QUESTION BANK

A FOUNTAIN TO QUENCH THE KNOWLEDGE THIRST



TOPICS COVERED

- Open Source Computing (Python)
- RDBMS and ORACLE
- Fundamentals of Computers and Communications
- Cloud Computing
- Programming in C Language

Mrs. G. AMALREDGE M.C.A., M.Phil.,

OPEN SOURCE COMPUTING

<u>UNIT – I</u>

MCO's

- 1. Who developed the Python language?
 - a) Zim Den
 - b) Guido van Rossum
 - c) Niene Stom
 - d) Wick van Rossum

Answer : b

- 2. In which year was the Python language developed?
 - a) 1995
 - b) 1972
 - c) 1981
 - d) 1989

Answer : d

- 3. Which one of the following is the correct extension of the Python file?
 - a) .py
 - b) .python
 - c) .p
 - d) None of these
 - Answer : a
- 4. In which year was the Python 3.0 version developed?
 - a) 2008
 - b) 2000
 - c) 2010
 - d) 2005

Answer : a

- 5. What do we use to define a block of code in Python language?
 - a) Key
 - b) Brackets
 - c) Indentation
 - d) None of these

Answer : c

6. Which character is used in Python to make a single line comment?

- a) /
- b) //
- c) #
- d) !

Answer : c

- 7. Which of the following is not a keyword in Python language?
 - a) val
 - b) raise

- c) try
- d) with

Answer : a

- 8. Which of the following statements is correct for variable names in Python language? a) All variable names must begin with an underscore.
 - b) Unlimited length
 - c) The variable name length is a maximum of 2.
 - d) All of the above

Answer : b

- 9. Which of the following operators is the correct option for power(ab)?
 - a) a ^ b
 - b) a**b
 - c) a ^ ^ b
 - d) a ^ * b

Answer : b

- 10. What is the type of inf?
 - a) Boolean
 - b) Integer
 - c) Float
 - d) Complex
 - Answer : c
- 11. What is the output of print 0.1 + 0.2 == 0.3?
 - a) True
 - b) False
 - c) Machine dependent
 - d) Error
 - Answer : b
- 12. Which of the following is not a complex number?
 - a) k = 2 + 3j
 - b) k = complex(2, 3)
 - c) k = 2 + 31
 - d) k = 2 + 3J
 - Answer : c
- 13. What is the result of cmp(3, 1)?
 - a) 1
 - b) 0
 - c) True
 - d) False
 - Answer : a
- 14. What arithmetic operators cannot be used with strings?
 - a) +
 - b) *
 - c) –

d) All of the mentioned **Answer : c**

- 15. What will be the output of the following Python statement? >>>"abcd"[2:]
 - 1. a
 - b) ab
 - c) cd
 - d) dc
 - Answer : c

16. What will be the output of the "hello" +1+2+3?

- a) hello123
- b) hello
- c) Error
- d) hello6

Answer : c

17. Say s="hello" what will be the return value of type(s)?

- a) int
- b) bool
- c) str
- d) String
- Answer : c

18. What will be the output of the following Python code?print("ab\tcd\tef".expandtabs()) a) ab cd ef

- a) ab cd b) abcdef
- c) ab $\tcd\tef$
- d) ab cd
- Answer : a
- 19. What is the maximum possible length of an identifier?

ef

- a) 31 characters
- b) 63 characters
- c) 79 characters
- d) none of the mentioned
- Answer : d
- 20. Which of the following is invalid?
 - a) $_a = 1$ b) $_a = 1$ c) $_str_{_} = 1$
 - d) none of the mentioned **Answer : d**
- 21. Which of the following is an invalid variable?
 - a) my_string_1
 - b) 1st_string
 - c) foo

d) _ Answer : b

- 22. Which of the following is not a keyword?
 - a) eval
 - b) assert
 - c) nonlocal
 - d) pass
 - Answer : a
- 24. Which of the following commands will create a list?
 a) list1 = list()
 b) list1 = []
 c) list1 = list([1, 2, 3])
 d) all of the mentioned
 Answer : d
- 25. What is the output when we execute list("hello")?a) ['h', 'e', 'l', 'l', 'o']
 b) ['hello']
 c) ['llo']
 d) ['olleh']
 Answer : a
- 26. Suppose list1 is [2445,133,12454,123], what is min(list1)?a) 2445
 b) 133
 c) 12454
 - d) 123 Answer : c
- 27. Suppose list1 is [1, 5, 9], what is sum(list1)?
 - a) 1
 - b) 9
 - c) 15
 - d) Error
 - Answer : c
- 28. Suppose list1 is [2, 33, 222, 14, 25], What is list1[-1]?
 - a) Error
 - b) None
 - c) 25
 - d) 2
 - Answer : c

- 29. Which of the following is a Python tuple?a) [1, 2, 3]
 b) (1, 2, 3)
 c) {1, 2, 3}
 d) {}
 Answer: b
- 30. Suppose t = (1, 2, 4, 3), which of the following is incorrect?
 a) print(t[3])
 b) t[3] = 45
 c) print(max(t))
 d) print(len(t))
 Answer : b
- 31. What will be the output of the following Python code?
 >>>t=(1,2,4,3)
 >>>t[1:-1]
 a) (1, 2)
 b) (1, 2, 4)
 c) (2, 4)
 d) (2, 4, 3)
 - Answer : c

32. What will be the output of the following Python code?

- >>>t = (1, 2) >>>2 * t a) (1, 2, 1, 2) b) [1, 2, 1, 2] c) (1, 1, 2, 2) d) [1, 1, 2, 2] Answer : a
- 33. Which of these about a set is not true?
 a) Mutable data type
 b) Allows duplicate values
 c) Data type with unordered values
 d) Immutable data type
 Answer : d
- 34. Which of the following is not the correct syntax for creating a set?a) set([[1,2],[3,4]])
 b) set([1,2,2,3,4])
 c) set((1,2,3,4))
 d) {1,2,3,4}
 Answer : a
- 35. Which of the following statements is used to create an empty set?
 - a) { } b) set() c) []
 - d) ()

Answer : b

```
36. If a={5,6,7,8}, which of the following statements is false?
a) print(len(a))
b) print(min(a))
c) a.remove(5)
d) a[2]=45
Answer : d
```

37. What will be the output of the following Python code?

```
>>> a={4,5,6}
>>> b={2,8,6}
>>> a-b
a) {4,5}
b) {6}
c) Error as unsupported operand type for set data type
```

d) Error as the duplicate item 6 is present in both sets **Answer : a**

38. Which of the following statements create a dictionary?
a) d = {}
b) d = {"john":40, "peter":45}
c) d = {40:"john", 45:"peter"}
d) All of the mentioned
Answer : d

39. What will be the output of the following Python code snippet? d = {"john":40, "peter":45}
a) "john", 40, 45, and "peter"
b) "john" and "peter"
c) 40 and 45
d) d = (40:"john", 45:"peter")
Answer : b

40. What will be the output of the following Python code snippet?

```
d1 = {"john":40, "peter":45}
d2 = {"john":466, "peter":45}
d1 == d2
```

- a) True
- b) False
- c) None
- d) Error
- Answer : b

41. What will be the output of the following Python code snippet?

d = {"john":40, "peter":45} d["john"]

c) "john"d) "peter"

a) 40 b) 45

42. Which of the following is not a declaration of the dictionary?
a) {1: 'A', 2: 'B'}
b) dict([[1,"A"],[2,"B"]])
c) {1,"A",2"B"}

d) { } Answer : c

5 Marks Questions

- 1. What are the numeric types in python? List them and state its use.
- 2. Write a python program to insert, append and remove an item from the list.
- 3. Explain various computing environments in python?
- 4. How to work with dictionaries? Explain with an example.
- 5. Explain about Dictionaries with suitable example
- 6. Write the differences between sets and tuples.
- 7. Write the differences between List and Tuples
- 8. Write a program to explain the creation and deletion of items in List.
- 9. Write a program to explain the creation and deletion of items in Dictionary.
- 10. Write a program to explain the creation and deletion of items in Tuples.

10 Marks Questions

- 1. Write python commands to
 - a) Create a dictionary
 - b) Update a dictionary with another dictionary
 - c) Get an item by key
 - d) Check whether a key is present in dictionary
 - e) Delete an item by key
- 2. What are the combination operators in Sets? Write examples and explain.
 - a) How do check for combinations of set values using python? Explain.
 - b) Discuss about type conversions with an example?
- 3. Briefly discuss the operations of Strings with suitable examples.
- 4. Briefly discuss the operations of Numbers with suitable examples.
- 5. How variables are used in python. Explain with suitable example.
- 6. Explain the uses of Sets with suitable example.
- 7. Explain about Lists with suitable example.
- 8. Explain about Tuples with suitable example.
- 9. Explain about Dictionaries with suitable example.
- 10. Explain the differences between Lists and Dictionaries.

<u>UNIT – II</u>

- 1. Which of the following is not used as loop in Python?
 - a) for loop

MCO's

- b) while loop
- c) do-while loop

d) None of the above **Answer : c**

- 2. Which one of the following is a valid Python if statement :
 - a) if a>=2 :
 b) if (a>= 2)
 c) if (a => 22)
 d) if a >= 22
 Answer : a
- 3. Which statement will check if a is equal to b?
 - a) if a = b:
 - b) if a == b:
 - c) if a === c:
 - d) if a == b
 - Answer : b
- 4. Does python have switch case statement?
 - a) True
 - b) False
 - c) Python has switch statement but we cannot use it.
 - d) None of the above
 - Answer : b
- 5. Python programming language allows using one loop inside another loop known as? a) switch
 - b) foreach
 - c) nested
 - d) forall
 - Answer : c
- 6. Which of the following is not an advantage of using modules?
 - a) Provides a means of reuse of program code
 - b) Provides a means of dividing up tasks
 - c) Provides a means of reducing the size of the program
 - d) Provides a means of testing individual parts of the program
 - Answer : c
- 7. Program code making use of a given module is called a _____ of the module.a) Client
 - b) Docstring
 - c) Interface
 - d) Modularity
 - Answer : a
- 8. _____is a string literal denoted by triple quotes for providing the specifications of certain program elements.
 - a) Interface
 - b) Modularity
 - c) Client
 - d) Docstring

Answer : d

- 9. All modular designs are because of a top-down design process.
 - a) True b) False

Answer : b

- 10. Which of the following is not a valid namespace?
 - a) Global namespace
 - b) Public namespace
 - c) Built-in namespace
 - d) Local namespace

Answer : b

- 11. _____represents an entity in the real world with its identity and behavior.
 - a) A method
 - b) An object
 - c) A class

d) An operator

Answer : b

- 12. _____is used to create an object.
 - a) class
 - b) constructor
 - c) User-defined functions
 - d) In-built functions

Answer : b

- 13. What is setattr() used for?
 - a) To access the attribute of the object
 - b) To set an attribute
 - c) To check if an attribute exists or not
 - d) To delete an attribute
 - Answer : b
- 14. What is getattr() used for?
 - a) To access the attribute of the object
 - b) To delete an attribute
 - c) To check if an attribute exists or not
 - d) To set an attribute
 - Answer : a
- 15. What is Instantiation in terms of OOP terminology?
 - a) Deleting an instance of class
 - b) Modifying an instance of class
 - c) Copying an instance of class
 - d) Creating an instance of class
 - Answer : d
- 16. Which of the following statements is wrong about inheritance?a) Protected members of a class can be inherited

- b) The inheriting class is called a subclass
- c) Private members of a class can be inherited and accessed
- d) Inheritance is one of the features of OOP

Answer : c

- 17. All subclasses are a subtype in object-oriented programming.
 - a) True
 - b) False

Answer : b

- 18. When defining a subclass in Python that is meant to serve as a subtype, the subtype Pythonkeyword is used.
 - a) True

b) False

Answer : b

- 19. Suppose B is a subclass of A, to invoke the <u>__init__</u>method in A from B, what is the line ofcode you should write?
 - a) A.__init__(self)
 b) B.__init__(self)
 c) A.__init__(B)
 d) B._init_(A)
 Answer: a
- 20. What does built-in function type do in context of classes?
 - a) Determines the object name of any value
 - b) Determines the class name of any value
 - c) Determines class description of any value
 - d) Determines the file name of any value

Answer : b

- 21. The ________ symbol along with the name of the decorator function can be placed above the definition of the function to be decorated works as an alternate way for decorating a function.
 - a) #
 - b) \$
 - c) @
 - d) &

Answer : c

- 22. A function with parameters cannot be decorated.
 - a) True
 - b) False

Answer : b

5 Marks Ouestions

- 1. Define Decorator. Give an example for decorator
- 2. How is a method overridden in python? Give an example.
- 3. How to build comprehension in the integer list? Explain.

- 4. Explain function with an example?
- 5. Explain about Namespaces in python?
- 6. Explain about duck typing with suitable example.
- 7. Explain about command line arguments with suitable example.
- 8. Define Class. How classes and objects used in python. Write example.
- 9. Explain about python standard library.
- 10. Explain about Overriding concept in python. Explain with example.

10 Marks Questions

- 1. What are the control statements and iteration statements in python? Give example.
- 2. How are methods imported from a namespace? Explain with a program.
- 3. Discuss loop control statements with an example.
- 4. Write a program of inheritance with an example.
- 5. Write a program for handling errors in python.
- 6. How modules are used in python. Explain with example.
- 7. How packages are used in python. Explain with example.
- 8. Briefly explain the concept of Classes and Objects. Explain with example.
- 9. How functions are used in python. Explain with suitable example.
- 10. Explain about standalone programs with example.

