Chikonde K
1.01.2018- 30.06.2018			
Tax adjusted profit (K800,000 x 6/12)	400,000	400,000	-
Less			
Chikonde's salary (K144,000 x 6 /12)	<u>(72,000)</u>	<u>(72,000)</u>	-
Taxable Profit	<u>328,000</u>	<u>328,000</u>	<u>-</u>
1.07.2018 -31.12.2018			
Salaries (K420,000/K180,000 x 6/12)	300,000	210,000	90,000
Balance 7:3	<u>100,000</u>	<u>70,000</u>	<u>30,000</u>
Profit (K800,000 x 6/12)	<u>400,000</u>	<u>280,000</u>	<u>120,000</u>
Total profits allocation	<u>728,000</u>	<u>608,000</u>	<u>120,000</u>

NKONDE'S

PERSONAL INCOME TAX COMPUTATION FOR THE TAX YEAR 2018

	K
Taxable Business profits	<u>608,000</u>
<u>Income Tax</u>	
K39,600 x 0%	0
K568,400 x 10%	<u>56,840</u>
Income tax payable	<u>56,840</u>

CHIKONDE'S

PERSONAL INCOME TAX COMPUTATION FOR THE TAX YEAR 2018

	Total K	Non farming income K	Farming income K
Employment income	72,000	72,000	-
Farming profits	<u>120,000</u>	-	<u>120,000</u>
Taxable income	<u>192,000</u>	<u>72,000</u>	<u>120,000</u>
<u>Income Tax on non-farming income</u>			
K39,600 x 0%		0	
K9,600 x 25%		2,400	
K22,800 x 30%		<u>6,840</u>	
			9,240
<u>Income Tax on farming profits</u>			
K120,000 x10%			<u>12,000</u>
			<u>21,240</u>

**END OF SOLUTIONS**



TAXATION PROGRAMME EXAMINATIONS

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DIPLOMA LEVEL

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D4 – PERSONAL TAXATION

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TUESDAY 12 JUNE 2018

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

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INSTRUCTIONS TO CANDIDATES

1. You have fifteen (15) minutes reading. Use it to study the examination paper carefully so that you understand what to do in each question.
2. This question paper consists of **FOUR (4)** questions of twenty Five (25) marks each. You MUST attempt all the **FOUR (4)** 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. A Taxation table is provided on pages 2 and 3

## 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%

### 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%
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#### 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%
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#### Farming Allowances

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

## Presumptive Taxes

### Turnover Tax

<b>Monthly turnover</b>	<b>Turnover Tax per month</b>
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

### Turnover Tax per annum

<b>Annual turnover</b>	<b>Turnover Tax per annum</b>
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

<b>Seating capacity</b>	<b>Tax per annum</b>	<b>Tax per day</b>
	K	K
Less than 12 passengers and taxis	900	2.40
From 12 to 17 passengers	1,800	4.95
From 18 to 21 passengers	3,600	9.90
From 22 to 35 passengers	5,400	15.00
From 36 to 49 passengers	7,200	19.50
From 50 to 63 passengers	9,000	24.60
From 64 passengers and over	10,800	29.55

### 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 of Intellectual Property	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%

## **Attempt all FOUR (4) questions**

### **QUESTION ONE**

Kabunda has been employed at Eden Ltd, a private limited company on a three year renewable fixed term contract which commenced on 1 January 2017 at an annual salary of K330,000. On the day he joined the company he was granted an option to purchase 150,000 ordinary shares of the company (each with a nominal value of K1) for an exercise price of K4.50 per share, being the market price per share on that date, under an unapproved share option scheme. The grant was on condition that the options were only exercisable once he had been employed for one year, but he was required to hold the shares for at least 6 months before he sold them.

In the tax year 2018, Kabunda was entitled to a housing allowance of 15% of his basic salary and a lunch allowance of K2,000 per month.

Other benefits provided to him during the tax year 2018 included the following:

1. Shopping vouchers worth K3,500.
2. A 2200cc Toyota Corolla car on a personal to holder basis, which was acquired by the company two years ago at a cost of K220,000. The company paid him an annual fuel allowance of K6,000. He had private use of the car of 60%.
3. Payment of his annual golf club subscriptions of K1,500.
4. Payment of school fees for his school going children totalling K8,000.

On 1 January 2018, Kabunda exercised the 150,000 options when the share price on that date was determined to be K7.00 per share. On 1 August 2018, he sold the 50,000 shares out of the 150,000 shares for K8.50 per share being the market value of each share on that date.

Kabunda incurred the following expenses during the tax year 2018:

1. Donation of K1,000 to a Political Party.
2. Donations of K5,500 to approved public benefit organisations
3. House rentals of K3,000 per month.
4. Pension contributions to the National Pension Scheme Authority of K995 per month.
5. Pension contributions to a Private pension scheme of K1,500 per month.
6. Tax paid and deducted from his emoluments by his employer from his employment earnings the was K155,400 for the tax year 2018.

### **Other income**

Kabunda holds an investment in ordinary shares in a foreign company that is resident in a country called Bascovia. He received dividends equivalent to K9,600 during the tax year 2018 from the shares. The amount of K9,600 was net of Bascovian withholding tax at the rate of 36%. Kabunda also owns investment property that has been let out to Bascovian tenants over the last five years. He has always received monthly rentals equivalent to K10,800 in arrears

net of Bascovia withholding tax deducted at the rate of 10%. When computing the Zambian income tax payable, credit is available for any foreign tax paid in Bascovia.

**Required:**

- (a) Explain the taxation implications for Kabunda of:
  - (i) The exercise of the 150,000 share options on 1 January 2018. (2 marks)
  - (ii) The sale of 50,000 shares in Eden Ltd on 1 August 2018. (2 marks)
- (b) Explain how your answer in (a) above would have been different if the share option scheme was approved for tax purposes. (3 marks)
- (c) Explain the criteria that must be met for a share option scheme to be approved for tax purposes in Zambia. (7 marks)
- (d) Compute the income tax payable by Kabunda for the tax year 2018. (11 marks)

**[Total: 25 marks]**

**QUESTION TWO**

**For the purpose of this question, you should assume that today's date is 15 November 2018 and the earnings threshold for the purposes of NAPSA contributions should be taken to be K238,800 per annum.**

Mervin motors Ltd is a private company engaged in the assembly of motor cycles and supply of spare parts for a variety of motor vehicles. The company was set up seven years ago by two entrepreneurs, Mwanza and Katebe. The share capital of the company is owned equally by the two entrepreneurs. Mwanza and Katebe have always managed their business jointly as directors and drawn annual directors emoluments amounting to K200,000 each from the profits of the company. NAPSA contributions have always been contributed by Mwanza and Katebe at the rate of 5% of their earnings. The company has also always contributed 5% of each individual's earnings as employer's NAPSA contributions.

The company has experienced success over the years. In the tax year 2018, the company is expected to report a final taxable profit of K1,865,200. In addition to their emoluments, Mwanza and Katebe would like to draw a further amount of K180,000 each from the business. The additional K180,000 that would be drawn by each director would take the form of either a cash bonus payment or cash dividends. The company's adjusted business profit of K1,865,200 is after directors emoluments but before the additional K180,000 to be drawn by each director.

Mwanza and Katebe would like to know what the taxation implications of the additional K180,000 would be for them as individuals and for the company.

**Required:**

- (a) Ignoring the additional K180,000, calculate the income tax payable by Mwanza and Katebe for the tax year 2018. (5 marks)
- (b) Explain the income tax and NAPSA implications for Mwanza and Katebe for the tax year 2018, if they draw K180,000 each as a:
- (i) Cash bonus payment. (7 marks)
- (ii) Cash dividend payment. (3 marks)

Your explanation should be supported by a computation of additional income tax payable or tax savings and NAPSA contributions where appropriate.

- (c) Explain the income tax and NAPSA implications for the company for the tax year 2018 if Mwanza and Katebe each draw K180,000 as a:
- (i) Cash bonus payment. (8 marks)
- (ii) Cash dividend payment. (2 marks)

Your explanation should be supported by a computation of additional company income tax payable or tax savings and NAPSA contributions as appropriate.

**[Total: 25 marks]**

**QUESTION THREE**

**Assume today's date is 18 December 2017 and the earnings threshold for the purposes of NAPSA contributions should be taken to be K238,800 per annum.**

ABC plc is a farming company engaged in poultry and growing of crops mainly used to manufacture stock feed. As part of its strategic plan, the company wishes to diversify its operations and, therefore, intends to venture into aquaculture (fish farming). The company would need a consultant to guide them on the development of fish ponds and dams. The company, therefore, wishes to hire the services of Angelina Hamoonga, a fish farming consultant on a one and half year (18 months) contract to supervise the development of fish ponds and dams, either as an employee of ABC plc or on a self-employed basis. Regardless of whether Angelina is engaged as an employee of ABC plc or as a self-employed contractor, the engagement will commence on 1 January 2018 and end on 30 June 2019.

If Angelina is employed, the following will apply:

- (1) Her monthly basic salary will be K74,000.

- (2) She will drive her own motor car which she will acquire on 1 January 2018 at a cost of K200,000. Her total mileage for the tax year 2018 is expected to be 15,000 kilometers out of which 3,000 kilometers will be for personal trips. ABC plc will pay Angelina a fuel allowance amounting to K12,750 per month. Motor car running expenses during the tax year 2018, will amount to K9,550 per month which all will be paid by Angelina.
- (3) ABC plc will buy equipment on 1 January 2018, at a cost of K75,000. This equipment will be used by Angelina in designing fish ponds.
- (4) She will be required to contribute 5% of her earnings as employee's NAPSA contributions and ABC plc will also contribute 5% of Angelina's earnings as employer's NAPSA contributions.
- (5) Angelina will be assisted by two other aquaculture staffs who will be employed by ABC plc on 1 January 2018 at a salary of K54,000 per month each.

If Angelina is engaged on a self-employed basis, the following will apply:

- (1) She will charge ABC plc an all-inclusive price of K175,000 per month for the services to be performed.
- (2) She will use her own motor car which she will acquire on 1 January 2018 at a cost of K200,000 in the performance of her duties. Her total mileage is expected to be 15,000 kilometers out which 3,000 kilometers will be for her personal trips. The motor car running expenses are expected to be K9,550 per month.
- (3) Angelina will purchase equipment on 1 January 2018 at a cost of K75,000 which she will use to design the fish ponds.
- (4) She will employ two (2) aquaculture consultants to assist her in the performance of the duties over a contract period of 18 months. The total salary payable to these consultants is expected to be K54,000 per month. Each of these consultants will be required to contribute 5% of their earnings as NAPSA contributions. Angelina will also be required to contribute 5% of each employee's earnings as employer's NAPSA contributions.
- (5) Other operating expenses to be incurred by Angelina wholly and exclusively for the contract with ABC plc are expected to be K26,700 per month.

