

**HALF YEARLY EXAM MARKING SCHEME**  
**(2023-24)**  
**CLASS XII**  
**COMPUTER SCIENCE (083)**

SECTION A		
1.	FALSE	1
2.	b. 6,20	1
3.	c. -244.0	1
4.	a. 2	1
5.	b. Domain	1
6.	b. -	1
7.	a. Day={1:'monday',2:'tuesday',3:'wednesday'}	1
8.	b. ceieP0	1
9.	b. tup.insert(2,3)	1
10.	d. sum()	1
11.	TRUE	1
12.	a. 0	
13.	c. A candidate key that is not a primary key is a foreign key.	1
14.	c. Distinct	1
15.	c. global b	1
16.	(d)Real	1
17.	c	1
18.	a	1

SECTION B		
19.	e. All of these	2
20.	<b>def ....</b> <b>while num &gt;0:</b> <b>    rem=num%10</b> <b>return rev</b>	2
21.	A foreign key is the one that is used to link two tables together via the primary key. It means the columns of one table points to the primary key attribute of the other table.	2

studentId	firstName	lastName	courseId
L0002345	Jim	Black	C002
L0001254	Jamie	Harradine	A004
L0002349	Arrende	Holland	C002
L0001198	Simon	McClard	S042

Foreign Keys

Relationship

Primary Keys

courseId	courseName
A004	Accounts
C002	Computing
P001	History
S042	Short Course

22. (a) @20 otnmx SC@

(b) dict\_items([('name', 'Aman'), ('age', 27), ('address', 'Delhi')])

2

23. (a) print(my\_exam[: :2])  
(b) {'age': 26} Aman

2

24. Count(class) will count number of non null entries in column class; however count(\*) will count total number of rows in a table.

2

OR

DDL : alter, drop

DML : insert, update

25. 13#

2

OR

(22, 44, 66)

### SECTION C

26. PLACES={1:"Delhi", 2:"London", 3:"Paris", 4:"New York", 5:"Dubai"}  
 for countNow(PLACES):  
 for place in PLACES.values():  
 if len(place)>5:  
 print(place.upper())  
 countNow(PLACES)

3

27.	<table border="1" data-bbox="169 121 809 289"> <thead> <tr> <th>Acode</th> <th>Name</th> <th>Type</th> <th>City</th> </tr> </thead> <tbody> <tr> <td>A01</td> <td>Amrita</td> <td>Savings</td> <td>Delhi</td> </tr> <tr> <td>A01</td> <td>Amrita</td> <td>Savings</td> <td>Nagpur</td> </tr> <tr> <td>A02</td> <td>Parthodas</td> <td>Current</td> <td>Mumbai</td> </tr> </tbody> </table> <p>(a)</p> <pre data-bbox="215 386 333 527"> DISTINCT TID 101 NULL 102 104 103 </pre> <p>(b) (i)</p> <table border="1" data-bbox="179 573 498 636"> <thead> <tr> <th>TID</th> <th>COUNT(*)</th> <th>MIN(FEES)</th> </tr> </thead> <tbody> <tr> <td>101</td> <td>2</td> <td>12000</td> </tr> </tbody> </table> <p>(ii)</p> <pre data-bbox="186 688 502 772"> CNAME Digital marketing Mobile Application Development </pre> <p>(iii)</p> <p>(iv) 15500</p>	Acode	Name	Type	City	A01	Amrita	Savings	Delhi	A01	Amrita	Savings	Nagpur	A02	Parthodas	Current	Mumbai	TID	COUNT(*)	MIN(FEES)	101	2	12000	1 2
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101	2	12000																						
28.	<pre data-bbox="141 856 1019 1287"> def COUNTLINES () :     file = open ('TESTFILE.TXT', 'r')     lines = file.readlines()     count=0     for w in lines :         if (w[0]).lower() not in 'aeoiu'             count = count + 1     print ("The number of lines not starting with vowel: ", count)     file.close()  COUNTLINES () </pre>	3																						
29.	<p>(i)</p> <pre data-bbox="134 1415 519 1524"> UPDATE Personal SET Salary=Salary + Salary*0.5 WHERE Allowance IS NOT NULL; </pre> <p>(ii)</p> <pre data-bbox="134 1566 949 1598"> SELECT Name, Salary + Allowance AS "Total Salary" FROM Personal; </pre> <p>(iii)</p> <pre data-bbox="134 1646 687 1677"> DELETE FROM Personal WHERE Salary&gt;25000; </pre>	3																						
30.	<pre data-bbox="134 1686 428 1829"> def Push_element(cust):     if cust[2]=="Goa":         L1=[cust[0],cust[1]]         status.append(L1)  def Pop_element ():     num=len(status)     while len(status)!=0: </pre>	3																						

<pre> dele=status.pop() print(dele) num=num-1 else: print("Stack Empty") </pre>	
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SECTION D		
31.	<pre> stackItem=[] def Push(SItem): count=0 for k in SItem: if (SItem[k]&gt;=75): stackItem.append(k) count=count+1 print("The count of elements in the stack is : ", count) </pre>	3+1
32.	<p>(i) pickle</p> <p>(ii) fout=open('temp.dat', 'wb')</p> <p>(iii)</p> <p>Statement 3: pickle.load(fin)</p> <p>Statement 4: pickle.dump(rec,fout)</p>	<p>1</p> <p>1</p> <p>2</p>

SECTION E		
33.	<p>(i) All keys that have the properties to become a primary key are candidate keys. The candidate keys that do not become primary keys are alternate keys.</p> <p>(ii)</p> <pre> import mysql.connector as mysql con1 = mysql.connect(host="localhost",user="root", password="tiger", database="sample2023") mycursor=con1.cursor() query = "SELECT * FROM student where fee&gt;{}".format(5000) mycursor.execute(query) data=mycursor.fetchall() for rec in data: print(rec) con1.close() </pre>	<p>1</p> <p>4</p>
34.	<p>Advantage of a csv file:</p> <p>It is human readable – can be opened in Excel and Notepad applications</p> <p>It is just like text file</p>	1

```

import csv
def ADD():
    fout=open("record.csv","a",newline="\n")
    wr=csv.writer(fout)
    empid=int(input("Enter Employee id :: "))
    name=input("Enter name :: ")
    mobile=int(input("Enter mobile number :: "))
    lst=[empid,name,mobile] -----1/2 mark
    wr.writerow(lst) -----1/2 mark
    fout.close()

```

2

2

```

def COUNTR():
    fin=open("record.csv","r",newline="\n")
    data=csv.reader(fin)
    d=list(data)
    print(len(d))
    fin.close()

```

ADD()  
COUNTR()

1

35. (i)

Text files:

- Extension is .txt
- Data is stored in ASCII format that is human readable
- Has EOL character that terminates each line of data stored in the text files

Binary Files

- Extension is .dat
- Data is stored in binary form (0s and 1s), that is not human readable.

4

(ii)

```

def Searchtype (mtype) :
    fObj = open ("CINEMA.DAT", "rb")
    try:
        while True:
            data = pickle.load(fObj)
            if data[2] == mtype:
                print ("Movie number:",data[0])
                print ("Movie Name:",data[1])
                print ("Movie Type:",data[2])
    except EOFError:
        fObj.close()

```