<u>UNIT – III</u>

MCO's

- 1. Which of these in not a core data type?
 - a) Lists
 - b) Dictionary
 - c) Tuples
 - d) Class
 - Answer : d
- 2. Given a function that does not return any value, What value is thrown by default when executed in shell.
 - a) int
 - b) bool
 - c) void
 - d) None
 - Answer : d
- 3. What will be the output of the following Python code?

```
>>>str="hello"
>>>str[:2]
>>>
a) he
b) lo
c) olleh
d) hello
```

- Answer : a
- 4. Which of the following will run without errors?

a) round(45.8) b) round(6352.898,2,5) c) round() d) round(7463.123,2,1) **Answer : a**

- 5. What is the return type of function id?
 - a) int
 - b) float
 - c) bool
 - d) dict

Answer : a

- 6. What error occurs when you execute the following Python code snippet?apple = mango a) SyntaxError
 - b) NameError c) ValueError
 - d) TypeError
 - Answer : b

7. What data type is the object below?L = [1, 23, 'hello', 1]

- a) list
- b) dictionaryc) arrayd) tuple
- Answer : a

8. In order to store values in terms of key and value we use what core data type.

- a) list
- b) tuple
- c) class
- d) dictionary

Answer : d

- 9. What is the return value of trunc()?
 - a) int
 - b) bool
 - c) float
 - d) None

```
Answer : a
```

- 10. Select all options that print.hello-how-are-you
 a) print('hello', 'how', 'are', 'you')
 b) print('hello', 'how', 'are', 'you' + '-' * 4)
 c) print('hello-' + 'how-are-you')
 d) print('hello' + '-' + 'how' + '-' + 'are' + 'you')
 Answer: c
- 11. To open a file c:\scores.txt for reading, we use ______
 a) infile = open("c:\scores.txt", "r")

b) infile = open("c:\\scores.txt", "r") c) infile = open(file = "c:\scores.txt", "r") d) infile = open(file = "c:\\scores.txt", "r") Answer : b 12. To open a file c:\scores.txt for writing, we use _____ a) outfile = open("c:\scores.txt", "w") b) outfile = open("c:\\scores.txt", "w") c) outfile = open(file = "c:\scores.txt", "w") d) outfile = open(file = "c:\\scores.txt", "w") Answer : b 13. To open a file c:\scores.txt for appending data, we use _____ a) outfile = open("c:\\scores.txt", "a") b) outfile = open("c:\\scores.txt", "rw") c) outfile = open(file = "c:\scores.txt", "w") d) outfile = open(file = "c:\\scores.txt", "w") Answer : a 14. Which of the following statements are true? a) When you open a file for reading, if the file does not exist, an error occurs b) When you open a file for writing, if the file does not exist, a new file is created c) When you open a file for writing, if the file exists, the existing file is overwritten with thenew file d) All of the mentioned Answer : d 15. To read two characters from a file object infile, we use a) infile.read(2) b) infile.read() c) infile.readline() d) infile.readlines() Answer : a 16. To read the entire remaining contents of the file as a string from a file object infile, we use a) infile.read(2) b) infile.read() c) infile.readline() d) infile.readlines() Answer : b 17. To read the next line of the file from a file object infile, we use a) infile.read(2) b) infile.read() c) infile.readline() d) infile.readlines() Answer : c 18. To read the remaining lines of the file from a file object infile, we use

a) infile.read(2)
b) infile.read()
c) infile.readline()
d) infile.readlines()
Answer: d

19. The readlines() method returns _____

a) str

b) a list of lines
c) a list of single characters
d) a list of integers
Answer: b

5 Marks Ouestions

- 1. Write the syntax of file open and explain its attributes.
- 2. Write python statements to read CSV file and write a list of rows in a file.
- 3. Explain about bytes and byte-array data types in python.
- 4. What are the main functions of DB-API? Explain with an example.
- 5. Explain about Text strings in Python?
- 6. How to convert bytes/string in python using binascii(). Explain with example.
- 7. Explain about structured binary files.
- 8. Explain about Bit operators with example.
- 9. Briefly discuss about JSON and YAML structured text files.
- 10. Explain about NoSQL data stores.

10 Marks Ouestions

- 1. List the structured file formats supported by python and write examples for reading data from the XML file.
- 2. Write a python program to insert a set of records into the database.
- 3. Discuss file input/output operations with an example.
- 4. Describe the basic SQL-DDL commands with an example?
- 5. How binary datas are used in python? Explain in detail with example.
- 6. Explain file input/output operations with program.
- 7. Briefly discuss about Structured Text files (CSV, XML, HTML, JSON, YAML)
- 8. Explain about the relational databases used in python (SQL, DB-API, SQLite, MySQL, PostgreSQL and SQLAlchemy)
- 9. Briefly discuss about Full-Text Databases.
- 10. Write a program to implement database operations in python.

$\underline{UNIT} - \underline{IV}$

MCO's

- 1. _____is used to convert your application into Web-Application.
 - a) Struts Services
 - b) Web Services
 - c) Java Service
 - d) Browser Action

Answer : d

- 2. In contrast, the contract-first approach encourages you to think of the service contract first interms of
 - a) XML
 - b) XML Schema(.xsd)
 - c) WSDL
 - d) All of the mentioned

Answer : d

3. The basic Web Services platform is combination of _____ and _____

- a) CSS + HTTP
- b) XML + HTML
- c) XML + HTTP
- d) CSS + JAVA

Answer : c

- 4. Web services can be discovered using _____
 - a) UDDII
 - b) UDDI
 - c) UDDDI
 - d) UDII
 - Answer : b
- 5. An XML document can be depicted using what kind of structure?
 - a) Paragraph
 - b) Tree
 - c) Stem and Leaf
 - d) Nested
 - Answer : b
- 6. What language is XML most similar to?
 - a) CSS
 - b) Python
 - c) Java script
 - d) HTML
 - Answer: d
- 7. Which function searches through the XML tree and retrieves the element that matches thespecified tag.
 - a) find
 - b) findtag
 - c) match
 - d) xmltag

- 8. The JSON format is most similar to which of the following?
 - a) JavaScript arrays
 - b) JavaScript
 - c) XML nodes

- d) Python lists and dictionaries **Answer : d**
- 9. _____ is used to convert your application into Web-Application.
 - a) Java Service
 - b) Browser Action
 - c) Web Services
 - d) Struts Services

Answer : c

- 10. Web Services are
 - a) Application designing Tool
 - b) Application IDE
 - c) Application Components
 - d) None of these

Answer : c

11. What will be the output of the following Python code?

import datetime

d=datetime.date(2016,7,24)print(d)

- a) Error
- b) 2017-07-24c) 2017-7-24
- d) 24-7-2017
- Answer : b
- 12. What will be the output of the following Python code if the system date is 18th August, 2016?

tday=datetime.date.today()print(tday.month())

- a) August
- b) Aug
- c) 08
- d) 8

Answer : d

13. What will be the output of the following Python code if the system date is 18th June, 2017(Sunday)?

tday=datetime.date.today()print(tday.weekday())

- a) 6
- b) 1
- c) 0
- d) 7

Answer : a

- 14. The value returned when we use the function isoweekday() is _____ and that for the function weekday() is _____ if the system date is 19th June, 2017 (Monday)
 - a) 0,0
 - b) 0,1
 - c) 1,0

d) 1,1

Answer : c

- 15. Which method is used to identify a thread?
 - a) getName()
 - b) getThread()
 - c) getIndent()
 - d) None

Answer : a

16. How to detect the status of a python thread?

- a) isAlive()
- b) isActive()
- c) None
- d) isDetect()

Answer : a

- 17. Which Python library runs a function as thread?
 - a) threading
 - b) None
 - c) thread
 - d) _threading

Answer : c

- 18. What would be the impact of multithreading on a uni-processor system?
 - a) Improve performance
 - b) Reduce execution time
 - c) Increase throughput
 - d) Degrade performance

Answer : d

- 19. What is the exception raised for an error that doesn't fall in any of the categories?
 - a) RuntimeError
 - b) LookupError
 - c) ReferenceError
 - d) SystemError

Answer : a

- 20. How does global value mutation used for thread-safety?
 - a) via Locking
 - b) via GIL (Global Interpreter Lock)
 - c) via Mutex
 - d) None

Answer : b

- 21. What is the method to retrieve the list of all active threads?
 - a) enumerate()
 - b) threads()
 - c) getList()
 - d) getThreads()

5 Marks Questions

- 1. How is a URL opened in web browser module? Explain.
- 2. List the directory commands and give example
- 3. Explain about standard web libraries of python in detail.
- 4. Discuss about calendars and clocks using in python?
- 5. How Client/Server technology used in python?
- 6. Explain any 5 file handling methods with example.
- 7. Explain any 5 directory handling methods with example.
- 8. Explain the concept of multithreading in python.
- 9. Briefly discuss about the concept of process and sub process.
- 10. Briefly discuss about datatime module with example.

10 Marks Questions

- 1. Write in detail about python's standard web libraries
- 2. What are the methods used in calendar and time? Explain any 10 methods with its use.
- 3. Discuss web services and automation in detail.
- 4. Write a program to create a process with multiprocessing.
- 5. Discuss about Web Clients and Web Servers in Python?
- 6. Explain about File handling methods with example?
- 7. Explain about directory handling methods with example.
- 8. Explain about Programs and process in python?
- 9. How calendars and clocks used in python? Explain with example.
- 10. Write a program using web services?
- 11. Write a program for creating dynamic web pages using forms

UNIT V

MCOs

- 1. Multithreading is also called as _____
 - a) Concurrency
 - b) Simultaneity
 - c) Crosscurrent
 - d) Recurrent
 - Answer : a

2. A single sequential flow of control within a program is _____

- a) Process
- b) Task
- c) Thread
- d) Structure
- Answer : c

3. Python MRO concept is _____

- a) Method Resolution Order
- b) Method Recursion Order
- c) None of the mentioned
- d) Method resetting order

- 4. Which of the following python Network/Internet modules supports HTTP protocol?
 - a) xmlrpclib
 - b) httplib
 - c) urllib
 - d) All of the above

Answer : d

- 5. Methods provided by python for receiving and sending TCP messages
 - a) s.recv(), s.send()
 - b) s.recvfrom(), s.sendto()
 - c) Both a and b
 - d) None of the above
 - Answer : a
- 6. Which python is used by client to opens a TCP connection to hostname?
 - a) s.connect()
 - b) s.bind()
 - c) s.accept()
 - d) All of the above

Answer : a

- 7. Which are server socket methods provided by python?
 - a) s.bind()
 - b) s.accept()
 - c) s.listen()
 - d) All of the above
 - Answer : d
- 8. How we install tkinter in system
 - a) tkinter pip install
 - b) pip install python
 - c) pip install tkinter
 - d) tkinter install

Answer : c

- 9. How we import a tkinter in python program
 - a) tkinter pip install
 - b) pip install python
 - c) pip install tkinter
 - d) tkinter install

Answer : c

- 10. One of the following classes are used for connection-less socket programming?
 - a) Datagram Socket
 - b) Datagram Packet
 - c) segment
 - d) packet

- 11. _____Netware protocol provides link state routing?
 - a) SAP
 - b) RIP
 - c) NLSP
 - d) NCP

Answer : c

- 12. Each IP packet must contain:?
 - a) Only Source address
 - b) Only Destination address
 - c) Source and Destination address
 - d) Source or Destination address

Answer : c

- 13. In an email address, the characters following '@' character represent
 - a) User name
 - b) E-mail Recipient
 - c) Domain name
 - d) None of these

Answer : c

- 14. URLs are of two types:
 - a) Absolute & Relative
 - b) Static & Dynamic
 - c) Absolute & Dynamic
 - d) None of the above

Answer : a

- 15. Which of these is not a part of URL?
 - a) IP address
 - b) Port Number
 - c) Domain Name
 - d) None of these

Answer : a

- 16. For wireless networks, which protocol is used for handling collisions?
 - a) CSMA
 - b) CSMA/CD
 - c) CSMA/CA
 - d) All of these
 - Answer : c
- 17. Traditionally, Internet checksum is
 - a) 8-bit
 - b) 16-bit
 - c) 24-bit
 - d) 32-bit
 - Answer : b

18. A repeater takes a weak and corrupted signal and _____it.

- a) Amplifies
- b) Regenerates
- c) Resembles
- d) Reroutes

Answer : b

19. Protocol/Standard that is used to transfer data among computers on the Internet

- a) FTP
- b) Archie
- c) TCP
- d) Gopher
- Answer : c

20. Internet is an example of _____topology.

- a) Star
- b) Bus
- c) Mesh
- d) Bus

Answer : c

- 21. Online textual talk is called _____.
 - a) Video Conferencing
 - b) Telephony
 - c) Text Phone
 - d) Chat

Answer : d

5 Marks Questions

- 1. How is washer and dryer process simulated in queue function? Explain with program.
- 2. Write short notes on Big fat data.
- 3. Explain in detail about twisted package.
- 4. Explain in detail about radis server.
- 5. Explain about an email module of python in detail?
- 6. Explain about green threads package in detail.
- 7. Explain about TCP/IP used in python.
- 8. Explain about Internet Services in detail.
- 9. Explain about Remote processing using python.
- 10. Explain about web services used in python.

10 Marks Questions

- 1. Write a python program to create 3 threads and execute it.
- 2. Explain in detail about Radis in networking.
- 3. Discuss about Big fat data and MapReduce in detail.
- 4. Describe how to move bytes between TCP and UDP protocols.
- 5. Briefly discuss about the concept of concurrency.
- 6. Briefly discuss about the concept of multithreading with example.
- 7. How networks are used in python. Explain with patterns and protocols.
- 8. Write a program to explain the concept of web services.