**Required:**

- (a) Compute the income tax payable by Angelina, for the tax year 2018 if she is engaged by ABC plc as an employee. (7 marks)
- (b) Explain how Angelina will be assessed to income tax and compute the income tax payable for the tax year 2018, if she is engaged by ABC plc as a self-employed contractor. (11 marks)



- (c) Advise Angelina on whether it will be beneficial from a taxation point of view to be engaged by ABC plc as an employee or as a self-employed contractor. Your answer should be supported by a computation of income net of income tax, NAPSA contributions and other relevant expenses under each option.

(7 marks)

**[Total: 25 marks]**

#### **QUESTION FOUR**

- (a) In an attempt to broaden the tax base, the Zambian Government, through the Zambia Revenue Authority, introduced presumptive taxes for transporters.

##### **Required:**

- (i) Explain the types of persons who are required to pay presumptive taxes for transporters and state the types of persons who are exempt from presumptive taxes for transporters. (4 marks)
- (ii) Explain five advantages that presumptive taxes for public passenger transporters have over the regular income tax system. (5 marks)
- (iii) State three weaknesses generally associated with presumptive taxation for public passenger transporters. (3 marks)
- (b) Assume that today's date is 1 February 2018, Choolwe wishes to start running a public passenger transportation business on 1 March 2018. He will buy three Toyota Hiace buses, each with a seating capacity of 16 persons including the driver, at a cost of K90,000 each. The buses will be used for public passenger transportation and will earn K500 per day each, for six working days per week, for four weeks per month, up to the end of the tax year.

Choolwe will employ three drivers. The driver's monthly salaries will be K3,000 each. The bus running expenses will average K2,000 for each bus per month. Each driver will make a NAPSA contribution of 5% of their salary and Choolwe will also contribute 5% of each driver's salary to NAPSA as employer's contribution. He will incur other expenses wholly and exclusively for the purposes of the transportation business of K1,800 per month.

Choolwe's other income in tax year 2018, will comprise investment income earned from the following sources:

	K
Fixed deposit interest from Bank XY Ltd (gross)	10,000
Interest from government bonds (net)	12,750
Income from letting of property (net)	36,000

Dividends from Kwachi plc a LuSE Listed Company (gross)	18,000
Dividends for Zedcom a private Ltd company (net)	17,000

**Required:**

- (i) Explain how Choolwe will be assessed to income tax on the income from the transportation business in the tax year 2018, commenting on the tax treatment of the expenses he will incur wholly and exclusively for the purposes of running the business and computing the total tax that will be paid on the income he will generate from this business in the tax year 2018.  
(7 marks)
- (ii) Explain how the investment income will be assessed to tax and compute the total amount tax the on the investment income.  
(6 marks)

**[Total: 25 marks]**

**END OF PAPER**

## D4: PERSONAL TAXATION SOLUTION

### SOLUTION ONE

- (a) (i) Tax implications of the exercise of the options

On the exercise of share options by an employee from a share option scheme run by an employer in scheme that is not approved for tax purposes, the price paid is compared with the open market value at that time, and if less, the difference is charged to income tax.

In Kabunda's case on exercise, the difference between the market value of the shares and the price paid for the shares will be taxed as income.

Therefore, K375,000 [ $150,000 \times (K7.00 - K4.50)$ ] will be taxed as income on as income on Kabunda.

- (ii) Tax implication of the sale of the shares

On the sale of shares acquired from a share option scheme that is not approved for tax purposes in an unlisted company, property transfer tax is payable on the realised value of the shares sold. The shares have a realised value for property transfer tax purposes that is equal to the higher of their nominal value and the open market value.

In Kabunda's case, the amount of property transfer tax arising on the sale of the shares is:

$$(50,000 \times K8.50) \times 5\% = K21,250$$

- (b) Tax implications for Kabunda if the share option scheme was approved

Any gain arising to an individual on allotment of shares under an approved share option scheme is exempt from income tax. The gain or benefit arises when the market value per share at the time when the option is being exercised exceed the exercise price.

Therefore, in Kabunda's case the gain arising on exercise of the options of K375,000 [ $150,000 \times (K7.00 - K4.50)$ ] would have been exempt from income tax if the share option scheme was approved for tax purposes.

Additionally property transfer tax would not have arisen on the subsequent sale of 50,000 shares on 1 August 2018.

- (c) For the Commissioner General to approve a share option scheme, the following requirements must be met:

1. The scheme must be established in Zambia and the employer must be carrying on business wholly or partly in Zambia.
2. The scheme should provide for the participation of all eligible employees (including directors).
3. An employee participating in the scheme should not acquire more than one fifth (20%) of the shares to be issued under the scheme.

4. Only ordinary shares of the company may participate in the scheme.
5. The scheme entitles an employee to acquire a set number of shares at a fixed price.
6. The employee must be restricted to a set period of time to use an option to buy shares.
7. The employees must be citizens or permanent residents of Zambia regardless of where they perform their duties.

(d) KABUNDA'S  
PERSONAL INCOME TAX COMPUTATION FOR THE TAX YEAR 2018

	K	K
<u>Income from Zambian Sources</u>		
Salary		330,000
Housing allowance (K330,000 x15%)		49,500
Lunch allowance (K2,000 x 12)		24,000
Shopping vouchers		3,500
Fuel allowance		6,000
School fees		8,000
Golf club subscriptions		1,500
Income from Share options (K7.00 – K4.50) x 150,000		<u>375,000</u>
Total emoluments		797,500
Less allowable deductions		
Donations to public benefit organisations		<u>(5,500)</u>
		792,000
<u>Income from foreign Sources</u>		
Dividend income (K9,600 x 100/64)		<u>15,000</u>
		<u><u>807,000</u></u>

Tax computation:

Income	Tax rate %	Tax amount	
1 <sup>st</sup> 39,600	-	-	
2 <sup>nd</sup> 9,600	25	2,400	
3 <sup>rd</sup> 25,200	30	7,560	
Balance <u>732,600</u>	37.5	274,725	
807,000		284,685	
Less PAYE		(155,4000)	
Less DTR on dividends from foreign sources		(5,292)	
Income tax payable		123,993	

**WORKINGS:**

Double taxation relief on the dividends from foreign sources:

This will be the lower of:

- (1) The foreign tax paid on the dividends:

$$K15,000 \times 36\% = K5,400; \text{ and}$$

- (2) The Zambian Tax Charge computed as:

$$\left( \frac{K15,000}{K807,000} \right) \times K284,685$$

$$= K5,292$$

DTR will therefore be K5,292 being the lower amount.

**SOLUTION TWO**

- (a) Mwanza and Katebe

Income tax payable for the tax year 2018

	Mwanza	Katebe
	K	K
Salary	200,000	200,000
Income Tax		
First K39,600 @0%	0	0
Next K9,600 @25%	2,400	2,400
Next K25,200 @30%	7,560	7,560
Balance K125,600 @37.5%	<u>47,100</u>	<u>47,100</u>
	<u>57,060</u>	<u>57,060</u>

- (b) The income tax and NAPSA implications of the additional K180,000 will be as follows:

- (i) Cash bonus payment.

(1) The bonus will be an additional taxable emolument for both Mwanza and Katebe. It will therefore be assessed as taxable emoluments at a rate of 37.5% because their existing income is above K74,400.

(2) The additional income tax payable on the bonus by Mwanza and Katebe will be:  
 $K180,000 \times 37.5\% = K67,500$  each.

(3) The bonus qualifies as earnings for the purposes of NAPSA contributions. Mwanza and Katebe will therefore be required to contribute NAPSA at 5% of the difference between their current earnings (K200,000) and the earnings threshold (K238,800).

- (4) The additional NAPSA contributions by each individual will be:  
 $(K238,800 - K200,000) \times 5\%$   
 $= K1,940$  each
- (5) The additional NAPSA contributions will not be an allowable deduction for tax purposes.
- (ii) Cash dividend payment
- (1) The dividends will be subjected to withholding tax at the rate of 15%. The withholding tax deducted at source is the final tax and, therefore, no further tax will be assessed on dividends.
- (2) The amount of withholding tax payable by each individual will amount to:  
 $K180,000 \times 15\% = K27,000$
- (3) NAPSA contributions will not be payable by both Mwanza and Katebe as dividends do not qualify as earnings for NAPSA purposes
- (c) The income tax and NAPSA implications for the company of the additional K180,000 will be as follows:
- (i) Cash bonus payment
- (1) A cash bonus payment will be an allowable deduction when computing taxable business profits. The company will therefore have tax savings.
- (2) The amount of income tax savings will amount to:  
 $K180,000 \times 2 \times 35\% = K126,000$
- (3) The company will be required to pay additional NAPSA contributions on behalf of Mwanza and Katebe as employer's NAPSA contributions. The amount of NAPSA contributions will be contributed on the difference between current earnings (K200,000) and earnings threshold (K238,800).
- (4) The amount of additional NAPSA contributions will be:  
 $K3,880 (K238,800 - K200,000) \times 5\%$  restricted to the threshold of K238,800.
- (5) The additional NAPSA contributions will be an allowable deduction when computing the taxable business of the company. This will result in a tax saving of K1,358 ( $K3,880 \times 35\%$ ).
- (ii) Cash dividend payment
- (1) The dividend payment will not be an allowable deduction when computing the taxable business profits for the company. Dividends will be paid out of profits already subjected to income tax.

- (2) NAPSA contributions will not be payable by the company as dividends do not attract NAPSA contributions because they do not qualify as earnings.

**SOLUTION THREE**

(a) Angelina

Income tax payable for the tax year 2018

	K	K
Salary K74,000 x 12		888,000
Fuel allowance (K12,750 x 12)		153,000
		<u>1,041,000</u>
Less:		
Motor car running expenses (K9,550 x 12 x 12,000/15,000)		(91,680)
Capital allowances (K200,000 x 20% x 12,000/15,000)		<u>(32,000)</u>
Taxable income		<u>917,320</u>
Income Tax		
First K39,600 @0%		0
Next K9,600 @25%		2,400
Next K25,200 @30%		7,560
Balance K842,920 @37.5%		<u>316,095</u>
Income tax payable		<u>326,055</u>

- (b) Angelina's annual earnings if she is engaged as a self-employed contractor will be K2,100,000 (K175,000 x 12 months). This means that she will be assessed to the normal income tax under self-assessment and provisional income tax as her annual earnings are more than K800,000.

