UGANDA INSTITUTE OF INFORMATION AND COMMUNICATIONS TECHNOLOGY
END OF SEMESTER ONE EXAMINATIONS

ACADEMIC YEAR 2024/2025

DEPARTMENT: ICT

SEMESTER: ONE

PROGRAMME(S): DIPLOMA IN COMPUTER SCIENCE (DCS)

YEAR OF STUDY: ONE

COURSE: FUNDAMENTALS OF ICT

COURSE CODE : ICT111

DATE: WEDNESDAY 18TH DECEMBER, 2024

TIME: 8:00 AM – 11:00 AM

DURATION: 3 HOURS

INSTRUCTIONS:

(i) This paper contains three Sections: A & B (40 marks) & C (60 marks).

(ii) Attempt ALL questions in Sections A and B, and ONLY THREE questions in Section C.

(iii) All questions carry equal marks.

(iv) DO NOT write on this question paper.

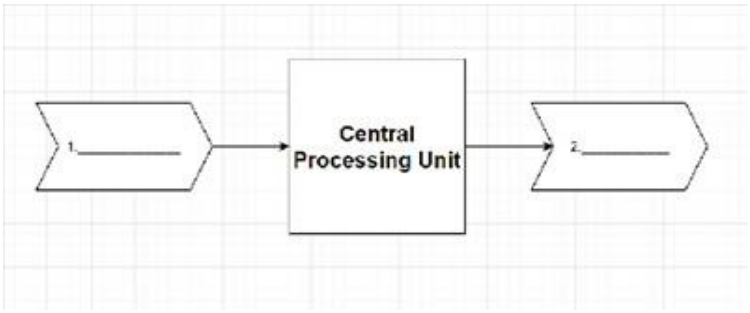
(v) Create a folder on the desktop, give it your Name, RegNo and Session where you will save all your work.

Attempt **ALL** the Questions in Sections A and B.

SECTION A [20 MARKS]

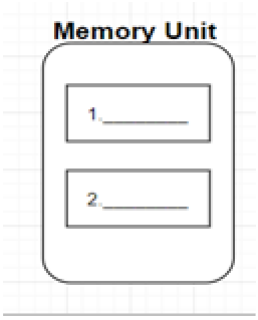
Write the correct alternative in the answer booklet provided (1 mark @)

1. 1 yottabyte = _____
   A. 1024 TB B. 1024 EB C. 1024 ZB D. 1024 PB
2. Which of the following is not a function of the Input Unit?
   A. It reads instructions and data from the outside world.
   B. It converts the data into computer acceptable format.
   C. It makes the data into user understandable format.
   D. It supplies the data and instructions to the computer for further processing
3. Label the parts 1 and 2:



   A. 1.ALU 2. MU B. 1.Output unit 2.Input Unit
   C. 1.MU 2. ALU D. 1.Input Unit 2.Output Unit
4. PCI stands for_____
   A. Peripheral Component Interconnect B. Partial Component Interconnect
   C. Peripheral Component Interaction D. Partial Component Interaction
5. Which of the following is not a function of the Output Unit?
   A. It produces results that can be easily understood by the user
   B. It accepts the results produced by the computer
   C. It supplies the data and instructions to the outside world
   D. It supplies the data and instructions to the computer for further processing
6. Components that provide internal storage to the CPU are
   A. Registers B. Program Counters
   C. Controllers D. Internal chips
7. Saving data and instructions to make them readily available is the job of _____
   A. Storage Unit B. Cache Unit C. Input Unit D. Output Unit
8. Which of the following is used to hold running program instructions?
   A. Primary Storage B. Virtual Storage
   C. Internal Storage D. Minor Devices

9. The two basic types of memory in a computer are



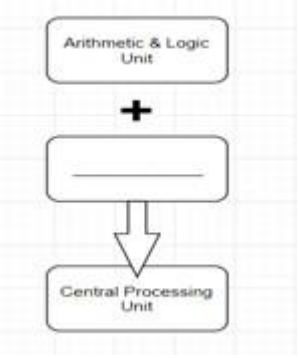
A. Primary and major B. Primary and Secondary
C. Minor and Major D. Main and virtual

10. Which of the following is non-volatile storage?
A. Backup B. Secondary C. Primary D. Cache

11. The ALU gives the output of the operations and the output is stored in the _____
A. Memory Devices B. Registers C. Flags D. Output Unit

12. The process of division on memory spaces is called _____
A. Paging B. Segmentation C. Bifurcation D. Dynamic Division

13. Fill in the blank in the diagram.



A. Input Unit B. Memory Unit C. Control Unit D. I/O Unit

14. The physical devices of a computer are referred to as _____:
A. Software B. Package C. Hardware D. System Software

15. Software Package is a group of programs that solve a multiple problem.
A. True B. False

16. The interpreter is used as a translator for _____
A. Low level language B. High Level Language
C. COBOL D. C

17. What do you call a specific Instruction designed to do a task?
A. Command B. Process C. Task D. Instruction

18. The following normally interact with the system via use interface provided by the application software.
A. Programmers B. Developers C. Users D. Testers

19. The rules that give meaning to the instructions is referred to as _____ .
    A. Semantics B. Syntax C. Code D. Cases
20. What does SVGA stands for?
    A. Standard Visual Graphics Array B. Super Visual Graphics Array
    C. Standard Video Graphics Array D. Super Video Graphics Array

SECTION B

a) i) What is Internet? **(2 marks)**
   ii) Write two advantages and two disadvantages of internet? **(4 marks)**
b) Define a URL and give two examples? **(4 marks)**
c) Differentiate between the following terms.
   i) a website and a web page. **(4 marks)**
   ii) a static webpage and a dynamic webpage **(4 marks)**
   iii) Give examples of a static webpages and a dynamic webpage **(2 marks)**

SECTION C [60 MARKS]

Attempt **ONLY THREE** Questions in this Section.