9. How python is embedded while working with clouds. Explain.10. Explain about the concept of remote processing.

RDBMS AND ORACLE

<u>UNIT – I</u>

MCO's

- 1. A Collection of tables to represent both data and the relationships among data is known as
 - a) Entity Relationship Model
 - b) Relational Model
 - c) Object-based data model
 - d) Semi Structured data model

Answer : b

- 2. The designer can review the schema to ensure it meets all the functional requirements, at thestage
 - a) Conceptual Design
 - b) Execution design
 - c) Controlling design
 - d) Initial Planning

Answer : a

- 3. A collection of interrelated data and a collection of programs to access the data is known as
 - a) Database monitoring system
 - b) Database management system
 - c) Database controlling system
 - d) Database Storage system

Answer : b

- 4. To provide an environment that is both convenient and efficient for people to use in retrieving and storing information, is the primary goal of
 - a) Database storage system
 - b) Database monitoring system
 - c) Database management system
 - d) Database controlling system

Answer : c

- 5. Underlying the structure of a database is the
 - a) Data model
 - b) Data network
 - c) Data storage
 - d) Data management
 - Answer : c
- 6. In an object-oriented model, one object can access data of another object by passing:
 - a) Instance variable
 - b) Message
 - c) Variable
 - d) None of these

Answer : b

- 7. A view of database that appears to an application program is known as:
 - a) Schema
 - b) Subschema
 - c) virtual table
 - d) None of the above

Answer : b

- 8. An abstraction concept for building composite object from their component object is called:
 - a) Specialization
 - b) Normalization
 - c) Generalization
 - d) Aggregation

Answer : d

- 9. A set of objects that share a common structure and a common behavior is called:
 - a) Object
 - b) Class
 - c) Entity
 - d) None of these
 - Answer : b
- 10. Every weak entity set can be converted into a strong entity set by:
 - a) using generalization
 - b) adding appropriate attributes
 - c) using aggregation
 - d) none of the above

Answer : b

- 11. The number of entities to which another entity can be associated via a relationship set is expressed as:
 - a) Entity
 - b) Cardinality
 - c) Schema
 - d) Attributes
 - Answer : b
- 12. In ER model the details of the entities are hidden from the user. This process is called:
 - a) Generalization
 - b) Specialization
 - c) Abstraction
 - d) none of these above
 - Answer : c
- 13. What is not true about a view?
 - a) It is a definition of a restricted portion of the database
 - b) It is a security mechanism
 - c) It is always updatable like any other table
 - d) All are true

Answer : c

- 14. In a relational database a referential integrity constraint can be specified with the help of a) primary key
 - b) foreign key
 - c) secondary key
 - d) none of the above
 - $\mathbf{A} = \mathbf{a} = \mathbf{a} + \mathbf{b}$
 - Answer : b
- 15. A super key is a set of one or more attributes that, taken collectively, allow us
 - a) to identify uniquely an entity in the entity set
 - b) to make the key most powerful for faster retrieval
 - c) to increase effectiveness of database access
 - d) none of the above
 - Answer : a
- 16. Which command is used to remove all rows from a table?
 - a) Delete
 - b) Remove
 - c) Truncate
 - d) Both [A] and [B]
 - Answer : c
- 17. Which of the following is an aggregate function in SQL?
 - a) Union
 - b) Like
 - c) Group By
 - d) Max
 - Answer : d
- 18. Which command is used to add a column to an existing table?
 - a) Create
 - b) Update
 - c) Alter
 - d) None of these
 - Answer : c
- 19. A deadlock exists in the system if and only if the wait for graph:
 - a) has a cycle in it
 - b) has a path from first node to last node
 - c) is a tree
 - d) none of the above
 - Answer : a
- 20. Rollback of transactions is normally used to:
 - a) recover from transaction failure
 - b) update the transaction
 - c) retrieve old records
 - d) repeat a transaction

- 21. Prevention of access to the database by unauthorized users is referred to as:
 - a) Integrity
 - b) Productivity
 - c) Security
 - d) Reliability
 - Answer : c
- 22. A database is an organized collection of ______
 - a) data
 - b) Attributes
 - c) Record
 - d) None of the above
 - Answer : a
- 23. Duplication of data is called _____
 - a) Inconsistency
 - b) Consistency
 - c) Redundancy
 - d) Foreign Key
 - Answer : c
- 24. Which of the following is not the advantage of database?
 - a) Sharing of Data
 - b) Reduce Data Redundancy
 - c) Increase Data Inconsistency
 - d) Data Security
 - Answer : c
- 25. A key which is referring to the primary key of another table is called _____
 - a) Alternate Key
 - b) Primary Key
 - c) First Primary Key
 - d) Foreign Key
 - Answer : d
- 26. A field which is ______ for each and every record is called Primary key.
 - a) Common
 - b) Same
 - c) Unique
 - d) None of the above
 - Answer : c
- 27. When data is stored, maintained and retrieved from multiple tables then special database software are required called ______
 - a) DBMS
 - b) RDBMS
 - c) Special DBMS
 - d) All of the above
 - Answer : b

28. In RDBMS, data is organized in the form of _____

- a) Table
- b) Record
- c) Field
- d) None of the above
- Answer : a
- 29. SQL stands for _____
 - a) Structured Queue Language
 - b) Structured Query Language
 - c) Structured Query Lang
 - d) None of the above

Answer : b

- 30. All the values in _____are of same type
 - a) Records
 - b) Table
 - c) Database
 - d) Fields

Answer : d

31. _____represent a single data item in a table

- a) Tuples
- b) Attributes
- c) Relation
- d) All of the above

Answer : a

32. _____are the basic building blocks of a database

- a) Tables
- b) Record
- c) Fields
- d) All of the above

Answer : a

- 33. By default data type of fields is
 - a) Text[Varchar]
 - b) Text[Char]
 - c) Int
 - d) Long
 - Answer : a

2 Marks Ouestions

- 1. Define Data.
- 2. Define Information.
- 3. What is Database?
- 4. What are the types of Data models?
- 5. What are the types of data base architectures?

- 6. What are the types of database languages?
- 7. What are the types of database users?
- 8. What is Entity?
- 9. What is Constraint?
- 10. What is ER Diagram?

5 Marks Questions

- 1. What is Data and Information?.
- 2. What are the purposes of database management systems?
- 3. Explain about View of Data?
- 4. Explain about Transaction Management.
- 5. Explain about Database users and administrators.
- 6. Explain about Relational Model.
- 7. Explain about ER Model.
- 8. Explain about Database design.
- 9. Explain about the overview of databases.
- 10. Explain about constraints with its types.

10 Marks Questions

- 1. Differences between file processing verses database systems?
- 2. Briefly discuss about database languages.
- 3. Briefly discuss about database architecture with its types.
- 4. Explain about the structure of relational databases.
- 5. Briefly discuss about ER Model with example.
- 6. Explain about ER diagrams with example.
- 7. Write 5 queries for creation of database.
- 8. Write 5 queries for inserting values into tables.
- 9. Write 5 queries for fetching records from table.
- 10. Explain in detail about database management systems.

<u>UNIT – II</u>

MCO's

- 1. Which data manipulation command is used to combines the records from one or more tables?
 - a) Select
 - b) Project
 - c) Join
 - d) Product
 - Answer : c
- 2. Which of the following is not a valid SQL type?
 - a) Decimal
 - b) Numeric
 - c) Float
 - d) Character
 - Answer : a

- 3. Which operator is used to compare a value to a specified list of values?
 - a) between
 - b) Any
 - c) in
 - d) all

Answer : c

- 4. The SQL used by front-end application programs to request data from the DBMS is called
 - a) DML
 b) DDL
 c) VDL
 d) SDL
 Answer: a
- - a) OPDATE TABLE
 b) TRUNCATE COLUMN
 c) ALTER , DROP
 d) DELETE COLUMN
 Answer : c
- 6. Which of the following operations requires the relations to be union compatible?
 a) UNION
 b) INTERSECTION
 c) DIFFERENCE
 d) ALL OF THESE
 Answer : d
- 7. The database language that allows us to access data in a database is called :
 - a) DCLb) DMLc) DDLd) None Of AboveAnswer : a
- 8. Which of the following is a comparison operator in SQL
 a) Double equal sign (==)
 b) LIKE
 c) BETWEEN
 d) Single equal sign (=)
 Answer: a
- 9. Which of the following is a legal expression in SQL?
 a) SELECT NULL FROM SALES;
 b) SELECT NAME FROM SALES;
 c) SELECT * FROM SALES WHEN PRICE = NULL;
 d) SELECT # FROM SALES;
 Answer : b

- 10. DCL provides commands to perform actions like
 - a) Change the structure of Tables
 - b) Insert, Update or Delete Records and Values
 - c) Authorizing Access and other control over Database
 - d) None of Above
 - Answer : c

11. The COUNT function in SQL returns the number of ______

- a) Values
- b) Distinct values
- c) Group By
- d) Columns
- Answer : a
- 12. Which data type can store unstructured data in a column?
 - a) RAWb) CHARc) NUMERICd) VARCHARAnswer: a
- 13. Which function is used to divides one numeric expression by another and get the remainder?
 - a) POWERb) MODc) ROUNDd) REMAINDERAnswer: b
- 14. What is the full form of DDL?
 a) Dynamic Data Language
 b) Detailed Data Language
 c) Data Definition Language
 d) Data Derivation Language
 Answer: c
- 15. A database language used for defining the whole database structure and schema is called : a) DCL
 - b) DML
 - c) DDL
 - d) All Of Above Answer : c
- 16. The virtual table that its created by data from the result of an SQL 'Select' statement is called
 - a) View
 - b) Synonym
 - c) Sequence
 - d) Transaction

- 17. Which statement in SQL allows us to change the definition of a table is? a) ALTER
 - b) UPDATE
 - c) CREATE
 - d) SELECT
 - Answer : a
- 18. SQL supports forms of user-defined data types, in the form of
 - a) 1 form
 - b) 2 forms
 - c) 3 forms
 - d) 4 forms
 - Answer : b
- 19. SQL supports nested sub queries in the where, and from clauses of an a) Outer query
 - b) Inner Query
 - c) Outer tuple
 - d) Inner tuple
 - Answer : a
- 20. SQL supports basic set operations on relations that includes
 - a) Union
 - b) Intersect
 - c) Except
 - d) All of the above
 - Answer : d
- 21. Scalar subqueries are also useful in SQL
 - a) Insertion Statements
 - b) Delete Statement
 - c) Update Statements
 - d) Retrieval Statements
 - Answer : c
- 22. The SQL data definition language is used to create relations with specified.
 - a) Schema
 - b) Structure
 - c) Domain
 - d) Attributes
 - Answer : a
- 23. We can choose the tuples to be updated by using a query, as we could for
 - a) insert
 - b) delete
 - c) Both a and b
 - d) Retrieval
 - Answer : c

2 Marks Questions

- 1. Write the abbreviation of SQL.
- 2. Write the abbreviation of RDBMS.
- 3. What are set operations?
- 4. What are aggregate functions?
- 5. What is the use of null values?
- 6. What is a view?
- 7. What is the use of views?
- 8. How to modify data's in database?
- 9. What is meant by nested sub queries?
- 10. What are relational Algebra operations?

5 Marks Ouestions

- 1. Explain about relational algebra operations.
- 2. Explain about the additional relational algebra operations.
- 3. What is SQL? What are the uses of SQL?
- 4. What is the background of SQL?
- 5. What is the basic structure of SQL queries?
- 6. Explain about set operations.
- 7. Explain about aggregate functions.
- 8. Explain about nested sub queries.
- 9. Explain about Views.
- 10. Explain about Modification of the database.

10 Marks Ouestions

- 1. Explain about relational algebra operations? Give example.
- 2. Explain about the additional relational algebra operations..
- 3. Discuss about SQL with its uses.
- 4. Explain about the basic structure of SQL queries with example.
- 5. Explain about the set operations with example.
- 6. Explain about aggregate functions with example.
- 7. Explain about nested sub queries with example.
- 8. Explain about Views and How it is used in database management system.
- 9. Briefly discuss about the modification of the database with example.
- 10. Write 10 queries for different forms of select statements.

<u>UNIT – III</u>

MCO's

- 1. To include integrity constraint in an existing relation use :
 - a) Create table
 - b) Modify table
 - c) Alter table
 - d) Drop table
 - Answer : c

- 2. Which of the following is not an integrity constraint?
 - a) Not null
 - b) Positive
 - c) Unique
 - d) Check 'predicate'
 - Answer : b
- 3. Foreign key is the one in which the ______ of one relation is referenced in another relation.
 - a) Foreign keyb) Primary keyc) Referencesd) Check constraintAnswer : b
- 4. Domain constraints, functional dependency and referential integrity are special forms of
 - a) Foreign key
 b) Primary key
 c) Assertion
 d) Referential constraint
 Answer: c
- 5. Which of the following is the right syntax for the assertion?
 - a) Create assertion 'assertion-name' check 'predicate';
 - b) Create assertion check 'predicate' 'assertion-name';
 - c) Create assertions 'predicates';
 - d) All of the mentioned

Answer : a

- 6. Data integrity constraints are used to:
 - a) Control who is allowed access to the data
 - b) Ensure that duplicate records are not entered into the table
 - c) Improve the quality of data entered for a specific property (i.e., table column)
 - d) Prevent users from changing the values stored in the table

Answer : c

- 7. Which of the following can be addressed by enforcing a referential integrity constraint?
 - a) All phone numbers must include the area code
 - b) Certain fields are required (such as the email address, or phone number) before the recordis accepted
 - c) Information on the customer must be known before anything can be sold to that customer
 - d) When entering an order quantity, the user must input a number and not some text (i.e., 12rather than 'a dozen')

Answer : c

- 8. By including integrity constraints in existing relations we use?
 - a) update table
 - b) alert table

- c) delete tabled) create tableAnswer : a
- 9. Which one are not the integrity constraints?
 - a) Identical
 - b) not null
 - c) unique
 - d) none of these
 - Answer : a
- 10. The key is the one in which the primary of one relation is referenced to another relation is called.
 - a) primary key
 - b) foreign key
 - c) candidate key
 - d) concatenate key
 - Answer : b
- 11. Following is the right syntax for assertion?
 - a) create assertion 'predicates';
 - b) create assertion check 'predicate' 'assertion name';
 - c) create 'assertion-name' check 'predicates';
 - d) all of the above
 - Answer : c
- 12. Which of the following_____is preferred method for enforcing data integrity?
 - a) stored procedure
 - b) constraints
 - c) cursor
 - d) none of these
 - Answer : b
- 13. Which of the following command in SQL is used to create a table?a) MAKE TABLEb) DELETE TABLEc) UPDATE TABLE
 - d) CREATE TABLE
 - Answer : d
- 14. Referential integrity constrains are also called?
 - a) superset dependencies
 - b) subset dependencies
 - c) functional dependencies
 - d) all of these

Answer : c

- 15. Is oracle sport complex check condition
 - a) yes
 - b) does not support

- c) nod) none of theseAnswer : a
- 16. When a referential integrity constraint is violated, normal procedure is to a) rejection the action
 - b) accept the action
 - c) both A & B
 - d) continue with the flow

Answer : a

- 17. An SQL standard Allows a clause initially deferred to be added to a
 - a) isolation specification
 - b) constraint specification
 - c) atomicity specification
 - d) none of these Answer : b
- 18. The following is used to uniquely identifies the element in relation
 - a) secondary key
 - b) primary key
 - c) candidate key
 - d) concatenate key
 - Answer : b
- 19. Constraints are the preferred method for enforcing data
 - a) data topple
 - b) data integrity
 - c) data inheritance
 - d) none of these
 - Answer : b
- 20. Snapshot isolation schemes do not support
 - a) write operation
 - b) read operation
 - c) serializability
 - d) none of the above
 - Answer : c
- 21. The most easily tested constraints of a new data entered is into a database is called?
 - a) referential constraints
 - b) domain constraints
 - c) assertion
 - d) none of these

Answer : b

- 22. Data integrity constraint is used to:
 - a) satisfy a condition that duplicate records are not inserted into the table
 - b) improve the quality of data entered for a specific property
 - c) both A & B

d) none of these **Answer : b**

2 Marks Ouestions

- 1. Define Integrity.
- 2. What is Referential Integrity?
- 3. What is Entity Integrity?
- 4. What is Domain Integrity?
- 5. Define Constraints?
- 6. What is Domain Constraint?
- 7. What is user defined integrity?
- 8. What are Key constraints?
- 9. What is Check constraint?
- 10. What is Not Null constraint?