ANGELINA

INCOME TAX PAYABLE FOR THE TAX YEAR 2018

	<b>K</b>	<b>K</b>
Revenue (K175,000 x 12)		2,100,000
Less		
motor car running expenses (K9,550 x 12 x 12,000/15,000)	91,680	
Salaries (K54,000 x 12)	648,000	
Employer's NAPSA (K238,800 x 2 x 5%)	23,880	
Other operating expenses (K26,700 x 12)	320,400	
Capital allowances:		
Motor car (K200,000 x 20% x 12,000/15,000)	32,000	
Equipment (K75,000 x 25%)	<u>18,750</u>	
		<u>(1,134,710)</u>
Taxable business profit		<u>965,290</u>
Computation		
First K39,600 @0%		0
Next K9,600 @25%		2,400
Next K25,200 @30%		7,560
Balance K890,890 @37.5%		<u>334,084</u>
Income tax payable		<u>344,044</u>

- (c) COMPUTATION OF NET INCOME IF ANGELINA IS:

	<b>Self-employed</b>	<b>An employee</b>
	K	K
Total earnings (income)	2,100,000	1,041,000
Less:		
Income tax payable	(344,044)	(326,055)
NAPSA contributions	(23,880)	(11,940)
Motor car running expenses (K9,550 x 12)	(114,600)	(114,600)
Employees' salaries	(648,000)	-
Other operating expenses	<u>(320,400)</u>	<u>-</u>
Net income	<u>649,076</u>	<u>588,405</u>

It will be beneficial for Angelina to be engaged as a self-employed contractor because this option gives a higher net income by K60,671 (K649,076 – K588,405).



## **SOLUTION FOUR**

- (a) (i) Presumptive taxes for transporters are chargeable on individuals and partnerships carrying on businesses of transportation of passengers for reward.

Transporters who are limited companies are exempt from presumptive tax as they have the capacity to comply fully with all the standard requirements under the income tax law.

- (ii) Advantages of Presumptive Taxes for transporters:

### **Simplified process**

The process of dealing with taxes has been simplified. There is no requirement to file returns, no requirement to keep proper business and accounting records and the taxes payable are predictable and therefore ease the cash flow planning process.

### **Cash flow friendly**

Since operators find it fairly easy to pay a whole range of fees on a daily basis, such as loading fees, because the amounts look small and do not seriously disrupt their daily cash flow position, the same principle of small regular payments of tax has been adopted in the presumptive tax approach.

The levies can be broken down into smaller amounts to be paid more regularly, for example, on a daily, monthly or even quarterly basis.

### **No need for professional consultancy services**

Paying the levies is as straightforward as paying loading fees or other fees currently in place. Therefore, there is very little intellectual or professional effort required. The driver and/or conductor makes arrangements for presumptive tax to be paid without involving the proprietor.

### **Equity**

As the system is made simpler, all transporters are expected to pay their part hence there are no 'free riders' as the case was before the introduction of presumptive tax. As presumptive tax is a levy, there is no longer a need to keep records for tax purposes and as such no audits will be conducted on a transporter's business. The only requirement will be for the transporter to pay his presumptive tax as stated in the law.

### **Allowance for break-downs**

The levies are only charged for vehicles that are on the road during the tax accounting period.

- (iii) Weakness of Presumptive Taxation

A system of presumptive taxation has the following weaknesses:

- (1) It may encourage profitable businesses not to maintain proper accounting records as such entities would be aware that taxation authorities would not at any time conduct any tax audits to determine whether they are liable to pay income tax in the normal way.
- (2) A system of presumptive taxation allows taxation authorities a great deal of discretion in estimating tax assessments. This may encourage collusion between the tax collectors and individuals seeking to have a lower tax assessment.
- (3) The taxes may be too high or too low for certain periods of time if they are not frequently adjusted to reflect changes in economic activity in the nation.

(b) (i) Tax implications

Choolwe is an individual carrying on businesses for the transportation of passengers for a reward and as such will be required to pay presumptive taxes for transporters. The amount of presumptive taxes payable will be fixed amounts based on the seating capacity of the motor vehicles used in the transportation business.

Choolwe will not be required to pay income tax on the profit generated by the transportation business. Therefore, there will be no tax implications in relation to the drivers' salaries, bus running expenses, employer's NAPSA contributions and other expenses he will incur wholly and exclusively for purposes of the transportation business, because it will not be necessary to compute taxable profits for the purposes of determining the amount of presumptive tax payable.

No capital allowances will be claimable on the cost of the buses.

The seating capacity of each bus is 15 passengers and the daily tax payable for each bus is K4.95.

Each bus will operate for 6 days per week for 4 weeks per month giving 24 days per month, starting on 1 March 2018. The total amount of presumptive tax payable on the three buses for the tax year 2018 will therefore be:

$$(K4.95 \times 24 \text{ days} \times 10 \text{ months}) \times 3 \text{ buses} = K3,564.$$

- (ii) Investment income is assessable under the withholding tax system where the tax is withheld at source. The amount of withholding tax paid at source is shown below:

	K
WHT on:	
Fixed deposit interest (K850 x 0%)	0
Interest from government bonds (K12,750 x 15/85)	22,50
Income from letting (K36,000 x 10/90)	4,000
Dividends from Kwacha Plc (K17,000 x 0%)	0
Dividends from Zedcom Ltd (K17,000 x 15/85)	<u>3,600</u>
Total	<u>7,600</u>

**END OF D4 SOLUTIONS**



TAXATION PROGRAMME EXAMINATIONS

DIPLOMA LEVEL

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D5: INTERNATIONAL TAXATION

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THURSDAY 14 JUNE 2018

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

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**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.
2. This question paper consists of **FOUR (4)** questions of Twenty Five (25) marks each. You must attempt all the **FOUR (4)** 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. A Taxation table is provided on pages 2, 3 and 4.

**Taxation table for paper D5 – International Taxation (June and December 2018 Examinations)**

**Income Tax**

**Standard personal income tax rates**

<b>Income band</b>	<b>Taxable amount</b>	<b>Rate</b>
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%

**Mineral Royalty**

**Mineral Royalty on Copper**

<b>Range of Norm Price</b>	<b>Mineral Royalty Rate</b>
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**

<b>Type of mineral</b>	<b>Mineral Royalty Rate</b>
Base Metals (Other than Copper)	5% on norm value
Energy and Industrial Minerals	5% on gross value
Gemstones	6% on gross value
Precious Metals	6% on 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%
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**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%
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**Farming Allowances**

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

**Presumptive Taxes****Turnover Tax****Monthly turnover**

K1to K4,200
K4,200.01to K8,300
K8,300.01 to K12,500
K12,500.01 to K16,500
K16,500.01 to K20,800
Above K20,800

**Turnover Tax per month**

3% of monthly turnover above K3,000
K225 per month+3% of monthly turnover above K4,200
K400 per month+3% of monthly turnover above K8,300
K575 per month+3% of monthly turnover above K12,500
K800 per month+3% of monthly turnover above K16,500
K1,025 per month+3% monthly of turnover above K20,800

**Annual turnover**

K1to K50,400
K50,400.01to K99,600
K99,600.01 to K150,000
K150,000.01 to K198,000
K198,000.01 to K249,600
Above K249,600

**Turnover Tax per annum**

3% of annual turnover above K36,000
K2,700 per annum+3% of annual turnover above K50,400
K4,800 per annum +3% of annual turnover above K99,600
K6,900 per annum+3% of annual turnover above K150,000
K9,600 per annum+3% of annual turnover above K198,000
K12,300 per annum +3% of annual of turnover above K249,600

**Presumptive Tax for Transporters****Seating capacity**

	<b>Tax per annum</b>	<b>Tax per day</b>
	K	K
From 64 passengers and over	10,800	29.60
From 50 to 63 passengers	9,000	24.70
From 36 to 49 passengers	7,200	19.70
From 22 to 35 passengers	5,400	14.80
From 18 to 21 passengers	3,600	10
From 12 to 17 passengers	1,800	5.0
Less than 12 passengers and taxis	900	2.50

**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%

Rate of Tax on Realised Value on a transfer of Intellectual Property 5%

### Value Added Tax

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

### Customs and Excise

#### Customs and Excise duties on used motor vehicles

	Aged 2 to 5 years		Aged over 5 years	
	Customs duty K	Excise duty K	Customs duty K	Excise duty K
<b>Motor vehicles for the transport of ten or more persons, including the driver</b>				
Sitting capacity of 10 but not exceeding 14 persons including the driver	17,778	22,223	8,889	11,112
Sitting capacity exceeding 14 but not exceeding 32 persons	38,924	0	13,840	0
Sitting capacity of 33 but not exceeding 44 persons	86,497	0	19,462	0
Sitting capacity exceeding 44 persons	108,121	0	43,248	0

	Aged 2 to 5 years		Aged over 5 years	
	Customs duty K	Excise duty K	Customs duty K	Excise duty K
<b>Motor cars and other motor vehicles principally designed for the transport of persons including station wagons and racing cars</b>				
<b>Sedans</b>				
cylinder capacity not exceeding 1000 cc	12,490	10,824	7,136	6,185
Cylinder capacity exceeding 1000 cc but not exceeding 1500 cc	16,058	13,917	8,564	7,422
Cylinder capacity exceeding 1500 cc but not exceeding 2500 cc	16,545	21,508	8,423	10,950
Cylinder capacity exceeding 2500 cc but not exceeding 3000 cc	18,049	23,463	10,528	13,687
Cylinder capacity exceeding 3000 cc	22,561	29,329	12,032	15,642
<b>Hatchbacks</b>				
cylinder capacity not exceeding 1000 cc	10,705	9,278	7,136	6,185
Cylinder capacity exceeding 1000 cc but not exceeding 1500 cc	14,274	12,371	8,564	7,422
Cylinder capacity exceeding 1500 cc but not exceeding 2500 cc	15,041	19,553	8,423	10,950
Cylinder capacity exceeding 2500 cc but not exceeding 3000 cc	16,545	21,508	10,523	13,687
Cylinder capacity exceeding 3000 cc	19,553	25,419	12,032	15,642
<b>Station wagons</b>				
cylinder capacity not exceeding 2500 cc	16,545	21,508	9,024	11,731

Cylinder capacity exceeding 2500 cc but not exceeding 3000 cc	18,049	23,463	13,357	17,598
Cylinder capacity exceeding 3000 cc but not exceeding 2500 cc	22,561	29,329	18,049	23,463

