

HSE Examination, March 2022

Computer Application – Commerce

Answer Key(Unofficial)

Part 1 – A

(Answer any 5 questions from 1 to 9. 1 mark each)

1. Write an example for entry controlled loop in C++.

Ans : while, for(any one)

2. Accessing each element of an array atleast once is known as

Ans : array traversal

3. Name the builtin function used to find the square root of a number

Ans : sqrt()

4. Which tag is used to include scripts in HTML page

Ans : <SCRIPT>

5. Write an example for FTP client software

Ans : FileZilla, CuteFTP, SmartFTP (any one)

6. In RDBMS, Columns of a relation is known as

(Entity, Tuple, Attribute)

Ans : Attribute

7. Pick the DDL Command

(CREATE, SELECT, GRANT)

Ans : CREATE

8. Write an example for ERP package.

Ans : Oracle, Odoo, SAP, Microsoft Dynamics, Tally ERP (any one)

9. Name any one mobile operating System

Ans : Android, ios, blackberry, windows (any one valid example)

Part 1 – B

(Answer all questions from 10 to 13. 1 mark each)

10. statement is used to skip the current iteration of loop.

(Break, Continue, Go to)

Ans : Continue

11. The port number used for HTTP is

(80, 110, 443)

Ans : 80

12. Name the tag used to divide browser window

Ans : <FRAMESET>

13. Pick the CARTESIAN PRODUCT operator

(U, X, n)

Ans : X

Part 2 -A

(Answer any 2 questions from 14 to 17. 2 marks each)

14. List the input and output function used to handle strings with white spaces.

Ans : gets() and puts()

15. Briefly explain free hosting.

Ans : Free hosting provides web hosting services free of charge. It is useful for sharing content on the web among family or friends groups, nonprofit organisations etc. Without spending money on web hosting.

16. List 4 DML commands in SQL

Ans : INSERT, SELECT, UPDATE, DELETE

17. List any 4 benefits of ERP

Ans :

1. Improved Resource utilization
2. Better customer satisfaction
3. Provide accurate information
4. Decision making capability
5. Increased flexibility

(Any four points)

Part 2 – B

(Answer all questions from 18 to 20. 2 marks each)

18. What are default arguments?

Ans : Initialised formal arguments are known as default arguments. This value will be taken if no other values are assigned. Eg int sum(int x=10, y=20)

19. What do you mean by responsive web designing?

Ans : Designing webpages which are capable of adjusting itself according to the screen size of the device is known as responsive web design.

20. Name any 4 aggregate functions in SQL.

Ans : sum(), avg(), min(), max()

Part 3 – A

(Answer any 3 questions from 21 to 24. 3 marks each)

21. Explain any three data types in C++

1. int – whole numbers . Size : 4 bytes
2. float – floating point/ fractional numbers . Size : 4 bytes
3. double – big floating point numbers . Size : 8 bytes
4. char – characters. Size : 1 byte
5. void – empty data. Size : 0 bytes

(Any three points)

22. List and explain any three attributes of <BODY>tag.

1. bgcolor : used for setting background colour of page
2. background : used for setting background image of page
3. text : used for setting text (foreground) colour of page
4. Link : It specifies the colour of the hyperlinks that are not visited . The default colour is blue.
5. Alink : It specifies the colour of the active hyperlink. The default colour is green.
6. Vlink : It specifies the colour of the hyperlink which is already visited. The default colour is purple.

(Any three points)

23. Explain any three builtin functions in JavaScript

1. alert() : used for displaying message box.
2. toUpperCase() : This function returns the upper case form of the given string.
3. toLowerCase() : It returns the lower case form of the given string.
4. isNaN() function : This function is used to check whether a value is a number or not. In this function, NaN stands for Not a Number. The function returns true if the given value is not a number.
5. charAt() function It returns the character at a particular position.

(Any three points)

24. Explain any three database users.

1. Database Administrator (DBA): The person who is responsible for the control of the centralized and shared database is the Database Administrator (DBA).
2. Application Programmers : Application programmers are computer professionals who interact with the DBMS through application programs.
3. Sophisticated Users : Users include engineers, scientists, business analysts, and others who are thoroughly familiar with the facilities of the DBMS.
4. Naive Users : Naive users interact with the system through application programmers. People accessing data over the web, clerical staff in an office, billing clerk in a supermarket or hotels, bank clerk, etc. are examples of some naive users.

(Any three points)

Part 3 – B

(Answer any 2 questions from 25 to 27 . 3 marks each)

25. list and explain any three types of statements in C++.

1. declaration statement : used for creating variables. eg : int a;
2. assignment statement : used for storing values in variables eg : a= 10;
3. input statement : used for inputting values from keyboard. eg : cin>> a;
4. output statement : used for displaying output in monitor. eg : cout<<a;

(Any three points)

26. What is an array? Initialise an array with three elements.

Arrays are used for storing multiple values of same data type in continuous memory locations.

```
int arr[3] = { 5, 6, 9 };
```

27. Write HTML code to display the following

H₂SO₄

a² + b² + 2ab

(a). H₂SO₄

(b). a²+b²+2ab;

Part 4 – A

(Answer any 3 questions from 28 to 31. 4 marks each)

28. Explain any two looping statements in C++ with syntax.

1. for loop – used for executing block of statements repeatedly for a given number of times.