5 / 10 Marks Ouestions

- 1. Explain about Integrity with its rules.
- 2. What is data integrity? Explain.
- 3. Explain about referential Integrity with example.
- 4. Explain about Entity Integrity with example.
- 5. Explain about Domain Integrity with example?
- 6. What is user defined integrity. Explain with example.
- 7. Explain about Constraints with example.
- 8. Explain about Domain Constraints with example.
- 9. Briefly discuss about Key constraints with example.
- 10. What are the uses constraints in table?

$\underline{UNIT} - \underline{IV}$

MCO's

- 1. Collections of operations that form a single logical unit of work are called_
 - a) Views
 - b) Networks
 - c) Units
 - d) Transactions
 - Answer : d

2. The "all-or-none" property is commonly referred to as _____

- a) Isolation
- b) Durability
- c) Atomicity
- d) None of the mentioned
- Answer : c
- 3. Which of the following is a property of transactions?
 - a) Atomicity
 - b) Durability
 - c) Isolation

d) All of the mentioned **Answer : c**

- 4. Execution of translation in isolation preserves the ______ of a database a) Atomicity
 - b) Consistency
 - c) Durability
 - d) All of the mentioned
 - Answer : b
- 5. Which of the following is not a property of a transaction?
 - a) Atomicity
 - b) Simplicity
 - c) Isolation
 - d) Durability
 - Answer : b
- 6. Which of the following systems is responsible for ensuring durability?
 - a) Recovery system
 - b) Atomic system
 - c) Concurrency control system
 - d) Compiler system
 - Answer : a
- 7. Which of the following systems is responsible for ensuring isolation?.
 - a) Recovery system
 - b) Atomic system
 - c) Concurrency control system
 - d) Compiler system

Answer : c

- 8. A transaction that has not been completed successfully is called as _____
 - a) Compensating transaction
 - b) Aborted transaction
 - c) Active transaction
 - d) Partially committed transaction

Answer : b

- 9. Which of the following is not a transaction state?.
 - a) Active
 - b) Partially committed
 - c) Failed
 - d) Compensated
 - Answer : d

10. The execution sequences in concurrency control are termed as ______.

- a) Serials
- b) Schedules
- c) Organizations
- d) Time tables

Answer : b

- 11. The scheme that controls the interaction between executing transactions is called as _____
 - a) Concurrency control scheme
 - b) Multiprogramming scheme
 - c) Serialization scheme
 - d) Schedule scheme
 - Answer : a
- 12. With regards to transaction processing, any DBMS should be capable of:
 - a) Ensuring that transactions are free from interference from other users
 - b) Parts of a transaction are not lost due to a failure
 - c) Transactions do not make the database inconsistent
 - d) All of the above.

Answer : d

- 13. What is ACID properties of Transactions?
 - a) Atomicity, Consistency, Isolation, Database
 - b) Atomicity, Consistency, Isolation, Durability
 - c) Atomicity, Consistency, Inconsistent, Durability
 - d) Automatically, Concurrency, Isolation, Durability

Answer : b

- 14. Database locking concept is used to solve the problem of
 - a) Lost Update
 - b) Uncommitted Dependency
 - c) Inconsistent Data
 - d) All of the above

Answer : d

- 15. A lock that allows concurrent transactions to access different rows of the same table is known as a
 - a) Field-level lock
 - b) Row-level lock
 - c) Table-level lock
 - d) Database-level lock

Answer : a

- 16. A transaction completes its execution is said to be
 - a) Saved
 - b) Loaded
 - c) Rolled
 - d) Committed
 - Answer : d
- 17. A system is in a_state if there exists a set of transactions such that every transaction in the set is waiting for another transaction in the set?
 - a) Idle
 - b) Waiting
 - c) Deadlock

d) Ready Answer: c

- 18. The deadlock state can be changed back to stable state by using _____statement.
 - a) Commit
 - b) Rollback
 - c) Savepoint
 - d) Deadlock
 - Answer : b
- 19. What are the ways of dealing with deadlock ?
 - a) Deadlock prevention
 - b) Deadlock recovery
 - c) Deadlock detection
 - d) All of the mentioned

Answer : a

- 20. When transaction Ti requests a data item currently held by Tj, Ti is allowed to wait only ifit has a timestamp smaller than that of Tj (that is, Ti is older than Tj). Otherwise, Ti is rolled back (dies). This is
 - a) Wait-die
 - b) Wait-wound
 - c) Wound-wait
 - d) Wait
 - Answer : a
- 21. When transaction Ti requests a data item currently held by Tj, Ti is allowed to wait only ifit has a timestamp larger than that of Tj (that is, Ti is younger than Tj). Otherwise, Tj is rolled back (Tj is wounded by Ti). This is
 - a) Wait-die
 - b) Wait-wound
 - c) Wound-wait
 - d) Wait

Answer : c

2 Marks Questions

- 1. Define Transaction.
- 2. Write the states of Transaction management?
- 3. Define Lock.
- 4. Define Concurrency?
- 5. What is meant by Granting?
- 6. What is the use of Two Phase locking protocol?
- 7. What is the use of Time Stamp Protocol?
- 8. What is meant by Time stamp?
- 9. What is Deadlock?
- 10. What is meant by Serializability?

5 / 10 Marks Ouestions

- 1. Define Transaction? Explain about the concept of Transaction Management?.
- 2. Briefly discuss about the states of Transaction?
- 3. Explain about Serializabilty?
- 4. Discuss about the concept of lock based concurrency control?
- 5. How to grant permissions to the users in dbm system?
- 6. Explain in detail about Two Phase Locking Protocol.
- 7. Explain in detail about Time stamp based protocol.
- 8. Explain in detail about Time Stamp Ordering Protocol.
- 9. Explain in detail about Deadlock handling.
- 10. Write Queries for the following operations:
 - a) Create Table
 - b) Insert Values
 - c) Update Operation
 - d) Alter the database
- 11. Write Queries for the following operations:
 - a) Various forms of Select statement
 - b) Multiple Queries
 - c) Joining the Table
- 12. Write Queries for the following operations:
 - a) Number functions
 - b) Date functions
 - c) Aggregate functions
 - d) Math functions

<u>UNIT V</u>

MCOs

- 1. PLSQL is a
 - a) Completely Portable
 - b) High performance
 - c) Processing language
 - d) All of the above

Answer : d

- 2. Which is a simple or compound symbol that has a special meaning to PL/SQL?
 - a) Delimiters
 - b) Identifiers
 - c) Literals
 - d) Comments

Answer : a

- 3. How many types of literals are available in PL/SQL?
 - a) 6
 - b) 2
 - c) 5
 - d) 4

Answer : c

- 4. Which operator tests set membership?
 - a) IN Operator

b) BETWEEN Operatorc) LIKE Operatord) IS NULL Operator

Answer : a

- 5. Which of the following has internal components that can be manipulated individually, suchas the elements of an array, record, or table?
 - a) A Composite
 - b) A LOB
 - c) A Reference
 - d) A Scalar
 - Answer : a
- 6. Which subtypes are used to declare fixed-point numbers with a maximum precision of 38 decimal digits?
 - a) INTEGER, INT, SMALLINT
 - b) DOUBLE PRECISION, FLOAT
 - c) DEC, DECIMAL, NUMERIC
 - d) None of the above

Answer : c

- 7. What is the maximum number of ELSE clauses that can be included in an IF clause that isnot nested?
 - a) 1
 - b) 0
 - c) 15
 - d) Any number

Answer : a

- 8. Which structure executes a sequence of statements repeatedly as long as a condition holds true?
 - a) Selection structure
 - b) Iteration structure
 - c) Sequence structure
 - d) None of the above

Answer : b

- 9. Varrays are a good choice when
 - a) The number of elements is known in advance.
 - b) The elements are usually all accessed in sequence.
 - c) Both A & B
 - d) None of the above
 - Answer : c
- 10. Which of the following returns the current value in a specified sequence?
 - a) CURRVAL
 - b) NEXTVAL
 - c) Both A & B
 - d) None of the above

Answer : a

- 11. Which operators combine the results of two queries into one result?
 - a) Set operator
 - b) Row Operator
 - c) Both A & B
 - d) None of the above

Answer : a

- 12. Which of the following provides a way for your program to select multiple rows of data from the database and then process each row individually?
 - a) PL/SQL Cursors
 - b) PL/SQL Trigger
 - c) PL/SQL Select
 - d) PL/SQL Process

Answer : a

- 13. Abbreviate SMTP?
 - a) Single Mail Transaction Protocol
 - b) Simple Mail Transfer Protocol
 - c) Simple Mail Transaction Protocol
 - d) Simple Mail Transfer Package

Answer : b

- 14. PL/SQL Exception message consists of
 - a) Type of Exception
 - b) An Error Code
 - c) A message
 - d) All mentioned above

Answer : d

- 15. Which of the following is equivalent to multiple IF-ELSIF statements?
 - a) LOOP statement
 - b) FOR statement
 - c) WHILE statement
 - d) CASE statement

Answer : c

- 16. Which of the following statements can be used to terminate a PL/SQL loop?a) GOTO
 - b) EXIT WHEN
 - c) CONTINUE WHEN
 - d) KILL
 - Answer : b
- 17. Which of the following is not a PL/SQL unit?
 - a) Table
 - b) Type
 - c) Trigger
 - d) Package
 - Answer : a

- 18. Which of the following is true about scalar data types in PL/SQL?
 - a) They hold single values with no internal components.
 - b) Examples of scalar data types are NUMBER, DATE, or BOOLEAN.
 - c) PL/SQL provides subtypes of data types.
 - d) All are true.

Answer : d

- 19. Which keyword is used instead of the assignment operator to initialize variables?a) NOT NULL
 - b) DEFAULT
 - c) %TYPE
 - d) %ROWTYPE

Answer : b

- 20. Which of the following is used to declare a record?
 - a) %ROWTYPE
 - b) %TYPE
 - c) Both A & B
 - d) None of the above

Answer : a

- 21. What is the initial value of index for a reverse for loop?
 - a) UPPER bound
 - b) Lower bound
 - c) 1
 - d) Upper bound-Lower bound/2

Answer : a

- 22. Which Package lets you use database triggers to alert an application when specific database values change?
 - a) DBMS_OUTPUT
 - b) DBMS_ALERT
 - c) DBMS_PIPE
 - d) All mentioned above

Answer : b

- 23. Which parameter acts like a constant inside the subprogram?
 - a) IN
 - b) OUT
 - c) Both A & B
 - d) None of the above

Answer : a

- 24. PL/SQL stands for
 - a) Programming Language/SQL
 - b) Procedural Language/SQL
 - c) Portable Language/SQL
 - d) None of the above

Answer : b

- 25. Which statement chooses from a sequence of conditions, and executes a corresponding statement?
 - a) CASE Statement
 - b) CLOSE Statement
 - c) COMMIT Statement
 - d) None of the above

Answer : a

- 26. PL/SQL programs are written as lines of text using a specific set of characters.
 - a) Upper- and lower-case letters A .. Z and a .. z
 - b) Numerals 0 .. 9
 - c) Symbols () + * / <> = ! ~ ^; :. ' @ % , " # \$ & _ | { } ? []
 - d) Tabs, spaces, and carriage returns
 - e) All mentioned above

Answer : e

27. Which statements execute a sequence of statements multiple times?

- a) EXIT
- b) LOOP
- c) Both A & B
- d) None of the above

Answer : b

- 28. Which of the following cannot be used with associative arrays?
 - a) EXTEND
 - b) TRIM
 - c) Both A & B
 - d) None of the above

Answer : c

- 29. By using which clause, the mode is OUT, so you cannot specify a parameter mode for output bind arguments?
 - a) USING Clause
 - b) **RETURNING INTO Clause**
 - c) Both A & B
 - d) None of the above

Answer : b

- 30. Which of the following returns all distinct rows selected by either query?
 - a) INTERSECT
 - b) MINUS
 - c) UNION
 - d) UNION ALL

Answer : c

2 Marks Ouestions

- 1. Define PL/SQL.
- 2. How to write comments in plsql block.

- 3. Write any 4 data types in plsql.
- 4. Write about assignment operation.
- 5. Define Variables.
- 6. What are the arithmetic operators used in plsql.
- 7. What is meant by bind variables.
- 8. Define Transaction.
- 9. Define SQL.
- 10. What is meant by embedded SQL.