Question 1
The table shows end of year 2024 promotion results of P.6 pupils from Kisenyi Primary School. Enter the data in a spreadsheet and save the file as **Kisenyi-your registraton number,** e.g **Kisenyi-2024- DCS-Day-2999/G. (5 marks)**

INDEX No.	NAME	MTC	ENG	SST	SCI	TOTAL	AVE	COMMENT
Ug056/01	Mudde Mike	56	70	80	54			
Ug056/02	Ohoko John	76	60	56	67			
Ug056/03	Namire Flavia	46	47	82	68			
Ug056/04	Majingo Fred	65	45	67	76			
Ug056/05	Tusabe Fahad	65	50	70	82			
Ug056/06	Lulenzi Joseph	48	67	67	78			
Ug056/07	Apio Oliver	87	48	80	56			
Ug056/08	Kisakye Mercy	76	67	70	56			
Ug056/09	Tawoda Isa	60	81	67	56			
Ug056/010	Gumire Deo	70	50	67	58			

a) Use a suitable function to calculate the total marks scored by each pupil **(2 marks)**
b) Use a suitable function to compute the average marks scored by each pupil **(2 marks)**
c) If students with an average of 65 and above are to be **PROMOTED** to P.7, pupils with an average between 50 and 65 are to **REPEAT P.6** while

students with an average of 50 and below should **TRY ANOTHER SCHOOL.** Use a suitable function to generate the above uppercase comments accordingly. **(3 marks)**

d) Sort the data in ascending order by name. **(2 marks)**

e) Sum up the total marks scored by all pupils in **MTC, ENG, SST** and **SCI.** **(2 marks)**

f) Use the sums obtained in (Vi) above to create a Pie-chart showing the subject performance. **(2 marks)**

g) Add your name and index number as a footer on your worksheet. **(2 marks)**

Question 2

Assuming that one of your pals who is a friend of the environment is going to make a presentation at an international environment conference on the theme – "We both Love and Care for the Environment or Perish". Help him/her to prepare a six slide professional presentation putting the following into consideration:

a) Individual slides to highlight the following;

i) Slide 1- Title slide: contains theme, name of presenter and qualifications. **(3 marks)**

Slide 2: Meaning of environment. **(2 marks)**

Slide 3: At least four reasons for caring about the environment in bullet form . **(5 marks)**

Slide 4: At least four effects of climate-change on the environment. **(4 marks)**

Slide 5: Should contain how to combat climate-change. **(3 marks)**

Slide 6: Enemies of the environment and conclusion. **(2 marks)**

b) Save your presentation as Climate-Your registration e.g **Climate-2024-DCS-Day-0007** in your folder on the desktop. **(1 mark)**

Question 3

The table below contains names of students of some schools who attended a computer studies' seminar last year.

a) Open a word processor of your choice and enter the following information. **(7 marks)**

Name	Sex	Class	School	Status
Abu	M	S.3	Mudako S.	Not Paid
Nyachwo	F	S.4	Toda S.	Paid
Opendi. B.	M	S.4	Torot S.	Paid
Guddi	M	S.3	Manya C.	Not Paid
Oyitangol	M	S.4	Muku H.	Paid
Omadi G.	M	S.4	Rocker H.	Not Paid

Musana	M	S.4	Ogulutu	Paid
Wabomba	F	S.2	THS	Paid
Gutto F	F	S.4	THS	Paid
Zainab	F	S.3	Osukutu	Paid

b) Add a row to the top of the table, merge its cells and insert there a suitable title for the table. **(3 marks)**
c) Enter any four other records in the table with names from Hugga S.S. **(2 marks)**
d) Centre all the table content. **(4 marks)**
e) Copy the new table to two other pages and insert page numbers at the top of each page using i, ii, iii ….number format. **(3 marks)**
f) Save your work as Seminar-Your registration e.g. Seminar **-2024-DCS-Day-0007** in your folder on the desktop. **(1 mark)**

Question 4

a) Create a database called Customer -Your registration e.g., Customer**-2024-DCS-Day-0007** **(1 mark)**
b) Create a table with the information below and name it - customer table. Use appropriate data types. **(4 marks)**

Id No.	Name	Gender	Title	Sales revenue	Cost of goods sold
U12201	Ham	Male	W.seller	12,000	9,500
U15421	Beth	Male	Retailer	8,500	6,100
U62452	Kit	Female	W.seller	10,200	8,200
U45781	Harry	Male	Retailer	6,000	4,200
U14202	Alpha	Male	Agent	15,000	7,200
U34752	Chris	Male	W.seller	62,000	400,000
U21123	Maggie	Female	W.seller	74,000	51,000
U17650	Morene	Male	Retailer	5,600	2900
U12431	Francesca	Female	Retailer	8,300	1500
U18214	Keith	Male	Agent	20,300	10,000
U19402	Alvin	Male	w.seller	16,000	12,100
U 14352	Grace	Female	Agent	4,500	1,300

c) Display the entire data in a form and call it **"Patients" form"** **(2 marks)**
d) Create a query to retrieve all w. sellers and name it **"W.seller"** **(2 marks)**
e) Create a query to retrieve all male customers Name it **"Males"** **(2 marks)**
f) Create a report to show male agents. Name it **"Male agents"** **(2 marks)**
g) Create a query to retrieve the sales revenue ranging 10,000 and 30,000. **(3 marks)**
h) Sort the names of the customers in alphabetical order. **(2 marks)**
i) Create a report to show all the records. Name it **"ALL records"** **(2 marks)**