### SUVs

Cylinder capacity not exceeding 2500 cc	21,057	27,374	9,024	11,732
Cylinder capacity exceeding 2500 cc but not exceeding 3000 cc	24,065	31,284	13,357	17,598
Cylinder capacity exceeding 3000 cc	28,577	37,150	18,049	23,463
	<b>Aged 2 to 5 years</b>		<b>Aged over 5 years</b>	

### Motor vehicles for the transport of goods –with compression-ignition internal combustion piston engine (diesel or semi-diesel):

Customs duty	Excise duty	Customs duty	Excise duty
K	K	K	K

#### Single cab

GVW exceeding 1.0 tonne but not exceeding 1.5 tonnes	21,926	9,501	8,770	3,801
GVW exceeding 1.5 tonnes but not exceeding 3.0 tonnes	26,311	11,402	15,348	6,651
GVW exceeding 3.0 tonnes but not exceeding 5.0 tonnes	30,697	13,302	17,541	7,601
Double cabs GVW exceeding 3 tonnes but not exceeding 5 tonnes	30,274	0	24,119	10,452
Double cabs GVW exceeding 3.0 tonnes but not exceeding 5.0 tonnes, <b>with spark ignition internal combustion piston engine</b>	30,697	13,302	24,119	10,452

#### Panel Vans

GVW exceeding 1.0 tonne but not exceeding 1.5 tonnes	15,348	6,651	8,770	3,801
GVW exceeding 1.5 tonnes but not exceeding 3.0 tonnes	17,541	7,601	15,348	6,651
GVW exceeding 3.0 tonnes but not exceeding 5.0 tonnes	21,926	9,501	17,541	7,601

#### Trucks

GVW up to 2 tonnes	21,926	9,501	10,963	4,751
GVW exceeding 2.0 tonnes but not exceeding 5.0 tonnes	28,504	12,352	13,156	5,701
GVW exceeding 5.0 tonnes but not exceeding 10.0 tonnes	24,724	18,955	10,817	8,293
GVW exceeding 10.0 tonnes but not exceeding 20.0 tonnes	30,905	23,694	11,744	9,004
GVW exceeding 20 tonnes	51,898	0	19,461	0
GVW exceeding 20 tonnes, <b>with spark ignition internal combustion piston engine</b>	37,086	28,432	13,907	10,662



### **Customs and excise duty on new vehicles**

- 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: 30%
  - Excise duty:
    - 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 tonnes:
  - Customs duty 15%
  - Excise duty 10%
- 3 Buses/coaches for the transport of more than ten persons
  - Customs duty: 15%
  - Excise duty:
    - Seating capacity of 16 persons and less 25%
    - Seating capacity of 16 persons and more 0%
- 4 Trucks/lorries with gross weight exceeding 20 tonnes
  - Customs duty: 15%
  - Excise duty: 0%

The minimum amount of customs duty on motor vehicles is K6,000.

Import VAT is added to the sum of VDP, customs duty and excise duty. It is determined at the standard rate of 16%

**Attempt all FOUR (4) questions**

**QUESTION ONE**

- (a) Human rights do not only relate to local cases within a country but also to international cases and there is an interaction between human rights law and tax law.

**Required:**

- (i) Explain two (2) main areas of interaction between human rights law and tax law. (3 marks)
- (ii) State the major sources of conflict between tax law and human rights law. (4 marks)
- (b) Distinguish between tax evasion and tax avoidance. (3 marks)
- (c) One practice used in tax evasion is money laundering.

**Required:**

- (i) Define money laundering. (2 marks)
- (ii) Explain various recommendations, legislation and regulations initiated internationally to combat money laundering. (5 marks)
- (d) **For the purposes of this part of the question assume that today's date is 31 December 2018**

Blessed was born in Zambia on 1 January 1980 and had always lived in Zambia until 31 December 2016, when she left Zambia for Brazil where she took up employment with a Brazilian multinational corporation that also has a permanent establishment in Zambia. The contract of employment was for a period of sixteen (16) months ending 30 April, 2018. Whilst in Brazil, all her emoluments were received there, and credited to her bank accounts in Brazil. Upon expiry of her contract on 30 April 2018, she received her gratuity of K450,000 (net of Brazilian tax). The gratuity was credited to her Zambian bank account on 31 May 2018.

On 1 July 2018, Blessed took up employment with Pazed Limited, a Zambian company, at an annual salary of K240,000. She also received a general purpose allowance of K3,000 per month. Income tax paid on emoluments from employment with Pazed Limited for tax year 2018 was K33,000.

**Required:**

- (i) Explain whether Blessed would be regarded as being resident and ordinary resident in Zambia for the tax year 2018. (3 marks)

- (ii) Assuming that under the double taxation treaty between Zambia and Brazil, Brazilian emoluments net of Brazilian income tax are chargeable to Zambian income tax at the rate of 4.5% if remitted (credited) to Zambia, calculate the final amount of income tax payable by Blessed for the tax year 2018.

(5 marks)

**[Total: 25 marks]**

## **QUESTION TWO**

- (a) Explain what is meant by a tax haven and describe any three (3) features of a tax haven. (7 marks)
- (b) **For the purposes of this part of the question assume that today's date is 31 December 2018**

You have been provided with the following information:

- (1) RHN Ltd is a company incorporated and resident in China, engaged in construction and haulage operations. On 10 July 2018, RHN was subcontracted by ACN Constructions Limited, a Zambian resident company to install ultra-modern lifting, air conditioning and ventilation systems, in one of its newly constructed buildings in Lusaka.

RHN Ltd completed the work on 9 November 2018 and invoiced ACN Constructions Limited K7,600,000 for the work performed by that company on the building. RHN Ltd does not have a permanent establishment in Zambia.

- (2) DCH Promotions Limited is a Zambian resident company in the entertainment industry. On 10 May 2018, DCH Promotions Limited entered into an agreement with Coco Malomide, a famous international musician who is neither resident nor ordinarily resident in Zambia, under which Coco was to perform a series of musical concerts in Livingstone, Lusaka and on the Copperbelt, starting from 3 July 2018 to 7 July 2018. Coco Malomide invoiced DCH promotions Limited K480,000 for performing at the concerts.

### **Required:**

Using the information provided above, discuss the tax position of each one of the following:

- (i) RHN Ltd (3 marks)
- (ii) Coco Malomide (3 marks)

- (c) Southern Explosives Limited is a company resident in a country known as Pestonia which specialises in the manufacture of explosives used in the sinking and extension of mine shafts. The company wishes to expand its operations into a country known as Bestonia. The tax rates in Pestonia are much lower than those in Bestonia and the company is concerned about being exposed to the higher tax rates in Bestonia. Southern Explosives Ltd is considering the following modes of entry into the Bestonian market.
- (i) Setting up a branch of the company in Bestonia which will carry out the manufacture and sale of the explosives.
  - (ii) Exporting the explosives to Bestonia and selling them through independent agents who are resident in Bestonia whom the company will pay sales commission.
  - (iii) Incorporating a 100% owned subsidiary of Southern Explosives Ltd in Bestonia, which will carry out the manufacture of explosive under a licence from Southern Explosives Limited.

**Required:**

Assuming that the Double Taxation Agreement between Pestonia and Bestonia is identical to the OECD Model, discuss the tax consequences for Southern Explosives Ltd of each of the above suggested modes of operation in Bestonia. (12 marks)

**[Total: 25 Marks]**

**QUESTION THREE**

- (a) Transfer pricing is the general term used to refer to the problem of allocating profits among a corporate group of companies. For a group as a whole, all that matters at the end of the day is, the after- tax profit of the group, rather than that of its individual members. Some countries apply their transfer pricing rules in purely domestic cases.

**Required:**

- (i) Explain the application of transfer pricing rules in domestic cases. (2 marks)
  - (ii) State six (6) problems associated with the arm`s length principle. (6 marks)
  - (iii) State any two (2) solutions for solving transfer pricing problems. (2 marks)
- (b) (i) Explain what is meant by thin capitalisation. (2 marks)
- (ii) Explain three (3) different tax treatments of thin capitalisation. (6 marks)
- (c) Gabriel Ltd is a Zambian resident copper mining company which is a subsidiary company of a multinational company. An extract of the income statement (statement of profit or loss) for Gabriel Ltd for the year-ended 31 December 2018, is given below:

	<b>K` million</b>
Gross profit	364
Operating expenses	(84)
Finance costs	<u>(65)</u>
Net profit before taxation	215
Company income taxation	<u>(65)</u>
Net profit after taxation	<u>150</u>

The following additional information available:

1. Included in the operating expenses are non-taxable revenue expenses that account for 25% of the total operating expenses.
2. Included in the finance costs is K50 million loan interest paid to its holding company in South Africa.
3. The company has a debt: equity ratio of 5:1.
4. The company income tax shown in the income statement above, represents the provisional company income tax paid by the company in respect of the tax year 2018.
5. Mineral royalty paid during the year, has already been properly accounted for.

**Required:**

Calculate the company income tax payable for the tax year 2018. (7 marks)

**[Total: 25 marks]**

**QUESTION FOUR**

THG Limited is a Zambian resident manufacturing company which was incorporated in Zambia in the early 1990s. The company's effective management and control is exercised from Zambia. THG Limited has expanded over the years under the leadership of David Mafuleka, a Zambian resident, who is the Chief Executive Officer (CEO) of the company.

In the year 2016, the company acquired 40% of the ordinary share capital of KTH Ltd a company incorporated in a country known as Saltovia. The board of directors of KTH Ltd holds its meetings in Saltovia and David Mafuleka represents THG Ltd on the board of KTH Ltd.

In the year 2017, THG Ltd acquired 30% of the ordinary share capital of JKC Ltd a company incorporated in a country known as Baltovia. The board of directors of JKC Ltd holds their meetings in Baltovia and THG is represented on the Board of JKC Ltd by one of its directors who is resident in Zambia.

The results of KTH Ltd and JKC Ltd (translated into Zambian Kwacha) for the year ended 31 December 2018 were as follows:

	KTH K	JKC K
Profit before tax	4,600,000	5,600,000
Company Income Tax	<u>(1,150,000)</u>	<u>(1,680,000)</u>
Distributable profit	<u>3,450,000</u>	<u>3,920,000</u>

The tax adjusted business profit for THG Ltd for the year ended 31 December 2018 was K6,900,000. The profit figure does not include the following dividend income received by THG Ltd during the year ended 31 December 2018:

- (1) Dividends of K304,000 from KTH Ltd, net of withholding tax deducted in Saltovia. In Saltovia dividends are subjected to withholding tax at the rate of 20%.
- (2) Dividends of K120,000 from JKC Ltd, net of withholding tax deducted in Baltovia. In Baltovia dividends are subjected to withholding tax at the rate of 40%.