5 / 10 Marks Ouestions

- 1. Define PLSQL. Explain about the history of PLSQL.
- 2. Write the introduction and fundamentals of PLSQL.
- 3. Explain about the block structure of PLSQL with example.
- 4. Explain about the comments statement in PLSQL. Explain with example.
- 5. Briefly discuss about the datatypes used in PLSQL with example.
- 6. Briefly discuss about the concept Variables. How to declare variables in PLSQL.
- 7. Explain about bind variables with example.
- 8. Explain about arithmetic operators with example.
- 9. Briefly discuss about the control structures in PLSQL. Explain with example.
- 10. Explain about the concept of SQL in PLSQL.
- 11. Explain about data manipulation in PLSQL.
- 12. Discuss about the transaction control statements.
- 13. Explain about nested blocks in PLSQL.
- 14. Write a PLSQL program for finding the greatest of n numbers.
- 15. Write a PLSQL program to find the Fibonacci series.
- 16. Write a PLSQL program to check the given number is odd or even.
- 17. Write a PLSQL program to print a table of number.

EDC-FUNDAMENTALS OF COMPUTERS AND COMMUNICATIONS

UNIT-I

MCOs

- 1. _____ was the first world electronic digital computer.
 - a) Tide Predictor
 - b) FACTA
 - c) Colossus
 - d) None of These

Answer : c

- 2. Digital Diary is a type of
 - a) Mini
 - b) Micro
 - c) Mainframe
 - d) Workstation
 - Answer : b
- 3. Mainframe is also known as of computer.
 - a) Mother
 - b) Brother
 - c) Sister
 - d) Father
 - Answer : d
- 4. The set of instructions given to the computer.
 - a) Program
 - b) Commands
 - c) Hardware
 - d) Software
 - Answer : a
- 5. The language is directly understood by the computer.
 - a) Basic
 - b) Machine
 - c) Hard
 - d) Easy

Answer : b

- 6. The instructions in machine language are written with the help of
 - a) Digits 0 To 9
 - b) English Alphabets
 - c) 0 And 1
 - d) None Of These

Answer : c

A converts the complete program into machine language in one go .
 a) Translator

- b) Compiler
- c) Interpreter
- d) None Of These

Answer: b

- 8. The programs written in high level language are called
 - a) Program
 - b) Source Code
 - c) Code
 - d) Only 1

Answer : b

9. _____ converts program in assembly language in to machine language .

- a) Assembler
- b) Interpreter
- c) Compiler
- d) Hardware
- Answer : a
- 10. _____ is not a high level language.
 - a) Basic
 - b) Java
 - c) MAC
 - d) Only 1
 - Answer : c
- 11. Which of the following tab has options to work with mail merge ?
 - a) Home
 - b) Mailings
 - c) Insert
 - d) Both 1 And 3 $\,$
 - Answer : b
- 12. The recipients list is saved in.....folder.
 - a) Main Data Sources
 - b) My Data Sources
 - c) Merge Data Sources
 - d) None Of These
 - Answer : b

13. There are..... vertical alignments to align the text in a table .

- a) 4
- b) 5
- c) 6
- d) 3

Answer: d

14. Under which tab is the table option found ?

- a) Mailing
- b) Home
- c) Both 1 And 2

d) Insert Answer : d

- 15. The table tools tab consists of design tab and.....tab.
 - a) Format
 - b) Layout
 - c) Draw
 - d) None Of These
 - Answer : b
- 16. A device that allows users to feed data into a computer for analysis and storage and togive commands to the computer is called
 - a) Output device
 - b) Input device
 - c) Memory
 - d) Both a and b

Answer : b

17. User communicates with a computer with the help of which devices?

- a) Input device
- b) Output device
- c) Software device
- d) Both a and b
- Answer : d
- 18. Which device allows you to enter data and instructions into a computer?
 - a) Input device
 - b) Output device
 - c) ALU
 - d) CPU

Answer : a

- 19. Which device allows you to enter data and instructions into a computer?
 - a) Input device
 - b) Output device
 - c) ALU
 - d) CPU
 - Answer : a
- 20. A device that communicates the results of data processed by the computer and converts the digital information into a form that humans can easily read and understood is called
 - a) Input
 - b) Monitor
 - c) Output
 - d) Keyboard
 - Answer : c

5 Marks Ouestions

- 1. Write a note on computer maintenance.
- 2. What are the possible threats to a computer system and how to provide security?

- 3. Explain the typical causes of computer failures.
- 4. Write a note on Computer virus.
- 5. . Explain the cache memory in detail.
- 6. Write a note on components of motherboard.
- 7. Explain the different factors affecting the processing speed of CPU.
- 8. Explain the General Structure of CPU.
- 9. What are the basic operations of computer?
- 10. What are the characteristics of computer?

10 Marks Questions

- 1. Explain different type of computers
- 2. Explain the advantages of using graphics in documents
- 3. Draw and explain the function block diagram of computer
- 4. Explain internal and external dos commands.
- 5. Explain the different types of page formatting.
- 6. Write the steps to create a web page using template.
- 7. What are the two types of dos commands? give example
- 8. Why do you indent text? give example
- 9. Explain the features of macro.
- 10. Explain the steps to generate a table of contents
- 11. What is meant by a cache memory explain?
- 12. Explain the term 'Batch processing'.
- 13. Write short notes on sequential file organization.
- 14. What are the types of threats to computer system?
- 15. Explain the Generations of computers in detail.
- 16. Explain various types of computers in detail.
- 17. Define cryptography. Explain its classifications.
- 18. Illustrate the objectives of file management system.
- 19. What is mail merge? Give the basic steps in using mail merge in MSWord.

UNIT - II

MCO's

- 1. A device that allows users to feed data into a computer for analysis and storage and togive commands to the computer is called
 - a) Output device
 - b) Input device
 - c) Memory
 - d) Both a and b
 - Answer : b
- 2. User communicates with a computer with the help of which devices?
 - a) Input device
 - b) Output device
 - c) Software device
 - d) Both a and b
 - Answer : d
- 3. Which device allows you to enter data and instructions into a computer?

- a) Input device
- b) Output device
- c) ALU
- d) CPU

Answer : a

- 4. Which device converts human-understandable data and programs into a form that computers can understand and process?
 - a) Output
 - b) Monitor
 - c) Input
 - d) All of the above

Answer : c

- 5. A device that communicates the results of data processed by the computer and converts the digital information into a form that humans can easily read and understood is called
 - a) Input
 - b) Monitor
 - c) Output
 - d) Keyboard
 - Answer : c
- 6. Which of the following groups are only input devices?
 - a) Mouse, keyboard, monitor, Joystick
 - b) Mouse, keyboard, printer, Light pen
 - c) Mouse, keyboard, Scanner, Joystick, Light pen
 - d) Mouse, keyboard, Trackball, Touch Screen, Microphone
 - e) Both c and d

Answer : e

7. Which of the following is not a pointing device?

- a) Mouse
- b) Joystick
- c) Light pen
- d) Digitizer
- Answer : d
- 8. Which input device is used for input text, numbers, and commands to the computer?
 - a) Mouse
 - b) Keyboard
 - c) Scanner
 - d) All of the above
 - Answer : b
- 9. Which input device is/are used to move the cursor position on a monitor screen?
 - a) Mouse
 - b) Joystick
 - c) Light pen
 - d) Both a and b

Answer : d

10. The number of function keys in a keyboard is

- a) 14
- b) 12
- c) 13
- d) 15

Answer : c

11. Ctrl, Shift, and Alt are known as _____ keys.

- a) function
- b) modifier
- c) alphanumeric
- d) adjustment

Answer : b

12. Which key of keyboard is used to make characters either upper or lower case?

- a) ESC
- b) Return
- c) Shift
- d) Both a and c

Answer : c

13. The use of tab key in the keyboard is

- a) to move a cursor across the screen
- b) to indent a paragraph
- c) to move the cursor down the screen
- d) Both a and c

Answer : d

14. Mouse is

- a) pointing and drop device
- b) cursor-control device
- c) monitoring device
- d) Both a and b

Answer : d

- 15. The first computer mouse was developed by
 - a) Douglas Engelbart
 - b) William English
 - c) Daniel Cougher
 - d) Robert Zawaski

Answer : a

- 16. Optical mouse was built by
 - a) IBM, 1920
 - b) Intel, 1930
 - c) Microsoft, 1999
 - d) Dell, 2000

Answer : c

17. Which of the following is used in an optical mouse?

- a) Infrared light
- b) Light Emitting Diode (LED)
- c) Sensor
- d) Microwave

Answer : b

18. Wireless mouse communicates through

- a) radiowaves
- b) infrared wave
- c) microwaves
- d) Electromagnetic signal

Answer : a

- 19. Which of the following are not input devices?
 - a) Webcam and Microphone
 - b) Bar Code Reader and Smart Card Reader
 - c) Optical Character Reader and Optical Mark Recognition
 - d) Monitor and Printer

Answer : d

- 20. Which of the following is/are input devices?
 - a) Track ball
 - b) Scanner
 - c) Touch screen
 - d) Magnetic Ink Card Reader (MICR)
 - e) All of the above

Answer : e

5 Marks Ouestions

- 1. What are the three different types of mouse devices?
- 2. What are OMR and OCR?
- 3. What are the input devices?
- 4. Explain about digital camera?
- 5. Explain floppy disk?
- 6. What are printer and CRT monitor?
- 7. How does an ink-printer work?
- 8. What are the two types of wireless printer technology?
- 9. What is the output devices used for physically challenged users?
- 10. How does a biometric device works?

10 Marks Ouestions

- 1. What are the output devices and explain it?
- 2. Briefly discuss about any 3 input devices?
- 3. Write about mouse and its types?
- 4. Write about printer and its types?
- 5. What is a bio metric identifier and what are some examples?
- 6. What determines the quality of an LCD monitor and LCD screen?

- 7. What is the difference between active matrix and passive matrix displays?
- 8. How is portrait orientation different from landscape orientation?
- 9. What are the common types of flash memory cards?
- 10. What is the difference between a sector and a track?

<u>UNIT – III</u>

MCO's

- 1. The chip______which is uses battery power stores configuration information about the computer.
 - a) CMOS
 - b) BIOS
 - c) POST
 - d) RAM
 - Answer : a
- 2. ______often are difficult to use because they require exact spelling, grammar, and punctuation.
 - a) Graphical user interfaces
 - b) Command-line interfaces
 - c) Menu-driven interfaces
 - d) All the above
 - Answer : b
- 3. In the windows vista operating system, the ______interface provides an enhanced visual look additional navigation options, and animation.
 - a) Plug and Play
 - b) Windows Vista Basic
 - c) Mac OS X
 - d) Windows Aero

Answer : a

- 4. When an operating system spends much of its time paging, instead of executing application software it said to be _____
 - a) Booting
 - b) Thrashing
 - c) Spooling
 - d) Formatting
 - Answer : b
- 5. A______is a small program that tells the operating system how to communicate with a specific device.
 - a) Buffer
 - b) Driver
 - c) Performance monitor
 - d) Device

Answer : b

- a) File manager
- b) Buffer
- c) Index
- d) Driver
- Answer : c
- 7. A______is a program that attempts to locate a file on your computer based on criteria you specify.
 - a) File manager
 - b) Search utility
 - c) Startup folder
 - d) Kernel

Answer : b

- 8. Defragmenting reorganizes the files on a disk so they are located in ______Access time.
 - a) Noncontiguous sectors, which slows
 - b) Noncontiguous sectors, which speeds
 - c) Contiguous sectors, which speeds
 - d) Contiguous sectors, which slows

Answer : c

9. A ______ contains files necessary to boot and work with Linux operating system, which allows users to preview the operating system without installing it.

- a) UNIX
- b) Web service
- c) Live CD
- d) BIOS
- Answer : a

10. ______developed by sun Microsystems manager, high traffic accounts and incorporates security necessary for web transaction.

- a) Solaris
- b) Linux
- c) Windows Server 2003
- d) Netware
- Answer : a
- 11. Examples of ______ which hosted on website, include e-mail, word processing, tax preparation, and game programs.
 - a) Shareware
 - b) Web-based software
 - c) E-learning software
 - d) Public domain software
 - Answer : b

12. In a document window, the _____usually displays a document's file name.

- a) Title bar
- b) Status bar
- c) Menu
- d) Dialog box

Answer : a

13. With the database software, users can run a ______ which is a request for specific data from the database.

- a) Record
- b) Function
- c) Query
- d) Field
- Answer : c

- a) Database
- b) Document management
- c) Portable Document Format
- d) Word processing

Answer : b

15. _____combines Application software's such as word processing, spreadsheet and other programs, easy to package.

- a) A software suite
- b) Shareware
- c) Packaged software
- d) Custom software

Answer : a

- 16. ______helps home users determines where a purpose, they are spending money.
 - a) Legal software
 - b) Personal DTP software
 - c) Personal finance software
 - d) Tax preparation software

Answer: b

- 17. __is a collection of clip art and photographs.
 - a) Professional photo editing software
 - b) Personal photo editing software
 - c) Clip art/image gallery
 - d) Entertainment software

Answer : c

18.

_____allows you to view images and animation, listen to audio, and watch video files.

- a) A software suite
- b) Video editing software
- c) A media player
- d) A CD/DVD burner

Answer : d

19. An enterprise ASP _____

- a) Supplies packaged applications
- b) Provides applications for a particular industry
- c) Customizes and delivers high end business application
- d) Offers a variety of software applications to specific regions

Answer : d

- 20. ______is the delivery of education via some electronic method such as the internet, networks, or CDs/DVDs
 - a) A softward wizard
 - b) E-learning
 - c) Online help
 - d) Distance learning

Answer : b

5 Marks Ouestions

- 1. Write a short note on system software?
- 2. Write any five functions of operating system?
- 3. Write a short note on Stand-alone operating systems?
- 4. Write a short note on Network operating systems?
- 5. Write a short note on Embedded operating systems?
- 6. Write a short note on Application software?
- 7. Explain the role of system software?
- 8. Write a short note on business software?
- 9. Explain about multimedia authoring software?
- 10. Write any five functions of Graphics and multimedia software?

