

**CSC&CSM – Database and
Web Design**

T096

Wednesday, 16/11/2016

08:30 – 11:30

WORKFORCE DEVELOPMENT AUTHORITY



P.O. BOX 2707 Kigali, Rwanda Tel: (+250) 255113365

**ADVANCED LEVEL NATIONAL EXAMINATIONS, 2016,
TECHNICAL AND PROFESSIONAL STUDIES**

EXAM TITLE: Database and Web Design

**OPTIONS: Computer Science (CSC)
Computer Science and Management (CSM)**

DURATION: 3hours

INSTRUCTIONS:

The paper is composed of **three (3) main Sections** as follows:

Section I: Fourteen (14) compulsory questions.	55 marks
Section II: Attempt any three (3) out of five questions.	30 marks
Section III: Attempt any one (1) out of three questions.	15 marks

Note:

Every candidate is required to carefully comply with the above instructions. Penalty measures will be applied on their strict consideration.

Section I. Fourteen (14) Compulsory questions**55marks**

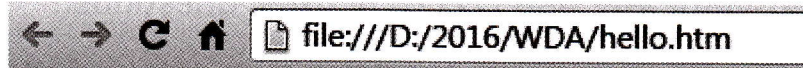
01. What is Database Management System? **2 marks**
02. Define the relational database. **2 marks**
03. Contrast the database approach and file approach. **5 marks**
04. Differentiate “weak entity” from “strong entity”. **3 marks**
05. Write a SQL statement to remove the column “Department” from Table “Students”. **3 marks**
06. Differentiate HTTP from FTP. **3 marks**
07. Give the description of the following tags: **5 marks**

Tags	Description
<html>	
<body>	
<!DOCTYPE- - ->	

08. In HTML, all attributes are made of two parts. Define those parts. **5 marks**
09. Give the functions of the following attributes: **5 marks**

Attribute	Functions
align	
valign	
bgcolor	
background	
id	

10. Create a HTML code to give the output below: **5 marks**



Hello
You delivered your assignment on time.
Thanks
Web Instructor

11. Define a web server. **5 marks**
12. When horizontal lines are used in HTML and what is the corresponding tag? **2 marks**

13. Define the following:

- a. Domain
- b. Entity
- c. One to many relationship

5 marks

14. SQL statements can be executed into four different methods.

Define these methods.

5 marks

Section II. Choose and answer any three (3) questions.

30marks

15. Write the HTML codes of the following output.

10 marks

List1	List2	List3
yellow	Apple	table
blue	Mango	chair
orange	banana	desk

16. Consider the table BOOKS below:

10 marks

BookID	Bookname	Edition	Author	Publisheddate
B001	C++	Ed2	H.olivier	1997
B002	Database	Ed1	P. Albert	2001
B003	VB	Ed3	M.Claude	1985
B004	Webdesign	Ed1	J.Mata	1998

By using the table above, write the SQL commands to do the following:

- a. List the all Books records
- b. What are the books that were published before 2001?
- c. Delete the books that were published in 1985
- d. Change the edition of database to Ed2

17. What does Domain name mean? State four country code top level domains and four generic domains you know.

10 marks

18. Define a spam, and hence states different ways of avoiding spammers.

10 marks

19. As a designer of websites states rules according to **JACOB NIELSEN** that need to be considered while designing.

10 marks

Section III. Choose and answer any one (1) question.

15marks

20. A) Explain: Entity, Entity Type and Entity Set.

B) Explain the two SQL command subgroups DML and DDL and list their corresponding statements?

C) List all the possible values that can be stored in a BOOLEAN data field.



15 marks

21. Talk about the application and differentiate the following tags:

A) ID and Class

B) SPAN and DIV

15 marks

22. A) Define a schema.

B) Explain the difference between TRUNCATE and DELETE commands.

C) Consider the following table STUDENT.

ID.NO	NAME	OPTION
0001	Patrick	CSC
0002	Moses	CSM
0003	Richard	TOR
0004	Emmanuel	ACC

1) Write a SQL command which will show the **ID.NO** of Moses.

2) Write a SQL command which will count the number of rows existing in STUDENT table.

3) Get names from STUDENT table in upper case.

15 marks

is a set of atomic