David Mafuleka, the CEO of THG Ltd, receives gross taxable earnings from employment of K360,000 and makes National Pension Authority (NAPSA) contributions of 5% of his earnings. PAYE of K111,180 was deducted from his emoluments in the tax year 2018. He made contributions to approved public benefit organisations amounting to K3,060. Mafuleka has shareholdings of 5% in each of KTH Ltd and JKC Ltd. He received dividends income of K30,000 and K15,000 from KTH Ltd and JKC Ltd respectively. The dividend income was net of withholding tax deducted at source at the appropriate rates in both cases.

Double taxation relief in relation to any tax paid on foreign income is given unilaterally in Zambia as Zambia does not have a double taxation convention with either Saltovia or Baltovia.

**Required:**

- (a) Explain why THG will be treated as being resident in Zambia for taxation purpose and discuss whether KTH and JKC will be treated as being resident in Zambia for tax purposes. (5 marks)
- (b) Compute the company income tax payable by THG Ltd in the tax year 2018. (9 marks)
- (c) Compute the income tax payable by David Mafuleka in the tax year 2018. (11 marks)

**[Total: 25 Marks]**

**END OF PAPER**

## **D5: INTERNATIONAL TAXATION SOLUTIONS**

### **SOLUTION ONE**

- (a) (i) Tax and human rights have two main areas of interaction:-
1. Taxation may be a tool to enforce the general social and legal values (including human rights) of a nation beyond its borders
  2. Taxation may interfere with international human rights standards i.e. pursuing taxpayer offenders in their resident or home country.
- (ii) The major sources of conflict between tax law and human rights law are:-
1. Transfer pricing
  2. Tax incentives
  3. Natural resources
  4. Off – shore investment activities
  5. Secrecy jurisdictions.
- (b) Tax evasion refers to the use of illegal means to avoid paying tax by either understating income, non-disclosure of some income or overstating expenses to reduce the tax payable or other forms of fraud.  
Tax avoidance on the other hand is identifying any tax loopholes in the taxes legislation in order to reduce the tax burden or defer tax liabilities. However anti-avoidance legislation aims at sealing the loopholes in the taxes legislation.
- (c) (i) Money laundering is the general term used to describe the process by which criminals disguise the original ownership and control of the proceeds of criminal conduct by making such proceeds appear to have been derived from a legitimate source. Therefore, it is the process of transforming the proceeds of crime into ostensibly legitimate money or other assets.

Various recommendations, legislation and regulations initiated to combat money laundering include:-

- (1) The demand for full transparency from financial institutions to provide all information concerning their activities in off – shore supervisory authorities. In this respect financial institutions must be discouraged or, if necessary, prohibited from operating in territories that feature on the black lists of the FATF, OECD and the World Bank's STAR (Stolen Asset Recovery Initiative).
- (2) Establish an interconnected and well integrated system of legal shareholder registries encompassing economic blocs and their member states, which will feature all necessary information concerning the shareholders of corporations operating within the economic blocs. This registry may be complemented with a risk-based index that will factor in some of the most suspicious aspects of a corporation's operations. This information on this registry should be available to

authorities on demand and all corporations should be expected to provide information concerning their beneficial owner, at the moment they are asked or within a prescribed timeframe.

- (3) Create a regularly-updated beneficial owner registry. Information of this kind should be either exchanged or coordinated across member states without any obstacle, so that instances of fiscal dumping would be avoided and variances in national legislation would not offer a window of opportunity to criminals and to those who make use of legal loopholes in a manner that is sophisticated, structured and systematic, suggesting that their intention is clearly malevolent, to abuse the system rather than conduct normal operations.
- (4) Strengthen the requirements regarding the function of corporate directors. Directors should be held accountable for failing to take reasonable steps to prevent money-laundering, this should apply regardless of whether they are nominees or not. Information of this sort should, for issues of transparency and democratic legitimacy be made publicly available to citizens, journalists and NGO's among all others, so that an additional layer of social scrutiny may be placed over corporations.
- (5) Reconsider and reinforce the rules regarding the due diligence that corporate registries and financial institutions should perform, always on accurate risk based approach, in an attempt to verify that all information pertaining to the beneficial ownership is correct and that no margin for fraudulent or corrupt activity is allowed.
- (6) Introduce requirements for enhanced due diligence in cases where politically exposed people are identified, with the option of rendering void or otherwise limiting the transaction in question.
- (7) Formation of Financial Intelligence Unit (FIU) whose role shall be to monitor, assess and analyze suspicious transaction reports and contracts. This entity could operate within the context of the Single Supervisory Mechanism that would be incorporated within the range of responsibilities of the Central Bank.

The above are some general guidelines and certainly do not exhaust the possible measure that may be considered in efforts to extinguish whatever flaws exist in present legislation that currently allow for the creation of shell companies, as well as in the quest to unmask the beneficial owners of corporations operating within the single market. Eventually this will also give rise to the need for a better risk-based assessment of clients from the side of private actors.

(d) Blessed

- i. An individual is resident in Zambia if he/she is physically present in Zambia for more than 183 days excluding the date of arrival and departure.

Individuals who come to Zambia and are expected to be in Zambia for more than twelve (12) months or come to Zambia with the intentions of establishing permanent residence are regarded as residents from the date of arrival.



For the tax year 2018, Blessed will be regarded as being resident and ordinary resident as her period of physically staying in Zambia would be of at least 183 days.

- (ii) Blessed  
Personal Income Computation – Tax year 2017

	<b>Marks</b>
<b>Zambian Emoluments:</b>	<b>K</b>
Basic salary (6/12 x K240, 000)	120,000
General purpose allowance (K3, 000 x 6)	<u>18,000</u>
	138,000
Less: Tax free amount	<u>(39,600)</u>
	<u>98,400</u>
<b>Income Tax</b>	
Next K9, 600 x 25%	2,400
Next K25, 200 x 30%	7560
Balance K63,600 x 37.5%	<u>23,850</u>
	33,810
Tax on Brazilian Emoluments	
Gratuity (K450, 000 x 4.5%)	<u>20,250</u>
	54,060
Less: Zambian PAYE	<u>(33,000)</u>
Income Tax Payable	<u>21,060</u>

## SOLUTION TWO

- (a) **Tax Haven**

A tax haven refers to a country which imposes a low or no tax, and is used by corporations to avoid tax which otherwise would be payable in a high-tax country.

### Features of Tax Havens

According to OECD report, tax havens have the following key characteristics:

- (1) **No or nominal taxes**  
No or only nominal taxes on relevant income usually on capital applied in that particular jurisdiction. This is the primary factor used in the identification of a tax haven but is not usually sufficient as a country may be competing fairly or adopting a preferential regime.
- (2) **Lack of effective of exchange of information**  
Tax havens typically have in place laws or administrative practices under which business and individuals can benefit from strict secrecy rules and other protections against scrutiny by tax authorities thereby preventing the effective exchange of information on taxpayers benefiting from the low tax jurisdiction.
- (3) **Lack of transparency**  
There is lack of transparency in the operation of the legislative, legal or administrative provisions. The details of the regime and/ or its application are

not apparent, or there is inadequate regulatory supervision or financial disclosure.

(4) **No substantial activities**

This identifies a tax haven as a jurisdiction that facilitates the establishment of foreign owned entities without the need for a local substantive presence. However, this factor was recently dropped as it was pointed out that it is very difficult to define whether a country lacks substantial activities and thus only the “no or only nominal taxes” and the information factors remained as important to the identification of tax havens.

(b) (i) **RHN Limited**

RHN Ltd will meet the definition of a non-resident contractor under the Income Tax Act as the company is neither resident in Zambia nor has a permanent establishment in Zambia.

Any payment made to a non-resident contractor attracts withholding tax at the rate of 20% which is a final tax. ACN Constructions Ltd will therefore be required to deduct withholding tax at the rate of 20% of the invoice price of the services rendered by RHN and pay the tax to the Zambia Revenue Authority. RHN Ltd will receive an amount from which the withholding tax has already been deducted. The amount of the withholding tax will be:  $K7,600,000 \times 20\% = K1,520,000$ .

(ii) **Coco Malomide**

The fees paid to Coco will meet the definition of public entertainment fees. Any fees paid to non-resident entertainers for performances within Zambia attract withholding tax at the rate of 20% which is a final tax.

Since Coco is not resident and ordinarily resident in Zambia, DCH promotions Ltd will be required to deduct withholding tax at the rate of 20% from the amount invoiced to them and remit it to the ZRA. Coco will receive the amount which is net of the withholding tax. The amount of the withholding tax will be:  $K480,000 \times 20\% = K96,000$ .

(c) (i) **Setting a Branch in Bestonia**

The branch will meet the definition of a permanent establishment under the OECD model Tax Convention as the branch will constitute a fixed place of business through which the operations of Southern Explosives Ltd will be carried on in Bestonia.

The manufacture and sales of explosives are not activities of a preparatory nature and therefore profits generated by the branch will be taxable in Bestonia under the ‘Authorised OECD Approach’ by hypothesizing the branch as a distinct and separate entity. This approach is therefore likely to produce a higher tax liability and therefore no opportunity to mitigate tax.

(ii) **Exportation and sale of explosives through agents**

In principle, if Southern Explosives Ltd will be dealing through independent agents, no permanent establishment will be created and no profits of the company will be taxable in Bestonia under the OECD Model Tax Convention.

However, this will only hold if the agents will be independent both legally and economically. The principal criteria that will be used to establish that this is the case, is the number of other parties represented by the agent; the amount of time spent on the business of Southern Explosives Ltd and whether the agents will bear the economic risks and rewards of working on behalf of Southern Explosives Limited.

It will also be important to establish whether the agents will be acting in the ordinary course of their business in relation to the sales carried out on behalf of Southern Explosives Ltd. This will involve an examination of the other businesses being represented by the agents.

So long as the agents will genuinely be independent in relation to the above tests, Southern Explosives Ltd will not be taxable on sales made through the agents in Bestonia and could deduct the sales commission paid to the agents from its profits in Pestonia.

Where the agents fail the test of independence on any of the above criterion, the agents would be regarded as dependent in relation to the sales for Southern Explosives Ltd. The company would thus have a dependent agent Permanent Establishment in Bestonia and be taxable in that country.

(iii) Under the provisions of the OECD Model Tax Convention guidelines (Article 7) Southern Explosives Ltd will not be taxable on its business profits in Bestonia unless it has a Permanent Establishment in that state. It will therefore be important to establish, whether the subsidiary will constitute a Permanent Establishment.