10 Marks Ouestions

- 1. Write the functions of operating system?
- 2. Explain briefly about utility programs of operating system?
- 3. What is operating system and explain types of operating system?
- 4. Explain briefly about Network operating system and embedded operating system?
- 5. Describe difference between UNIX and LINUX?
- 6. Discuss briefly about stand-alone utility programs?
- 7. Explain briefly about Application software?
- 8. Discuss the functions of business software?
- 9. Explain briefly about Graphics and Multimedia software?
- 10. Discuss the functions of graphics and multimedia software?

$\underline{UNIT} - \underline{IV}$

MCO's

- 1. The Internet has its roots in, which was a networking Project started by an agency of the US department of defense.
 - a) ICANNb) NSFnetc) WISPd) ARPANET

Answer : d

- 2. A WI-Fi network uses to provide Internet connection to wireless computers and devices. a) Copper telephone lines
 - b) the cable television networks
 - c) radio signals
 - d) a dish shaped antenna

Answer : c

- 3. As with an IP address, the components of a domain name are separated by.
 - a) commas
 - b) semicolonsc) colons
 - d) periods

Answer : d

- 4. Many Web page address begin with, which stands for a set of rules that defines howpages transfer on the Internet.
 - a) W3C
 - b) http
 - c) hits
 - d) pop Answer : b
- 5. The combines text based links with graphic, audio, and video links.
 - a) Hypertext
 b) multi-linking
 c) Hypermedia
 d) Tabbed Browsing
 Answer: c
- 6. All of the following techniques can be used to improve web searches except a) list all possible spellings
 - b) read a search engines Help information
 - c) use general nouns and put the most important terms last
 - d) if a search is unsuccessful, try another search engine.
 - Answer : c
- 7. They May offer online photo albums, Chat rooms and other services to facilitate communications among members.
 - a) Online communities
 - b) Informational Web sites
 - c) Advocacy Web Sites
 - d) Wikis
 - Answer : a
- 8. Is a specific type of online social network that enables members to share photos, Music, and videos.
 - a) blog
 - b) wiki
 - c) podcast

d) media sharing Web site **Answer : d**

- 9. A(n) is a business that gathers and organise web content and then distribute or feeds the content to subscribe for free or a fee.
 - a) WISP
 b) ISP
 c) content aggregator
 d) blogger
 Answer : d
- 10. A recorded audio stored on a web site that can be downloaded to a computer or aportable media player.

a) blog b) wiki

c) portal

d) podcast

Answer : d

11. It is the process of transferring data in a continuous and even flow, allowing users to access and use a file while it is transmitting.

a) Linkingb) streaming

c) Surfing

d) Clicking

Answer : b

12. Use Such as :) for smile and :(frown to express emotions in e-mail, newsgroups and chat rooms.

a) emotions

b) spam

c) spoilers

d) flames

Answer : a

13. Which is the following represents the fastest data transmission speed?

a) gbps
b) kbps
c) bps
d) bandwidth
Answer: a

14. Wi-Fi Uses

a) Phase line

b) Radio waves

c) Optic fiber

d) Sound waves

Answer : b

15. A device that connects to a network without the use of cable is said to be

a) open source
b) cabled
c) distributed
d) wireless
Answer : d

16. A document management system is

- a) provides personal information manager function
- b) provides for storage and management of a companies documents
- c) allows users to share document with other user in real time
- d) print to a web address associated with a particular printer

Answer : b

- 17. Different application can communicate with each other by sending XML, files to the a) Internet telephony
 - b) web services
 - c) instant messenger
 - d) alabal nasitianing a
 - d) global positioning system.

Answer : b

18. The internet is also simply known as

- a) NAT
- b) NOT
- c) NET
- d) NFT
- Answer : c

19. Which is the following is an example of connectivity

- a) Datab) Internetc) Power card
- d) Floppy disk
- Answer : b
- 20. A web address is also called a
 - a) URL b) LUR c) ULR d) LRU **Answer : b**

5 Marks Ouestions

- 1. Explain the history of internet?
- 2. How the internet works?
- 3. How to Connecting to the Internet?
- 4. How data travels the internet?
- 5. Explain the World Wide Web?
- 6. What are the Types of Web sites?
- 7. Explain the LAN, MAN?

- 8. How Works the Network Communication Standards?
- 9. What is the Communication Software?
- 10. Explain about Communications Channel?

10 Marks Questions

- 1. What is the Internet? How Internet Works and how it Connecting?
- 2. What is the World Wide Web? Explain browsing the web and web address?
- 3. Explain about E- Commerce?
- 4. What is Other Internet Services? Explain about E-mail?
- 5. Explain about the Navigating Web pages? What are the Types of Website's?
- 6. What is Communication? Explain Uses of Computer Communications?
- 7. Explain about Networks with diagrams?
- 8. What is the Intranets? Explain Network Communications standards?
- 9. Explain Communication Software and Communication devices?
- 10. Explain about Physical transmission media and Wireless transmission media?

UNIT-V

MCO's

- 1. What is the full form of DBMS?
 - a) Data of Binary Management System
 - b) Database Management System
 - c) Database Management Service
 - d) Data Backup Management System
 - Answer : b
- 2. Database is a ____
 - a) Organized collection of information that cannot be accessed, updated, and managed
 - b) Collection of data or information without organizing
 - c) Organized collection of data or information that can be accessed, updated, and managed
 - d) Organized collection of data that cannot be updated **Answer : c**
- 3. What is DBMS?
 - a) DBMS is a collection of queries
 - b) DBMS is a high-level language
 - c) DBMS is a programming language
 - d) DBMS stores, modifies and retrieves data
 - Answer : d
- 4. Who created the first DBMS?
 - a) Edgar Frank Codd
 - b) Charles Bachman
 - c) Charles Babbage
 - d) Sharon B. Codd
 - Answer : b
- 5. Which type of data can be stored in the database?a) Image oriented data

b) Text, files containing datac) Data in the form of audio or videod) All of the aboveAnswer : d

- 6. In which of the following formats data is stored in the database management system?
 - a) Image
 - b) Text
 - c) Table
 - d) Graph
 - Answer : c
- 7. Which of the following is not a type of database?
 - a) Hierarchical
 - b) Networkc) Distributedd) Decentralized
 - Answer : d
- 8. Which of the following is not an example of DBMS?
 - a) MySQL
 b) Microsoft Access
 c) IBM DB2
 d) Google
 Answer : d
- 9. Which of the following is a feature of DBMS?
 - a) Minimum Duplication and Redundancy of Data
 - b) High Level of Security
 - c) Single-user Access only
 - d) Support ACID Property
 - Answer : c
- 10. Which of the following is a feature of the database?
 - a) No-backup for the data stored
 - b) User-interface provided
 - c) Lack of Authentication
 - d) Store data in multiple locations

Answer : b

- 11. In which of the following, a person is constantly followed/chased by another person or group of several peoples?
 - a) Phishing
 - b) Bulling
 - c) Stalking
 - d) Identity theft
 - Answer : c
- 12. Which one of the following can be considered as the class of computer threats?
 - a) Dos Attack
 - b) Phishing

c) Solicitingd) Both A and cAnswer: a

13. Which of the following is considered as the unsolicited commercial email?

- a) Virus b) Malware
- c) Spam
- d) All the above
- Answer : c
- 14. Which of the following usually observe each activity on the internet of the victim, gather all information in the background, and send it to someone else?
 - a) Malware
 - b) Spyware
 - c) Adware

d) All of the above

Answer : b

15. ______is a type of software designed to help the user's computer detect viruses and avoid them.

- a) Malware
- b) Adware
- c) Antivirus
- d) Both B and C
- Answer : c

16. Which one of the following is a type of antivirus program?

- a) Quick heal
- b) Mcafee
- c) Kaspersky
- d) All the above
- Answer : d
- 17. It can be a software program or a hardware device that filters all data packets coming through the internet, a network, etc. it is known as the _____:
 - a) Antivirus
 - b) Firewall
 - c) Cookies
 - d) Malware
 - Answer : b
- 18. Which of the following refers to stealing one's idea or invention of others and use it for their own benefits?
 - a) Piracy
 - b) Plagiarism
 - c) Intellectual property rights
 - d) All the above
 - Answer : d
- 19. Which of the following refers to exploring the appropriate, ethical behaviors related to he

online environment and digital media platform?

- a) Cyber lowb) Cyberethicsc) Cybersecurityd) CybersafetyAnswer : b
- 20. Which of the following refers to the violation of the principle if a computer is no more accessible?
 - a) Access control
 b) Confidentiality
 c) Availability
 d) All the above
 Answer: c

5 Mark Ouestions

- 1. What is Hierarchy of data?
- 2. Explain about maintaining of data.
- 3. Explain in detail about database administration.
- 4. What is compute security risks?
- 5. Explain-validating data.
- 6. What are multidimensional databases?
- 7. What are qualities of valuable information?
- 8. Explain 'Denial of service attacks'.
- 9. Briefly explain object oriented database.
- 10. Explain- a) computer viruses b) worms c) trojan horses

10 Mark Questions

- 1. Explain about databases, data and information
- 2. Write In detail about file processing versus databases
- 3. What are data management systems?
- 4. Describe relational and object oriented
- 5. Write advantages and disadvantages of database management system?
- 6. Explain in detail about web databases
- 7. Write about database administration
- 8. Compare and contrast file systems with database systems?
- 9. What are internet and network attack?
- 10. Explain about unauthorized data and its uses.

<u>CLOUD COMPUTING</u> <u>UNIT- I</u>

MCO's

- 1. What type of computing technology refers to services and applications that typically run on a distributed network through virtualized resources?
 - a) Distributed Computing
 - b) Cloud Computing
 - c) Soft Computing
 - d) Parallel Computing
 - Answer : b
- 2. Which one of the following options can be considered as the Cloud?
 - a) Hadoop
 - b) Intranet
 - c) Web Applications
 - d) All of the mentioned

Answer : a

- 3. Cloud computing is a kind of abstraction which is based on the notion of combining physical resources and represents them as ______resources to users.
 - a) Real
 - b) Cloud
 - c) Virtual
 - d) none of the mentioned
 - Answer : c
- 4. Which of the following has many features of that is now known as cloud computing?a) Web Service
 - b) Softwares
 - c) All of the mentioned
 - d) Internet
 - Answer : d
- Which one of the following cloud concepts is related to sharing and pooling theresources?
 a) Polymorphism
 - b) Virtualization
 - c) Abstraction
 - d) None of the mentioned
 - Answer : b
- 6. Which one of the following statements is not true?
 - a) The popularization of the Internet actually enabled most cloud computing systems.
 - b) Cloud computing makes the long-held dream of utility as a payment possible for you, with an infinitely scalable, universally available system, pay what you use.
 - c) Soft computing addresses a real paradigm in the way in which the system is deployed.
 - d) All of the mentioned

Answer : c

- 7. Which one of the following can be considered as a utility is a dream that dates from the beginning of the computing industry itself?
 - a) Computing
 b) Model
 c) Software
 d) All of the mentioned
 Answer: a
- 8. Which of the following is an essential concept related to Cloud?
 - a) Reliability
 b) Abstraction
 c) Productivity
 d) All of the mentioned
 Answer : b
- 9. Which one of the following is Cloud Platform by Amazon?
 - a) Azure
 - b) AWS
 - c) Cloudera
 - d) All of the mentioned
 - Answer : b
- 10. Which of the following statement is not true?
 - a) Through cloud computing, one can begin with very small and become big in a rapid manner.
 - b) All applications benefit from deployment in the Cloud.
 - c) Cloud computing is revolutionary, even though the technology it is built on is evolutionary.
 - d) None of the mentioned

Answer : b

- 11. Which of the following is not a type of cloud server?
 - a) Public Cloud Servers
 - b) Private Cloud Servers
 - c) Dedicated Cloud Servers
 - d) Merged Cloud Servers
 - Answer : d
- 12. Who is the father of cloud computing?
 - a) Sharon B. Coddb) Edgar Frank Coddc) J.C.R. Lickliderd) Charles Bachman
 - Answer : c
- 13. Which of the following are the features of cloud computing?
 - a) Security
 - b) Availability
 - c) Large Network Access

d) All of the above **Answer : d**

- 14. Which of the following is a type of cloud computing service?
 - a) Service-as-a-Software (SaaS)
 - b) Software-and-a-Server (SaaS)
 - c) Software-as-a-Service (SaaS)
 - d) Software-as-a-Server (SaaS)
 - Answer : c
- 15. Which of the following is an example of the cloud?
 - a) Amazon Web Services (AWS)
 - b) Dropbox
 - c) Cisco WebEx
 - d) All of the above
 - Answer : d
- 16. Applications and services that run on a distributed network using virtualized resourcesis known as ______ computing.
 - a) Parallel
 b) Soft
 c) Distributed
 d) Cloud
 Answer: d
- 17. Which of the following is the application of cloud computing?
 - a) Adobe Creative Cloud
 - b) Paypal
 - c) Google G Suited) All of the aboveAnswer : d

18. The essential concept related to the Cloud is _____

- a) Abstraction
- b) Reliability
- c) Productivity
- d) All of the mentioned

Answer : a

- 19. Cloud computing is a concept that involves pooling physical resources and offeringthem as which sort of resource?
 - a) cloud
 - b) real
 - c) virtual
 - d) none of the mentioned

Answer : c

- 20. Cloud Platform provided by Amazon is _____
 - a) AWS
 - b) Cloudera

c) Azured) All of the mentionedAnswer: a

5 Marks Questions

- 1. What are the layers and types of clouds?
- 2. Write note on desired features of a cloud.
- 3. State essential characteristics of cloud computing.
- 4. State the benefits of cloud computing.
- 5. Write short notes on origins of cloud computing.
- 6. Explain in detail about cloud service with example.
- 7. Discuss the operational and economic benefits of SaaS.
- 8. Explain the of cloud base d service.
- 9. What are the basic principles of cloud computing?
- 10. What are the security constrains in cloud computing?

