L-Università ta' Malta

MATRICULATION AND SECONDARY EDUCATION CERTIFICATE
EXAMINATIONS BOARD

**SECONDARY EDUCATION APPLIED CERTIFICATE LEVEL
2021 SUPPLEMENTARY SESSION**

SUBJECT:	**Information Technology**
PAPER NUMBER:	Synoptic – Unit 1
DATE:	3rd November 2021
TIME:	9:00 a.m. to 11:05 a.m.

THIS PAPER SHOULD BE RETURNED TO THE INVIGILATOR AFTER THE EXAMINATION.

Answer **ALL** questions in the space provided. You may answer either in English or in Maltese.

Scenario

- 'PencilBox' is a new stationery which has just opened in Kirkop.
- The owner of the stationery, Rita, is not very enthusiastic about computers.
- However, she knows that computers are required for the day-to-day business activities.

Question 1   **K-1 (6 marks)**

a. List **FOUR** different types of computer systems, except for desktop computer and laptop.

Computer system 1: _____ (0.5)

Computer system 2: _____ (0.5)

Computer system 3: _____ (0.5)

Computer system 4: _____ (0.5)

b. Rita wants to buy a new computer system and needs new input and output devices. From the box below, select an appropriate input or output device for each situation.

> Mouse, 2D-Printer, Keyboard, Speakers

i. Rita needs a device to type documents and emails. Which device should she buy?

_____ (1)

ii. Rita wants to play some background music while at the stationery. Which device should she buy?

_____ (1)

c. Rita needs a USB flash drive (pendrive) to store data. Outline **TWO** properties of this storage device.

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_____ (2)

Question 2   **C-1 (12 marks)**

- Rita is not sure which computer system to buy for her shop.

a. The computer will be used to keep client details and print documents. The computer will only be used in the shop. Rita is thinking of buying Computer A.

Table 1: Computers Specifications

	Computer A	**Computer B**
Type	Desktop computer	Laptop
RAM	8GB DDR4	8GB DDR4
CPU	3.5GHz	2.2GHz
Screen size	24"	16"
Weight	5.5kg	2kg
Cost	€700	€650

Justify why Rita should buy Computer A and not Computer B in terms of speed and portability.

Justification in terms of speed: _____

_____

_____ (2)

Justification in terms of portability: _____

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_____ (2)

b. i. Rita bought Barcode Reader A for her stationery. Justify this decision with respect to specifications and after-sales service.

Table 2: Barcode Readers Specifications

	Barcode Reader A	**Barcode Reader B**
Type	Hand-held	Fixed
Warranty	3 years	2 years

Justification in terms of specifications: _____

_____

_____

_____ (1)

This question continues on next page.

Justification in terms of after-sales service: _____

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_____

_____ (1)

ii. Rita also bought a printer to print reports and documents. She bought Printer B. Justify her choice in terms of use and cost.

Table 3: Printers Specifications

	Printer A	**Printer B**
Type	Inkjet	Laser
Colour output	Colour	Black and White
Input tray capacity	50 papers	150 papers
Consumable cost per page	€0.05	€0.01
Cost	€50	€100

Justification in terms of use: _____

_____

_____ (1)

Justification in terms of cost: _____

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_____ (1)

c. Rita bought Storage Device A to backup documents on a daily basis in order to ensure that a copy of the data is available in case of data loss. Justify this decision in terms of capacity and storage technology.

Table 4: Storage Devices Specifications

	Storage Device A	**Storage Device B**
Type	External HDD	External SSD
Capacity	4TB	1TB
Cost	€115	€129

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_____ (4)

Question 3   **K-3 (8 marks)**

Rita wants to know more about the internal hardware components of a computer system.

a. Label the following internal hardware components.

Source: https://en.wikipedia.org/

_____ (1)

Source: https://www.ebuyer.com/

_____ (1)

This question continues on next page.

b. List **FOUR** reasons for which a computer upgrade may be required.

Reason 1: _____

_____ (0.5)

Reason 2: _____

_____ (0.5)

Reason 3: _____

_____ (0.5)

Reason 4: _____

_____ (0.5)

c. Outline **FOUR** implications of upgrading a computer system.

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_____ (4)

Question 4   **K-5 (8 marks)**

One of the employees, was explaining to Rita about the importance of documenting a Replacement/Installation/Upgrade (RIU) of a computer system.

a. Name **TWO** sections which form part of a Replacement/Installation/Upgrade (RIU) documentation.

Section 1: _____ (1)

Section 2: _____ (1)

b. Outline the content of the **TWO** sections mentioned in Question 4a.

Content of section 1: _____

_____

_____ (1)

Content of section 2: _____

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_____ (1)

c. Describe **TWO** reasons why it is important to document a Replacement/Installation/Upgrade (RIU).

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_____ (4)

Question 5   **K-7 (8 marks)**

- Rita wants to install some software on the computer system, after a recent format.

a. Name **TWO** different types of software:

Type of software 1: _____ (1)

Type of software 2: _____ (1)

b. List **TWO** examples for each type of software named in Question 5a.

Examples for type of software 1

Example 1: _____ (0.5)

Example 2: _____ (0.5)

Examples for type of software 2

Example 1: _____ (0.5)

Example 2: _____ (0.5)

c. Differentiate between the two types of software named in Question 5a. You are required to differentiate on **TWO** aspects.

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_____ (4)

Question 6   K-8 (8 marks)

Whilst searching online, Rita found out that it is best to create different user accounts for different employees.

a. List **TWO** different types of local user accounts.

Type of local user account 1: _____ (1)

Type of local user account 2: _____ (1)

b. Describe the purpose of each local user account listed in Question 6a.

Description of local user account 1: _____

_____

_____ (1)

Description of local user account 2: _____

_____

_____ (1)

This question continues on next page.

c. Outline **TWO** advantages and **TWO** disadvantages of online user accounts.

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_____ (4)

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