The subsidiary will be a legally separate entity and as such distinguished from a branch and therefore the subsidiary will be taxed separately in Bestonia on its profits and Southern Explosives Ltd will only be taxable in Pestonia.

Sales by the subsidiary of its own products manufactured under licence from Southern Explosives Ltd will not be sales on behalf of Southern Explosives, because of the legal separation of parent and subsidiary recognised in the Model. But if ever the subsidiary acted as a sales outlet for products produced by Southern Explosives Ltd and not the subsidiary, this would make the subsidiary an agency Permanent Establishment.

It will also be important to determine if Bestonia will recognize the licence fee paid by the subsidiary as constituting an arm's length price. The subsidiary would need to demonstrate that it had undertaken a transfer pricing study and complied with documentation formalities in Bestonia.

If this will not be the case, then Bestonia will likely seek to adjust the price downwards under the OECD Transfer Pricing Guidelines and the result would be an increased taxable profit for the subsidiary in Bestonia at the higher rates prevailing there. Consideration should be given to reaching an advance pricing agreement or other form of informal clearance with the tax authority of Bestonia.

Hence subject to care being taken not to have a Permanent Establishment in Bestonia and that country recognizing the licence fee as a correct arm's length price, the contract manufacturing and licence operation can be effective to reduce tax in Bestonia. The licence fee would reduce profits of the subsidiary and render the fee taxable at the lower rate in Pestonia.

### **SOLUTION THREE**

- (a) (i) The application of transfer pricing rules in domestic cases (i.e. within a country) where there are different tax rates for different kinds of income or business with lower tax rates.
- (ii) The application of the arms length principle in a transfer pricing transaction has the following problems:
- Lack of comparable prices
  - Lack of information
  - Risk of effective double taxation through disagreement over transfer price (& weakness of mutual agreement procedures)
  - Huge information demands
- Particular problems in modern business:
- Increased fragmentation within multinational businesses
  - Growing importance of intellectual property & other intangibles
  - Resultant lack of comparable prices
- (iii) Solutions
- Advanced pricing arrangements
  - Unitary taxation/Formulary apportionment
- (b) Thin capitalization
- (i) Thin capitalization is the practice of excessively funding a branch or subsidiary with interest – bearing loans from related parties rather than with share capital.
- (ii) Tax treatment of thin capitalization include:-
1. A taxpayer, other than a bank or financial institution, is denied a deduction for interest in excess of the product of three times the net income – producing assets of the taxpayer and
    1. In the case of a loan denominated in a foreign currency, 110 percent of the interest rate charged on loans by the central bank of X to commercial banks on the last day of the preceding tax year; or

2. In the case of a loan denominated in a foreign currency, 110 percent of the interest rate charged by the US dollar loans to US banks on the last day of the preceding tax year.
3. The net income-producing assets of a taxpayer are assets giving rise to income that is included in the gross income of the taxpayer less liabilities relating to those assets, each averaged between the beginning and end of the tax year.
4. With the prior written permission of the tax administration, a taxpayer may
  - Calculate net income-producing assets on an alternative basis; or
  - In the case of a loan denominated in a foreign currency other than US dollars, use a different interest rate based on the interbank rate of the central bank responsible for that currency.
  - Any excess interest that is not allowed as a deduction in tax year solely as result of the application of this provision is treated as interest expense of the taxpayer in the following year.

(c) Gabriel Inc – Company Income Tax payable for tax year 2017

	<b>K million</b>
Net profit before taxation	215
Add back:-	
Non – tax allowable operating expenses	21
Excessive interest (K50m x 2/5)	<u>20</u>
Tax adjusted profit	<u>256</u>
Company income tax (30% x K256 million)	76.8
Less: Provisional tax paid	<u>65.0</u>
Company Income Tax payable	<u>11.8</u>

## **SOLUTION FOUR**

### **(a) Residence of persons other than individuals**

THG will be treated as being resident in Zambia because it was incorporated in Zambia and is effectively managed from Zambia.

KTH will be regarded as being resident in Saltovia and not Zambia because it was incorporated in that country and it is effectively managed from that country.

JKC will be regarded as being resident in Baltovia and not Zambia because it was incorporated in that country and it is effectively managed from that country.

### **(b) THG LIMITED**

COMPANY INCOME TAX COMPUTATION FOR THE TAX YEAR 2018

	K	K
Business profits		6,900,000
Foreign dividends:		
KTH (K304,000 x 100/80)	380,000	
JKC (K120,000 x 100/60)	<u>200,000</u>	
Total taxable profits		<u>580,000</u>
		<u>7,480,000</u>
Company Income Tax (K7,480,000 x 35%)		2,618,000
Double Taxation Relief on dividend from KTH (W1)	76,000	
on Dividend from JKC (W2)	<u>70,000</u>	
		<u>(146,000)</u>
		<u>2,472,000</u>

**Workings**

(1) Double Taxation Relief on dividends received from KTH Ltd will be the lower of:

The Zambian company income tax on the dividends:

$$K380,000 \times 35\% = K133,000 \text{ and}$$

The foreign withholding tax paid:

$$K380,000 \times 20\% = K76,000$$

The double taxation relief is therefore K76,000

(2) Double Taxation Relief on dividends received from JKC Ltd will be the lower of:

The Zambian company income tax on the dividends:

$$K200,000 \times 35\% = K70,000, \text{ and}$$

The foreign withholding tax paid:

$$K200,000 \times 40\% = K80,000$$

The double taxation relief is therefore K70,000

(c) DAVID MAFULEKA  
INCOME TAX COMPUTATION FOR THE TAX YEAR 2017

	K	K
Annual salary		360,000
Less donations to public benefit organisations		<u>(3,060)</u>
		356,940
Dividends from foreign sources		
From KTH (K30,000 x100/80)	37,500	
From JKC (K15,000 x100/60)	<u>25,000</u>	
		<u>62,500</u>
		<u>419,440</u>
Income Tax		
on first K74,400		9,960
On Excess (K419,440 -K74,400) x 37.5%		<u>129,390</u>
		139,350
Double Taxation relief		
Divided from KTH (W1)	7,500	
Divided from JKC (W2)	<u>8,306</u>	
		(15,806)
Less PAYE		<u>(111,180)</u>
Income tax payable		<u>12,364</u>

**Workings**

(1) Double Taxation Relief on dividends received from KTH Ltd will be the lower of:

- The Zambian income tax attributed to the foreign dividends:

$$K37,500 \times K139,350/419,440 = K12,459, \text{ and}$$

- The foreign withholding tax paid:

$$K37,500 \times 20\% = K7,500$$

The double taxation relief is therefore K7,500

(2) Double Taxation Relief on dividends received from JKC Ltd will be the lower of:

- The Zambian income tax attributed to the foreign dividends:

$$K25,000 \times K139,350/419,440 = K8,306, \text{ and}$$

- The foreign withholding tax paid:

$$K25,000 \times 40\% = K10,000$$

The double taxation relief is therefore K8,306

**END OF D5 SOLUTIONS**



TAXATION PROGRAMME EXAMINATIONS

DIPLOMA LEVEL

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D6: TAX AUDIT AND INVESTIGATIONS

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MONDAY 11 JUNE 2018

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

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### **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.
2. This question paper consists of **FOUR (4)** questions of Twenty Five (25) marks each. You must attempt all the **FOUR (4)** 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. A Taxation table is provided on pages 2, 3 and 4.



**Attempt all FOUR (4) questions**

**QUESTION ONE**

- (a) A tax audit can only be successful when there is an adequate legal framework. This is because a tax audit is a sensitive contract between the tax payer and ZRA. It involves an intrusion of the tax payer's privacy, exploration of private and business issues as well as the disruption of the tax payer's day-to-day's workflow. Further the tax auditor is expected to use a functional or a segment model.

**Required:**

Briefly explain FOUR (4) key elements of a tax legal framework that relate to the function of a tax audit and investigation. (8 marks)

- (b) Explain the differences between the functional and a tax payer's segment model. (6 marks)
- (c) The following details, in a summarised form relate to Jante Limited, a listed firm on the Lusaka Stock Exchange (LUSE), for the year ended 30 June 2018. The net profit for the year before taxation was K840,000. This profit was calculated after charging the following expenses:

- |        |   |          |
|--------|---|----------|
| (i)    | Depreciation of computer equipment  | K 18,000 |
| (ii)   | Amortisation of intangible non-assets   | K 20,000 |
| (iii)  | Sales director's emoluments amounted to   | K250,000 |
| (iv)   | A disabled person was employed throughout the year.   |          |
| (v)    | The Sales Director has been accommodated in company house in Kalundu Township of Lusaka. However, if the house was rented gross rentals payable would amount to K17, 500.   |          |
| (vi)   | The company's sales director had been provided with a Toyota Prado that was being used for private and business purposes. The car has a cylinder capacity of 2,900 cc. The total mileage in the year 2018 was 120,000km and the private mileage was 70% of the total. |          |
| (viii) | The amount of capital allowances on Jante Ltd on non-current assets were agreed at K31, 200 for the tax year 2018.  |          |

**Required:**

Calculate the company's Income tax payable by Jante Ltd for the charge year 2018. (11 marks)

**[Total: 25 marks]**

**QUESTION TWO**

- (a) The collection of taxes by the Zambia Revenue Authority (ZRA), is not only restricted to traders, manufacturers and workers only but to service industries as well. Some of these service industries are in the telecommunication sector such as Airtel and Zamtel. Other services on which taxes are collected include, discounts given to Airtime dealers, discount subscribers, network switching expenditure and roaming charges and on income earned.

**Required:**

Explain briefly how the following services are treated for tax purposes:

- (i) Discounts on airtime (3 mark)
- (ii) Discounts to subscribers (2 mark)
- (iii) Network switching expenditure (2 mark)
- (iv) Roaming charges and income (3 marks)

- (b) The Zambia Revenue Authority (ZRA) carries out tax audits and investigations into tax liabilities of business houses from time to time. This involves an examination of a tax return and its supporting books of accounts and any other related information. A tax audit and investigation is also an examination of whether a tax payer has correctly assessed and reported their tax liability and fulfilled other tax obligations. However, for a tax audit to be comprehensive, it must meet certain qualitative elements for it to be appreciated by both parties.

**Required:**

Explain Four (4) elements of a tax audit. (4 marks)

- (c) The tax auditor needs to plan the audit so that it is conducted in an orderly and efficient manner. During the planning meeting, the auditor should consider planned risk procedures and risk responses to the risk of material misstatements. The essential matters relating to an investigation depend on the size and complexity of the company being investigated and the auditor's exposure and experience. When developing an audit strategy and a plan, the auditor should evaluate certain important matters in relation to the financial statements and internal controls over financial reporting. However, before an evaluation is carried out, an introductory meeting between the auditor and the client is needed at which certain matters should be communicated to the business under an investigation in form of a letter.