10 Marks Ouestions

- 1. Explain the concept of roots of cloud computing.
- 2. Explain the concept of seven-step model of migration into a cloud.
- 3. Explain briefly the security concerns of cloud computing.
- 4. Describe the concept of Transition challenges of cloud computing.
- 5. Describe the concept of Life cycle of SLA.
- 6. Discuss the concept of Amazon web service in cloud.
- 7. Explain the concept of RVWS design.
- 8. Explain the concept of Map Reduce implementations for the cloud.
- 9. Enumerate the concept of virtual machines provisioning and manageability.
- 10. What are the technologies for data security in cloud computing?
- 11. Describe the concept of federated of cloud computing.

UNIT-II

MCO's

1. Compute resources can be provisioned on- demand in the form of ______

- a) Programming languages
- b) Virtual machines
- c) Scalable

d) Monitoring

Answer : b

- 2. The public DNS can be used to securely connect to the intance using
 - a) SSH
 - b) DNS
 - c) GCE
 - d) EC2
 - Answer : a
- Cloud storage services provide high capacity and _______
 a) Replication

- b) Encryptionc) Consistencyd) ScalabilityAnswer: d
- 4. _____is the non-relational (no-SQL)database service from amazon.
 - a) Amazon DynamoDBb) Googlec) screenshotd) asynchronous
 - Answer : a

5. Image manipulation service allows applications to _____

- a) Resize
- b) Crop
- c) Rotate
- d) All the above
- Answer : d

6. Google cloud messaging for android provides pusg messaging fora) Android devices

- a) Android devices
 b) mobile platforms
 c) windows
 d) GCM
 Answer : a
- 7. Hive is a data warehouse system for_____
 - a) Language
 - b) Hadoop
 - c) streaming
 - d) binary
 - Answer : b

8. Amazon provides a development service is called_____

- a) Elastic Beanstalk
- b) Wizard
- c) python
- d) provisioning
- Answer : a
- 9. Open stack is a_____
 - a) Keystone
 - b) Cloud operating system
 - c) Nova schedular
 - d) Swift
 - Answer : b
- 10. ______ is an open source framework for distributed batch processing of big data.
 a) Parallel programming
 b) HDFS

- c) Apache hadoopd) ToleranceAnswer: c
- 11. Hive provides an SQL -like language called
 - a) HDFS
 - b) Framework
 - c) Cassandra
 - d) HiveQL
 - Answer : d
- 12. The default schedular in hadoop is.
 - a) FIFO
 - b) Yahoo
 - c) Pools
 - d) CPU

Answer : a

13. _____Is a workflow schedular system for managing hadoop jobs.

- a) Oozie
- b) Sqoop
- c) Mahout
- d) Zookeeper

Answer : a

- 14. _____is a data collection system for monitoring large distributed systems.
 - a) Hive
 - b) Flume
 - c) Hbase
 - d) Chukwa

Answer : d

- 15. All the pools have equal share by
 - a) Peroidically
 - b) Hadoop
 - c) default
 - d) FIFO

Answer : c

16. Compute engine is a compute service provided by

- a) Google
- b) GCE
- c) Yahoo
- d) SSH

Answer : a

- 17. Azure SQL database is baesd on the
 - a) SQL server
 - b) Integers
 - c) Strings

d) Microsoft Answer : a

- 18. _____allows application to send email messages.
 - a) Web framework
 - b) Datastore
 - c) task queue
 - d) email service
 - Answer : d

19. _____Allows applications to resize, croDatastore

- a) Datastore
- b) task queue
- c) email service
- d) image manipulation service

Answer : d

20. _____allow applications to do work in the background by discrete series called a) Web framework

- b) Datastorec) task queue
- d) email service
- Answer : b

5 Marks Questions

- 1. Write about Google compute engine.
- 2. Explain about application runtimes & framework.
- 3. Write about queuing service.
- 4. Write about media services.
- 5. Write about identity & access management services.
- 6. Write about eucalyptus.
- 7. Explain about openstack.
- 8. Write about apache hadoop.
- 9. Write about networking.
- 10. Explain about starting and stopping hadoop cluster.

10 Marks Questions

- 1. Explain briefly about storage services.
- 2. Explain briefly about database services.
- 3. Explain briefly about application services.
- 4. Write a brief note of open source private cloud software.
- 5. Write brief about apache hadoop.
- 6. Explain breifly about hadoop schedulers.
- 7. Write a breif note of hadoop cluster setup.
- 8. Explain breifly about analytics services
- 9. Write about eucalyptus and openstack.
- 10. Write breifly about hadoop map reduce job execution.

UNIT-III

MCQ's

- 1. _____ is an important factor that drives the application designers to move to cloud computing environments.
 - a) scalabilityb) asynchronous
 - c) statelessd) replication
 - Answer : a
- 2. _____describe a discrete system function .
 - a) endpoint
 - b) binding
 - c) service
 - d) interface
 - Answer : c
- 3. _____is the address of the web service.
 - a) endpoint
 - b) binding
 - c) service
 - d) interface
 - Answer : a
- 4. <u>defines a web service and the operations that can be performed by the services and the input and output.</u>
 - a) operation
 - b) interface
 - c) service
 - d) binding
 - Answer : b

5. The second step in the CCM design methodology is _____

- a) loose coupling
- b) architecture design
- c) stateless design
- d) asynchronous
- Answer : b
- 6. ____manages the data and the behavior of the applications.
 - a) View
 - b) model
 - c) controller
 - d) MVC
 - Answer : b
- 7. User interact with the application through _____
 - a) View
 - b) model

- c) controllerd) processerAnswer : a
- 8. _____constraint constrains the behavior of components.
 - a) layered systemb) statelessc) client-serverd) uniform interfaceAnswer : a
- 9. ____allows the client and server to be independently developed and updated.
 - a) layered system
 - b) stateless
 - c) client-server
 - d) uniform interface

Answer : c

- 10. _____conforms to the relational model that was popularized by edgar codd.
 - a) relational database
 - b) model
 - c) controller
 - d) processer

Answer : a

- 11. _____can be provisioned and auto scaling options for each tier can be defined.
 - a) virtual machines
 - b) design
 - c) savings

d) methodology

Answer : a

- 12. _____provides the flexibility to use both vertical and horizontal scaling forapplication components.
 - a) GAE
 - b) CCM
 - c) ACE
 - d) EAC
 - Answer : b

13. Who can upload image files and choose the filters to apply.

- a) django
- b) AWS
- c) users
- d) image

Answer : c

14. A cloud storage is used for thea) storage tierb) AWS

- c) usersd) imageAnswer : a
- 15. ____applications allows users to store documents
 - a) Application tier
 - b) database tier
 - c) cloud based storage
 - d) upload files
 - Answer : c

16. The selected map and reduce programs along with the input data are submitted to_____

- a) AW S
- b) django
- c) queue
- d) map reduce
- Answer : c

17. The ______function handles the request for the job submission page.

- a) home()b) enqueue job()c) form()d) name()Answer : a
- 18. <u>has a front end for displaying results.</u>
 - a) analytics
 - b) web tier
 - c) queue
 - d) python
 - Answer : b

19. The list of keywords can be configured in the _____

- a) analytics
- b) web tier
- c) queue
- d) listener
- Answer : d

20. The listener component uses the ______to get feeds on a specific keyword.

- a) twitter API
- b) database tier
- c) cloud based storage
- d) upload files
- Answer : a

5 Marks Ouestions

- 1. Write about scalability.
- 2. Explain about service oriented architecture.
- 3. Explain about cloud architecture design.
- 4. Write about iaas, paas, and saas.

- 5. Write about relational(SQL)approach
- 6. Write about design approaches for iaas service model.
- 7. Write about image processing app.
- 8. Write about map reduce app.
- 9. Explain about analytics app.
- 10. Write about document storage app.

10 Marks Questions

- 1. Explain briefly about data storage approaches.
- 2. Explain briefly about reliability & availability.
- 3. Explain briefly about cloud application design methodologies.
- 4. Breif about architecture for cloud applications.
- 5. Explain briefly about restful web series.
- 6. Write both relational (SQL) and non relational (SQL) approaches.
- 7. Write briefly about design approaches.
- 8. Write about image processing app & document storage app.
- 9. Explain briefly about map reduce app with algorithm
- 10. Write about social media analytics app.

<u>UNIT – IV</u>

MCO's

- 1. What is cloud computing?
 - a) Cloud computing means providing services like storage, servers, database, networking, etc
 - b) Cloud computing means storing data in a database
 - c) Cloud computing is a tool used to create an application
 - d) None of the above

Answer : a

- 2. Which of the following is not a type of cloud server?
 - a) Public Cloud Servers
 - b) Private Cloud Servers
 - c) Dedicated Cloud Servers
 - d) Merged Cloud Servers

Answer : d

- 3. Who is the father of cloud computing?
 a) Sharon B. Codd
 b) Edgar Frank Codd
 c) J.C.R. Licklider
 d) Charles Bachman
 Answer : c
- 4. Which of the following are the features of cloud computing?
 - a) Security
 - b) Availability
 - c) Large Network Access
 - d) All of the above

Answer : d

- 5. Which of the following is a type of cloud computing service?
 a) Service-as-a-Software (SaaS)
 b) Software-and-a-Server (SaaS)
 c) Software-as-a-Service (SaaS)
 d) Software-as-a-Server (SaaS)
 Answer: c
- 6. Which of the following is an example of the cloud?
 - a) Amazon Web Services (AWS)
 b) Dropbox
 c) Cisco WebEx
 d) All of the above
 Answer : d
- 7. Applications and services that run on a distributed network using virtualized resourcesis known as ______ computing.
 - a) Parallel
 - b) Soft
 - c) Distributed
 - d) Cloud
 - Answer : d
- 8. Which of the following is the application of cloud computing?
 - a) Adobe
 - b) Paypalc) Google G Suited) All of the above
 - Answer : d
- 9. Which of the following is an example of a PaaS service?
 - a) Heroku
 - b) AWS Elastic Beanstalk
 - c) Windows Azure
 - d) All of the above
 - Answer : d
- 10. Which of the following is an example of an IaaS service?
 - a) DigitalOcean
 - b) Linode
 - c) Rackspace
 - d) All of the above
 - Answer : d
- 11. Which of the following is an example of a SaaS service?
 - a) Google Workspace
 - b) Dropbox
 - c) Salesforce
 - d) All of the above
 - Answer : d

- b) Reliabilityc) Productivityd) All of the mentionedAnswer : d
- 13. Cloud computing is a concept that involves pooling physical resources and offeringthem as which sort of resource?
 - a) cloud
 - b) real
 - c) virtual
 - d) none of the mentioned

Answer : c

14. Cloud Platform provided by Amazon is _____

- a) AWS
- b) Cloudera
- c) Azure
- d) All of the mentioned

Answer : a

- 15. Which of the following model consists of the service that you can access on a cloud computing platform?
 - a) Deployment
 - b) Service
 - c) Application
 - d) None of the mentioned

Answer : b

- 16. What does "C" in CaaS stand for?
 - a) Communication
 - b) Compliance
 - c) Computer
 - d) Company
 - Answer : d
- 17. What is the total number of service models present in the Cloud?
 - a) 4 service models
 - b) 2 service models
 - c) 1 service model
 - d) 3 service models

Answer : d

- 18. Which of the following is correct?
 - a) Remote server applications are accessed via WS-+ services transmitted over XML messages using the SOAP protocol
 - b) A transaction that follows the SOAP rules is termed RESTful
 - c) REST stands for Representational State Transfer

d) None

Answer : c

b) Storagec) Securityd) All of the mentionedAnswer: c

20. _____is associated with considerable vendor lock-in.

- a) CaaS
- b) SaaS
- c) PaaS
- d) IaaS
- Answer : a

5 Marks Questions:

- 1. What are the layers and types of clouds?
- 2. Write note on desired features of a cloud.
- 3. State essential characteristics of cloud computing.
- 4. State the benefits of cloud computing.
- 5. Write short notes on origins of cloud computing.
- 6. Explain in detail about cloud delivery model.
- 7. Discuss the operational and economic benefits of SaaS.
- 8. Explain the concept of cloud supply chain.
- 9. What are the basic principles of cloud computing?
- 10. What are the security constrains in cloud computing?

10 Marks Questions:

- 1. Explain the concept of roots of cloud computing.
- 2. Explain the concept of seven-step model of migration into a cloud.
- 3. Explain briefly the security concerns of cloud computing.
- 4. What are the challenges in SaaS? Explain
- 5. Discuss the concept of SaaS integration products and platforms.
- 6. Describe the concept of Transition challenges of cloud computing.
- 7. Describe the concept of Life cycle of SLA.
- 8. Discuss the concept of Amazon web service in cloud.
- 9. Explain the concept of RVWS design.