It is an entry controlled loop.

for loop

The syntax of for loop is

```
for(initialization; checking ; update loop variable)
```

```
{
```

```
Body of loop;
```

```
}
```

example :

```
for( i=0; i<10; i++)
```

```
{
```

```
cout<<i;
```

```
}
```

2. do – while statement: used for executing block of statements repeatedly based on a condition.It is an exit controlled loop.

Syntax:

initialise loop control variable

do

```
{
```

```
Statements
```

```
} while(expression);
```

example :

```
i=0;
```

```
do
```

```
{
```

```
cout<<i;
```

```
i++;
```

```
}
```

29. Compare call by value and call by reference method used in C++ functions.

Call by Value Method	Call by Reference Method
<ul style="list-style-type: none">• Ordinary variables are used as formal parameters.• Actual parameters may be constants, variables or expressions.• The changes made in the formal arguments do not reflect in actual arguments.• Exclusive memory allocation is required for the formal arguments.	<ul style="list-style-type: none">• Reference variables are used as formal parameters.• Actual parameters will be variables only.• The changes made in the formal arguments do reflect in actual arguments.• Memory of actual arguments is shared by formal arguments.

30. List and explain any four text formatting tags in HTML

1. and : To make the text bold face.
2. <I> and : To make the text italics or emphasis.
3. <U> : To underline the text
4. <S> and <STRIKE> : To strike through the text
5. <BIG> : To make the text big sized
6. <SMALL> : To make the text small sized
7. <SUB> : To make the text subscripted(X 2)
8. <SUP> : To make the text superscripted(X 2)
9. <Q> : To enclose the text in “double quotes”
10. <PRE> - Displaying preformatted text
11. <ADDRESS> - Displaying the address.

(Any four points)

31. Name any four category of operators in JavaScript. Give one example for each.

1. arithmetic operators. Eg / (divide)
2. relational operators. Eg > (greater than)
3. logical operators. Eg & (logical AND)
4. String concatenation operator. +
5. assignment operator Eg : =

(Any four points)

Part 4 – B

(Answer any 1 question from 32 to 33. 4 marks)

32. Write the HTML code to generate the following nested list in a web page.

- Kerala
 1. Alappuzha
 2. Moonnar
- Karnataka
 1. Bangalore
 2. Mysore

```
<UL>
  <LI> Kerala </LI>
    <OL>
      <LI> Alappuzha </LI>
      <LI> Moonnar </LI>
    </OL>
  <LI> Karnataka
    <OL>
      <LI> Bangalore </LI>
      <LI> Mysore </LI>
    </OL>
</UL>
```

33. Explain ICT Applications in business.

Business Logistics : Business logistics is the management of the flow of goods/resources in a business between the point of origin and the point of consumption in order to meet the requirements of customers or corporations.

Big data analytics : It is the process of examining large data sets containing a variety of data types to uncover hidden patterns, market trends, customer preferences and other useful business information.

Social Networks : Business firms use social media information for better understanding of their markets. They use data from the social media, search history and browsing patterns of users for their planning.

e-Commerce covers business transaction that involve exchange of money,

Electronic Payment System (EPS): A system of financial exchange between buyers and sellers in an online environment is called an **Electronic Payment System (EPS)**.

E-Banking or electronic banking is defined as the automated delivery of banking services directly to customers through electronic channel.

Part 5

(Answer any 2 questions from 34 to 36. 6 marks each)

34. Write the complete code to display the following table in a web page

RollNo	Name
1	Arya
2	Arun

```
<HTML>
  <BODY>
    <TABLE>
      <TR align= center>
        <TH> RollNo </TH>
        <TH> Name </TH>
      </TR>
      <TR align= center>
        <TD> 1 </TD>
        <TD> Arya </TD>
      </TR>
      <TR align= center>
        <TD> 2 </TD>
        <TD> Arun </TD>
      </TR>
    </TABLE>
  </BODY>
</HTML>
```

35. List and explain advantages of DBMS.

1. Control data redundancy: In database data is stored in a single place any changes made will reflect everywhere. There is no chance of duplicate data.
2. Data consistency: Data consistency is ensured in a database because there is no data redundancy.
3. Efficient data access: fast and accurate data access.
4. Data integrity: Data integrity refers to the overall completeness, accuracy and consistency of data in the database.
5. Data security: use of passwords, the information in a database is made available only to authorized persons.
6. Sharing of data: The data stored in the database can be shared among several users or programs even simultaneously and each may use it for different purposes.
7. Enforcement of standards: With central control of the database, a Database Administrator (DBA) defines and enforces the necessary standards.
8. Crash recovery: DBMS provides some mechanism to recover data from the crashes.

36. Write SQL query to create a table with following details.

Attributes	Types	Description
AccNo	Numeric	Primary Key
Name	String	30 char
Gender	Char	Default 'M'
Amount	Numeric	NOT NULL

- a. CREATE TABLE bank (
 (AccNo int Primary Key,
 Name Varchar(30),
 Gender Char(1) Default 'M',
 Amount dec(6,2) NOT NULL);
- b. SELECT * FROM bank;
- c. SELECT * FROM bank WHERE Gender = 'M' and Amount > 5000;