**Required:**

State six (6) matters that should be included in the letter for the introductory meeting between the tax auditor, and the client.

(6 marks)

- (d) There are different types of audits and they vary in accordance with the level of scope and intensity.

**Required:**

Briefly describe any Five (5) types of tax audits that can be carried out by the tax auditor.

(5 marks)

**[Total: 25marks]**

**QUESTION THREE**

You are the Principal Tax Auditor responsible for the audit of Kafeka Ltd, which is a subsidiary of a multi-national enterprise (MNE) resident overseas. Kafeka Ltd is resident in Zambia while other subsidiaries are resident in different countries. Two (2) of the subsidiaries are situated in countries classified as tax havens.

The following issues relating to tax year 2018 are outstanding and have been left for your attention:

1. Tax treatment of the following items of expenditure
  - Defalcations by cashier of K4,000.
  - Cost amounting to K30,000 of preparing income tax returns for tax amnesty and additional accountancy costs of K12,000 incurred as a result of tax investigation revealing discrepancies.
  - A cost of K22,000 of seconding three (3) accounts clerks to the Ministry of Health to assist in the disbursement of funds following the cholera outbreak
  - A cost of K18,000 on repairs incurred on a newly-acquired asset which was not usable in its unaltered state. The condition of the asset was confirmed by a qualified engineer who carried out a detailed inspection.
  - Employees NAPSA contributions of K120,000. The Payroll Accountant has made a monthly deduction of K255 on each employee's salary when computing Pay As You (PAYE)
  - Staff Christmas party of K37,500.
  
2. Tax treatment of interest and an adjustment relating to goods sold to one of the subsidiaries
  - Kafeka Ltd's statement of profit or loss show interest paid of K15,000. The company has a debt : equity ratio of 10:2. The excess interest disallowed has been computed as  $1/3 \times K15,000 = K5,000$ .
  - Kafeka Ltd sold goods to one of the subsidiaries at a cost of K24,000 which did not include the profit margin of 25% charged to other customers. This was in accordance with the company policy on transfer pricing. The Financial Controller has made an adjustment in the computation of the taxable business profits by deducting K8,000 from the accounting profit.

The Financial Controller thinks tax audits are more value adding compared to financial statement audits since tax audits are simply meant to minimise the 'tax gap'.

**Required:**

- (a) Discuss four (4) theories that may explain the demand for financial statement audit services, according to Hayes et al. (2005). (8 marks)
- (b) Explain the tax treatment of each item of expenditure identified during the tax audit of Kafeka Ltd and state the evidence which you will expect to find in undertaking your review of work done. (6 marks)
- (c) Discuss each of the following rules to Multi-national enterprises (MNES).
  - (i) Thin capitalization (3 marks)
  - (ii) Tax havens (3 marks)
  - (iii) Transfer pricing (3 marks)
- (d) Advise whether the tax treatment of the two (2) transactions given in the scenario on thin capitalisation and transfer pricing are correct. (2 marks)

**[Total: 25 marks]**

#### **QUESTION FOUR**

Kitewe Ltd which is resident in Zambia provides telecommunications services both nationally and internationally. Its business has been concerned with mobile phones, telephone calls and private telecommunication networks. Kitewe Ltd levies inter-connection charges to other service providers.

The Managing Director has recently attended a seminar on inter-connection charges and their impact on value added tax (VAT) liability organised by the Ministry of Finance and Zambia Revenue Authority (ZRA). An official from the Ministry of finance highlighted the impact on the treasury of the interconnection charges due to the existence of a broad informal economic sector in the telecommunications industry. An official from the ZRA discussed the technical details on the taxation of interconnection charges. The management director is worried that ZRA has notified the company that a tax audit will be carried out next month.

The Finance Director has provided the following details of temporary differences as at 31 March 2018 (there is no balance brought forward on deferred tax):

	K'000
1. Accelerated capital allowances	10,000
2. Loss relief being carried forward	4,500
3. General provision (disallowed for tax purposes)	600

Joseph Mwansa a former employee of Kitewe Ltd left employment on 31 May 2018 and is currently pursuing his PAYE rebate with the Zambia Revenue Authority (ZRA). His all-inclusive monthly salary was K32,000 and the tax paid to date under PAYE was K52,047. He remained unemployed for the rest of the tax year.

#### **Required:**

- (a) Discuss the inter-connection charges and their impact on VAT liability. (7 marks)
- (b) Calculate the tax rebate (refund) for Joseph Mwansa for the tax year 2018 (6 marks)
- (c) Explain the term deferred tax and how it arises. (6 marks)
  
- (d) Compute the amount of tax deferred by Kitewe Ltd, as at 31 March 2018. (6 marks)

**[Total: 25 marks]**

**END OF PAPER**

## D6: TAX AUDIT AND INVESTIGATIONS SOLUTIONS

### SOLUTION ONE

The following are the five key elements of a tax legal framework

- (a) (i) Tax payer's record keeping obligations-business enterprises are expected to keep adequate books of accounts and records based on national codes of commerce to the extent that they do not contravene any tax laws. Where technology is advanced, obligations may require that they keep electronic books and accounts. The books and records should be maintained in the language of the country in which the tax payer resides.
- (ii) Giving Tax Inspectors Access to books and records-Company law requires that that the auditor is given access to records and books of accounts at all times they are required. This information maybe inform of financial statements, letters of contracts in order to determine correct amounts of taxes due. However, the ability to collect taxes is subject to the provisions of the respective country's Double Taxation Agreements or Tax Information Exchange Agreements and Domestic Laws. An auditor should conduct an investigation on the premises of the client in order to observe work –flow daily and inspect various assets that are being used by the client.
- (iii) Giving Tax officials Access to third party information-All countries have legal provisions to support the auditor in cases where the tax payer provides unsatisfactory information or the auditor must verify tax payer's information using an independent or third party sources. However the auditor can be limited due to protection of tax payer's privacy, Protection of trade industrial secrets and confidential rules of professional ethics.
- (iv) Sanctions for Non-compliance-the voluntary reporting of tax payer's correct tax liabilities and the provision of any assistance that may be required verifying tax payer's reported liabilities are facilitated by an appropriately structured regime of sanctions such as penalties, interest and imprisonment. These penalties may arise when a tax payer fails to answer questions or provide relevant documents. Sanctions can be Imposed when a tax payer understates tax liabilities resulting from unintended errors or from careless or reckless acts and from deliberate and fraudulent acts.

- (b) **Tax Payer's functional model**, under this model, staff are organised by functional groupings such as registration, accounting, information processing, audit, collection of, appeals and generally across taxes.

This model was introduced in order to enhance standardisation of work processes across taxes, to simplify computerisation and arrangements for tax payers and to improve operational efficiencies.

The model also helps to integrate direct and indirect taxes especially audit work that relate to VAT and Income Tax also helps to identify which individuals are responsible for specific taxes so that they can attend to queries as they arise. It is therefore a model based on the organisational structure of the company.

**Tax payer's segment model**-This a more recent development that was introduced in order to organise the service and enforcement functions principally around segments of tax payers such as large businesses, high net worth individuals and SMEs.

The rationale is to organise functions around a tax payer's segment because each group of tax payers has different characteristics and tax compliance behaviours and presents different risks to ZRA.

It is argued that the grouping of key functional activities within a unified and dedicated management structure increases the prospects of improving Overall compliance levels.

**(c) Jante Ltd's Income tax computation for the charge year 2018**

	<b>K'000</b>	<b>K'000</b>
Profit before taxation as per accounts		840,000
Add back:		
Depreciation	18,000	
Amortisation	<u>20,000</u>	
		<u>38,000</u>
		878,000
Accommodation benefits:		
Sales director's (30% x 250,000)		75,000
Personal to holder car benefit: sales director		<u>40,000</u>
		<b>993,000</b>
Capital allowances		(31,200)
Disabled allowances		<u>(1,000)</u>
Taxable profit		<u>960,800</u>

Company Income Tax Payable = (35% x 960,800) = K336,280

**SOLUTION TWO**

- (a) (i) A discount is a deduction either after prompt payments have been made or when goods and services are bought in bulk. Thus discounts will not form part and parcel of the gross sales revenue that airtime manufacturers give to the airtime dealers.
  - (ii) A discount that is given to a subscriber will reduce the cost of his purchases when submitting tax returns to the Zambia Revenue Authority. This will be at the time a tax assessment is being made for the tax payable in a given financial period.
  - (iii) The network switch expenditure will be treated as part and parcel of the cost of making an outward bound telephone call when ascertaining the cost of accessing a telephone service. The caller will be billed as such.
  - (iv) As for roaming, both the caller and the receiver are charged. However, the tax treatment of these charges will be determined by establishing where the income arising from the service facility is recorded or accrued when that income will be subjected to the Zambian taxation laws regarding VAT and Income Tax. Otherwise they will not be chargeable.
- (b) In order for a tax investigation and audit to be appreciated, it should conform to certain features that are known as qualitative characteristics. The following are the elements of a tax audit:
- (i) The tax payer's records and accounts have been reviewed in sufficient details in order to reach a conclusion regarding all items of material consequences.

- (ii) That appropriate income tests have been performed where necessary to ensure the proper and complete reporting of income has been made regardless of the sources of that income.
- (iii) That the responsibility of tax payer regarding the filling of all tax returns has been ascertained.
- (iii) That the conclusions expressed are documented in sufficient details to enable the reader to comprehend the process as to what lead to the conclusion.

(c)The following matters must be communicated to the client before an introductory meeting takes place:

- (i) Purpose of the main study
- (ii) Time schedule for the main study
- (iii) A list of members who will be on the audit team
- (iv) The types of methods that will be used by the auditor
- (v) The information that will be requested from the auditee
- (vi) The need to appoint or confirm the contact person

(d) The following are the types of tax audits that can be carried out by the tax auditor:

- **A full audit-** this is a type of an audit which encompass all audit issues. It is a comprehensive examination of all information relevant to the calculation of a tax payer's tax liability for a given period. The objective is to determine the correct tax liability for a tax return as a whole.
- **Limited scope audit or(issue based audit)-** these are confined to specific issue key potential issues on tax return and/or a particular tax scheme arrangement employed by the tax payer. The aim to examine key potential risk areas of non-compliance They consume relatively few resources than full audits and allow for an increased coverage of the tax payer's population.
- **Single issue audit-** these are confined to one potential non-compliance that may have arisen from an examination of the tax payer's return. Given there narrow scope, single issue audits efficient in that less time is spent to perform and can be used to review large numbers of a payer's involved in similar schemes to conceal non-compliance
- **Deregistration audits-** these are conducted when a business is pending deregistration from being a VAT registered supplier. The aim is to establish the final tax liability/refund pension.
- **Education audits –** these audits are normally done when there is a major change in the tax law that is complex.

### SOLUTION THREE

(a) Auditing theories.

Four auditing theories according to Hayes et al. (2005) are as follows:

1. **The policeman theory** – this theory claims that the auditor is responsible for searching, discovering and preventing fraud. In the early 20<sup>th</sup> century this was certainly the case. However, more recently the main focus of auditors has been to provide reasonable assurance and verify the truth and fairness of the financial statements.
2. **The lending credibility theory** – this theory suggests that the primary function of the audit is to add credibility to the financial statements. In this view the service that the auditors are selling to the clients is credibility. Audited financial statements are seen to have elements that increase the financial statement user's confidence in the figures presented by the management in the financial statements. The users are perceived to gain benefits from the increased credibility, these benefits are considered to be that the quality of investment decisions improve when they are based on reliable information.
3. **The theory of inspired confidence (Theory of rational expectations** – Limperg 1932) – this theory addresses both the demand and the supply for the audit services. The demand for audit services is the direct consequence of the participation of third parties (interested parties of a company) in the company. These parties demand accountability from the management, in return for their investments in the company. Accountability is realised through the issuance of periodic financial reports. However, since this information provided by the management may be biased, and outside parties have no direct means of monitoring, an audit is required to assure the reliability of this information. With regard to the supply of audit assurance, Limperg (1932) suggests that the auditor should always strive to meet the public expectations.
4. **The agency theory – the agency theory** (Watts and Zimmerman 1978, 1986a, 1986b) suggests that the auditor is appointed in the interest of both the third parties as well as the management. A company is viewed as a web of contracts. Suppliers, bankers, customers, employees etc. make some kind of contribution to the company for a given price. The task of the management is to coordinate these groups and contracts and try to optimize them: low price for purchased supplies, high price for sold goods, low interest rates for loans, high share prices and low wages for employees. In these relationships, management is the agent, which tries to gain contributions from principals (bankers, shareholders, employees etc.).  
The most prominent and widely used audit theory is the agency theory.

(b) Explanation of tax treatment and evidence expected.

Expenditure	Explanation	Evidence expected
1. Defalcations by cashier	Losses suffered by a business due to the dishonest of a person who has some control such as a proprietor or managing director are not allowed. But if the losses are suffered because of the dishonest of a subordinate (such as cashier in this	<ul style="list-style-type: none"> <li>- Copy of the relevant receipts or vouchers</li> <li>- Written representations from management on the disciplinary measures taken</li> </ul>



	case) who has no control are allowed.	
2. Preparing income tax returns and additional accountancy costs incurred as a result of investigation revealing discrepancies	Costs of preparing the income tax returns are allowed. However, additional accountancy costs incurred as a result of investigation revealing discrepancies are not allowed.	<ul style="list-style-type: none"> <li>- Copies of invoices relating to the preparation of the income tax returns and additional accountancy work</li> <li>- Copies of ZRA assessments and investigation report</li> </ul>
3. Cost of seconding three (3) accounts clerks to the Ministry of Health	Amounts paid for a charitable purpose which is in national interest is allowed.	<ul style="list-style-type: none"> <li>- Copy of signed contract</li> <li>- Copies of the relevant payment vouchers</li> </ul>
4. Repairs to a newly-acquired asset which was not usable in its unaltered state	An asset which requires substantial expenditure to be incurred on it before it can be used in the trade basically calls for capital expenditure and hence is non-deductible.	<ul style="list-style-type: none"> <li>- Engineer's inspection report on acquisition and any invoices relating to the repairs</li> <li>- Copies of relevant invoices and payment vouchers</li> </ul>
5. Pay As You Earn (PAYE) treatment of employee NAPSA contributions	The monthly deduction of K255 was removed effective 1 January 2018. This is because the Constitution now excludes pension benefits from taxation.	<ul style="list-style-type: none"> <li>- Copy of PAYE computations</li> </ul>
6. Staff Christmas party	Expenditure incurred on entertaining employees is allowable.	<ul style="list-style-type: none"> <li>- Copy of all relevant invoices</li> </ul>

(c) (i) **Thin capitalisation**

A company is said to be thinly capitalised if a person funds the business with more debt than the business could sustain had it been funded as a standalone entity, borrowing from unconnected persons acting at arm's length.

Multi-national enterprises (MNEs) use this scheme by excessively funding a branch or subsidiary with interest bearing loans rather than share capital. This is an attractive alternative for non-resident investors, as the borrower generally receives a tax deduction for the interest paid. By contrast, dividends paid on shares are not deductible so that the underlying profits bear the full rate of company tax.

Thin capitalisation is a problem that has troubled most of the major trading Nations for many years particularly if they receive inward investment, as is the case for Zambia. Many Countries deal with this problem by rules which deny deductions for interest in defined cases, and possibly re-characterise the payment of interest as Dividends. There are many technical and practical issues in implementing such rules.

(ii) **Tax havens**

Some countries do not charge heavy taxes on MNEs established on their territory either through a patent or a subsidiary or a permanent establishment. These are known as tax havens.

Tax havens in tax planning, MNEs may seek to reduce source and residence country taxation, by profit shifting to tax havens.

For example, a simple transfer pricing, the parent company would sell goods to a related company in a tax haven for cost plus a small profit, which in turn sells to a subsidiary in the source country for an inflated price. Consequently, the subsidiary makes minimal profit, and most profit is in the tax haven.

(iii) **Transfer pricing**

Transfer pricing is the general term used to refer to the problem of allocating profits by a multinational enterprise among the parts of a corporate group.

This involves pricing of goods and services supplied within the group between the parent company and its foreign subsidiary or between two foreign subsidiaries.

Transfer pricing is used by companies with subsidiaries located in countries with lower tax rates (tax havens) to divert profits in order to lower tax liabilities of the group. It is necessary to allocate profits among the companies in the group because under international taxation norms a country will tax a non-resident company only on profits sourced in that country.

(d) **Advice**

1. Thin Capitalisation

Interest added back of K5 million is not correct. The correct amount to be added back is:  $\frac{2}{5} \times K15 \text{ million} = K6 \text{ million}$ .

2. Transfer pricing

The amount of the adjustment is correct. However, its treatment is wrong. The amount is supposed to be added when computing taxable profits.

## **SOLUTION FOUR**

(a) Inter-connection charges and their impact on VAT liability.

An inter-connection charge is a charge levied by network operators on other service providers to recover the costs of the interconnection facilities (including the hardware and software for routing, signaling, and other basic service functions) provided by network operators.

In order to understand the impact that the interconnection charges will have on the overall VAT liability in the telecommunications sector is to ascertain the variables such as the incidence of tax avoidance and the cost of collection. The economic structure of the sector into either formal or informal will be considered. A high tax drives up tax avoidance and cost of collection. Similarly a broad informal economic sector poses a very high cost to collect taxes. While it is difficult to get the exact revenue figures collected in the form of VAT and import duties from handsets, common sense indicates

governments that are with a large formal sector would, in relative terms, generate more revenue than those with large informal sectors despite having the highest rates of VAT and import duties.

Another consequence of high VAT and import duties on handsets and other telecommunication equipment is the emergence of poor quality pirated handsets. This would mean that the market prices of the handsets do not reflect the VAT and import duties supposedly paid on them.

However, the impact on revenue if VAT and import duties were lowered would be the broadening of the formal sector at the expense of the informal sector, the diffusion of more quality handsets and, more importantly, a fall in the cost of collecting the VAT and import duties and probably an increase in revenue for the government. It should also increase the productive efficiency of the mobile sector and its positive spill-over effects to the wider economy.

Relevant points include:

- Definition of inter-connection charge
- Tax rate
- Quality of product
- Tax avoidance
- Cost of collection
- Informal sector
- Formal sector
- Wider economy

- (b) The tax refundable since Joseph Mwansa remained unemployed for the rest of the tax year is computed as follows:

	K
Salary (32,000 x 5)	160,000
Less: Allowable deductions	<u>0</u>
Taxable income	<u>160,000</u>
 <b>Income tax</b>	
First K39,600 x 0%	0
Next K9,600 x 25%	2,400
Next K25,200 x 30%	7,560
Balance K85,600 x 37.5%	<u>32,100</u>
Income tax payable for 2018	42,060
Less: Income tax already paid – PAYE	<u>(52,047)</u>
Excess amount refundable	<u>(9,987)</u>

- (c) **Deferred tax** liability represents taxes that a company would have had to pay under its regular financial accounting but that it has deferred to the future by way of the tax legislation. Deferred tax normally results in a liability being recognised within the statement of financial position. IAS 12 *Income Taxes* defines a deferred tax liability as being the amount of income tax payable in future periods in respect of taxable temporary differences. So, deferred tax is tax that is payable in the future. Temporary differences are defined as being differences between the carrying amount of an asset (or liability) within the statement of financial position and its tax base i.e. the amount at which the asset (or liability) is valued for tax purposes by the relevant tax authority.

A **deferred tax liability arises** when a company's real-world tax bill is lower than what its financial statements suggest it should be due to differences between tax accounting rules and standard accounting practices. The liability signals to observers that the company remains under a tax obligation.

The tax code allows companies to essentially keep two sets of books: one for their regular financial accounting – their internal bookkeeping and the financial statements they make available to investors, regulators and the public – and one for their income taxes. This is because standard accounting rules and the tax code differ in key areas such as revenue and expense recognition and asset depreciation. In their regular accounting, companies aim to maximise the profits they can show to shareholders. In their tax accounting, though, they benefit by pushing profits into the future, reducing their tax burden now and allowing them to invest money rather than pay it to the government. This dual accounting is legal as long as a company is shifting its responsibilities among years rather than illegally evading them.

Temporary differences are defined as being differences between the carrying amount of an asset (or liability) within the statement of financial position and its tax base i.e. the amount at which the asset (or liability) is valued for tax purposes by the relevant tax authority.

Taxable temporary differences are those on which tax will be charged in the future when the asset (or liability) is recovered (or settled).

(d) Computation of deferred tax liability as at 31 March 2018

	K'000
Accelerated capital allowances	10,000
Loss relief being carried forward	(4,500)
General provision (disallowed for tax purposes)	<u>(600)</u>
Net temporary differences	<u>4,900</u>

Deferred tax liability = 35% x K4,900,000 = K1,715,000

**END OF SOLUTIONS**