<u>UNIT - V</u>

MCO's

- 1. A ________ serves as the master and there is only one NameNode per cluster.
 - a) Data Node
 - b) NameNode
 - c) Data block
 - d) Replication
 - Answer : b
- 2. Point out the correct statement.
 - a) DataNode is the slave/worker node and holds the user data in the form of Data Blocks
 - b) Each incoming file is broken into 32 MB by default
 - c) Data blocks are replicated across different nodes in the cluster to ensure a low degree of fault tolerance

d) None of the mentioned **Answer : a**

- 3. HDFS works in a ______fashion.
 a) master-worker
 b) master-slave
 c) worker/slave
 d) all of the mentioned
 Answer : a
- 4. _____NameNode is used when the Primary NameNode goes down.
 - a) Rack
 - b) Data
 - c) Secondary
 - d) None of the mentioned
 - Answer : c
- 5. Which of the following scenario may not be a good fit for HDFS?
 - a) HDFS is not suitable for scenarios requiring multiple/simultaneous writes to the same file
 - b) HDFS is suitable for storing data related to applications requiring low latency data access
 - c) HDFS is suitable for storing data related to applications requiring low latency data access
 - d) None of the mentioned

Answer : a

- 6. _____is the slave/worker node and holds the user data in the form of Data Blocks.
 - a) DataNode
 - b) NameNode
 - c) Data block
 - d) Replication
 - Answer : a
- 7. HDFS provides a command line interface called _____used to interact with HDFS. a) "HDFS Shell"
 - b) "FS Shell"
 - c) "DFS Shell"
 - d) None of the mentioned
 - Answer : b
- 8. For YARN, the_____Manager UI provides host and port information.
 - a) Data Node
 - b) NameNode
 - c) Resource
 - d) Replication
 - Answer : c
- 9. During start up, the _____ds the file system state from the fsimage and the edits log file.
 - a) DataNode
 - b) NameNode
 - c) ActionNode

d) None of the mentioned **Answer : b**

10. In HDFS the files cannot be

- a) read
 b) deleted
 c) executed
 d) Archived
 Answer: c
- 11. Which of the following command sets the value of a particular configuration variable (key)?
 - (Key)?
 - a) set -v b) set =
 - c) set
 - d) reset

Answer : b

12. Which of the following operator executes a shell command from the Hive shell?

a) | b) ! c) ^ d) + **Answer : b**

13. Hive specific commands can be run from Beeline, when the Hive ______ driver is used. a) ODBC

b) JDBC
c) ODBC-JDBC
d) All of the Mentioned
Answer: b

14. Which of the following data type is supported by Hive?

- a) map
- b) record
- c) string
- d) enum

Answer : d

15. Avro-backed tables can simply be created by using ______ in a DDL statement. a) "STORED AS AVRO"

- b) "STORED AS AVRO
- c) "STORED AS AVROHIVE"
- d) "STORED AS SERDE"
- Answer : a

16. Types that may be null must be defined as a _____ of that type and Null within Avro.

- a) Union
- b) Intersection
- c) Set
- d) All of the mentioned
- Answer : a

- 17. ______is interpolated into the quotes to correctly handle spaces within the schema. a) \$SCHEMA
 - b) \$ROW
 - c) \$SCHEMASPACESd) \$NAMESPACESAnswer : a

18. ____was designed to overcome the limitations of the other Hive file formats.

- a) ORC
- b) OPC
- c) ODC
- d) None of the mentioned

Answer : a

19. An ORC file contains groups of row data called _____

- a) postscript
- b) stripes
- c) script
- d) none of the mentioned

Answer : b

20. HBase is a distributed______database built on top of the Hadoop file system.

- a) Column-oriented
- b) Row-oriented
- c) Tuple-oriented
- d) None of the mentioned

Answer : a

5 Marks Ouestions:

- 1. What are the best practices in Big Data analytics?
- 2. Explain the techniques used in Big Data Analytics.
- 3. What make a great analysis? State reason with example.
- 4. Examine in detail the trends and technology in big data
- 5. Describe in detail about 5v"s?
- 6. Illustrate Map-Reduce with example.
- 7. Generalize the list of tools related to Hadoop.
- 8. How does Hadoop work?
- 9. Feature of MapR distribution
- 10. Explain the architecture for MapR.

10 Marks Ouestions:

- 1. List the main characteristics of big data architecture with a neat schematic diagram.
- 2. Explain in detail about the challenges of conventional system
- 3. How would you show your understanding of the tools, trends and technology in big data?
- 4. Discuss the use of Big Data Analytics in Business with suitable real world example.
- 5. Discuss the following features of Apache Hadoop in detail with diagram as necessary.
- 6. Explain the complexity theory for Map-Reduce? What is reducer size and replication rate?
- 7. Explain the significances Hadoop distributed file systems and its application

- 8.
- Summarize briefly on i. Feature of MapR distribution ii. Explain the architecture for MapR

<u>SBEC – PROGRAMMING IN C LANGUAGE</u> <u>UNIT – I</u>

MCO's

- 1. Which among the following generation computers had expensive operation cost? a) First
 - b) Second
 - c) Third
 - d) Fourth
 - Answer : a
- 2. Which among the following registers is loaded with the contents of the memory locationpointed by the PC?
 - a) Memory address registers
 - b) Memory data registers
 - c) Instruction register
 - d) Program counter
 - Answer : c
- 3. The number of records contained within a block of data on magnetic tape is defined by the
 - a) Block definition
 b) Record contain clause
 c) Blocking factor
 d) Record per block
 Answer: c
- 4. Which among the following is not a third generation computer?
 - a) A.IBM 360
 b) B.IBM 1401
 c) PDP-8
 d) HP2115
 Answer: b
- 5. Which among the following is an example of fifth generation computer?
 - a) A.PIM/m
 b) ICL 2950
 c) IBM 1401
 d) None of above
 Answer: a
- 6. Which among the following printing devices an output composed of a series of data?a) Wire matrix printerb) Band ariset
 - b) Band printerc) Wang image printer
 - d) Both a and c
 - Answer : d
- 7. Which among the following does not affect the resolution of a video display image?a) Bandwidth
 - b) Raster scan rage

c) Vertical and horizontal lines of resolutiond) Screen sizeAnswer : d

- 8. Which among the following disk is fixed disk?
 a) Hard Disks
 b) Flash Disks
 c) Blu-Ray Disks
 d) DVDs
 Answer: a
 - ____
- 9. Which 8-bit chip was used in many of today's TRS-80 computers?
 a) Z-8000
 b) Motorola 6809
 c) Z-8808
 d) Z-80
 Answer : d
- 10. Which of the following is not a class based on size?
 - a) Mainframe Computer
 - b) Micro Computerc) Mini Computerd) Digital ComputerAnswer : d

11. The processing speed of first generation computers was

- a) milliseconds
- b) microseconds
- c) nanoseconds
- d) picoseconds
- Answer : a
- 12. Where was the first computer installed in India?
 - a) Indian Statistical Institute, Kolkata
 - b) Indian Institute of Statistics, Delhi
 - c) Indian Institute of Science, Bangalore
 - d) Indian Institute of Management, Ahmedabad
 - Answer : a
- 13. Which of the following statements best describes the batch method of input ?
 - a) Data is processed as soon as it is input
 - b) Data is input at the time it is collected
 - c) Data is collected in the form of source documents, placed into groups, and then input to the computer
 - d) Source documents are not used

Answer : c

- 14. Super computer developed by Indian scientists?
 - a) Param
 - b) Cray I

c) Blue Gened) IBM SequoiaAnswer : a

15. First generation computers used

a) Transistor

b) Micro processors

c) Vacuum tube processors

d) Integrated circuit

Answer : c

16. What is the full form of the first Electronic Computer ENIAC?

a) Electrical Numerical Integrator and Calculator

b) Electronic Numeric Integrator and Calculator

c) Electrical Numerical Integrated Computer

d) Electro Numeric Integrity Computer

Answer : b

17. In 1960's Texas institute invented_____.

a) integrated circuits

- b) microprocessor
- c) vacuum tubes

d) transistors

Answer : a

18. The first digital electronic computer was built in the year_____.

- a) 1950
- b) 1940
- c) 1960
- d) 1930

Answer : b

19. The first mechanical adding machine was invented by Blaise Pascal in _____.

- a) 1652
- b) 1642
- c) 1659

d) 1643

Answer : b

20. Early computers like ENIAC, EDVAC, and UNIVAC I all can be classified as__.

a) Third Generation Computers

b) Second Generation Computers

c) First Generation Computers

d) None of the above

Answer : c

- 21. What difference does the 5th generation computer have from other generation computers?
 - a) Technological advancement
 - b) Scientific code

c) Object Oriented Programmingd) All of the aboveAnswer : a

22. The processing speed of first generation computers was

- a) milliseconds
- b) microseconds
- c) nanoseconds
- d) picoseconds
- Answer : a

23. Microprocessors as switching devices are for which generation computers

- a) First Generation
- b) Second Generation
- c) Third Generation
- d) Fourth Generation

Answer : d

- 24. The computer size was very large in
 - a) First Generation
 - b) Second Generation
 - c) Third Generation
 - d) Fourth Generation
 - Answer : a
- 25. Second Generation computers were developed during
 - a) 1949 to 1955
 b) 1956 to 1965
 c) 1965 to 1970
 d) 1970 to 1990
 Answer: b
- 26. Chief component of first generation computer was
 - a) Transistors
 - b) Vacuum Tubes and Valves
 - c) Integrated Circuits
 - d) None of above
 - Answer : b
- 27. Which of the following is first generation of computer?
 - a) EDSAC
 b) IBM-1401
 c) CDC-1604
 d) ICL-2900
 Answer: a
- 28. _____is the science that attempts to produce machines that display the same type of intelligence that humans do.
 - a) Nano science
 - b) Nanotechnology
 - c) Simulation

d) Artificial intelligence (AI) Answer : d

29. The primary purpose of software is to turn data into _____

- a) Web sites
- b) Information
- c) Programs
- d) Objects

Answer : b

30. The most important or powerful computer in a typical network is _____

- a) Desktop
- b) Network client
- c) Network server
- d) Network station

Answer : c

2 Marks Ouestions

- 1. When was the first computer invented?
- 2. Who invented the Internet?
- 3. When was the first computer game released?
- 4. When and who invented the first computer mouse?
- 5. Who is the father of the computer?
- 6. What was the first computer programming language?
- 7. When was the first keyboard invented?
- 8. How many generations of computers are there?
- 9. Give one example of a high-level language
- 10. Name a translator program that is faster than interpreter.

5 / 10 Marks Questions

- 1. Write short notes on the following;
 - (i) Abacuse (ii) Jacquard's loom
- 2. Write a short note on Napier's bones.
- 3. Name the machines designed by Charles Babbage.
- 4. What is contribution of John von Neumann in the field of computer?
- 5. Who devised Harvard Mark? What was it used for?
- 6. What are the characteristic features of the third-generation computers?
- 7. What are the basic differences between the four generations of computers? Give two examples of the first-generation computers.
- 8. What are supercomputers?
- 9. What are artificial intelligence?
- 10. Describe the strength and limitations of computers

<u>UNIT – II</u>

MCOs

1. Joysticks typically have a button on ______ that is used to select the option pointedby the cursor.

- a) Bottomb) Leftc) Rightd) TopAnswer : d
- 2. The joystick is a ________stick that moves the graphic cursor in the direction thestick is moved.
 - a) Parallel
 - b) Horizontal
 - c) Straight
 - d) Vertical
 - Answer : d
- 3. The ______ pen is a small input device used to select and display objects on a screen.
 - a) Ink
 - b) Magnetic
 - c) Light
 - d) None of the above

Answer : c

- 4. A device for converting handwritten impressions into coded characters & positional coordinates for input to a computer is
 - a) Touch panel
 - b) Mouse
 - c) Wand
 - d) Writing tablet

Answer : d

- 5. Which device of computer operation dispenses with the use of the keyboard?
 - a) Joystick
 - b) Light pen
 - c) Mouse
 - d) Touch
 - Answer : c
- 6. _____ keys are present on the top row of the keyboard.
 - a) Function
 - b) Type writer
 - c) Numeric
 - d) Navigation
 - Answer : a
- 7. The device primarily used to provide hardcopy is the
 - a) CRT
 - b) Computer Console
 - c) Printer
 - d) Card Reader
 - Answer : c

- Dot-matrix, Deskjet, Inkjet and Laser are all types of which computer peripherals?
 a) Printers
 - b) Softwarec) Monitorsd) KeyboardsAnswer: a
- 9. Which among the device that converts computer output into a form that can be transmitted over a telephone line?

a) Teleportb) Multiplexerc) Concentratord) ModemAnswer : d

- 10. A light sensitive device that converts drawing, printed text or other images into digital form is
 - a) Keyboardb) Plotterc) Scannerd) OMRAnswer : c
- 11. What type devices are computer speakers or headphones?
 - a) Input
 - b) Input/Output
 - c) Software
 - d) Output
 - Answer : d
- 12. Laser printers belong to
 - a) line printer
 - b) page printer
 - c) band printer
 - d) dot matrix printer
 - Answer : b
- 13. A joystick is primarily used to/for
 - a) control sound on the screen
 - b) computer gamin
 - c) enter text
 - d) draw pictures
 - Answer : b
- 14. USB refers to
 - a) a storage device
 - b) a processor
 - c) a port type
 - d) a serial bus standard

Answer : c

15. The _____ may also be called the screen or monitor.

- a) printer
- b) scanner
- c) hard disk
- d) display
- Answer : d

16. Which of the following groups consists of only input devices?

- a) Mouse, Keyboard, Monitor
- b) Mouse, Keyboard, Printer
- c) Mouse, Keyboard, Plotter
- d) Mouse, Keyboard, Scanner

Answer : d

- 17. What type of device is a digital camera?
 - a) Input
 - b) Output
 - c) Software
 - d) Storage
 - Answer : a

18. What type of device is a digital camera?

- a) Input
- b) Output
- c) Software
- d) Storage
- Answer : a
- 19. A bar code reader is an example of
 - a) processing device
 - b) storage device
 - c) input device
 - d) output device
 - Answer : c
- 20. Speed of the printer is limited by the speed of
 - a) paper movements
 - b) cartridge used
 - c) length of paper
 - d) All of these
 - Answer : b
- 21. Which among the following Windows do not have Start button
 - a) Windows Vista
 - b) Windows 7
 - c) Windows 8
 - d) None of above
 - Answer : c
- 22. Which among the following Operating systems is better for implementing a Client-Servernetwork

a) MS DOS
b) Windows 95
c) Windows 98
d) Windows 2000
Answer: d

23. Which among the following operating system do you choose to implement a client servernetwork?

a) MS DOS
b) Windows
c) Windows 98
d) Windows 2000
Answer: d

- 24. Which among the following Operating System does not implement multitasking truly?
 - a) Windows 98b) Windows NTc) Windows XPd) MS DOS

Answer : d

- 25. Which among the following windows versionsupport64 bit processor?
 - a) Windows 98
 - b) Windows 2000
 - c) Windows XP
 - d) Windows 95
 - Answer : c
- 26. Which among the following operating system does not implement the multitasking truly ?
 - a) Windows 98
 b) Windows NT
 c) Windows XP
 d) MS DOS
 Answer : d
- 27. Which of the following is an example of a real time operating system?

a) Lynxb) MS DOSc) Windows XP

- d) Process Control
- Answer : d
- 28. You should save your computer from ?
 - a) Viruses
 - b) Time bombs
 - c) Worms
 - d) All of the above
 - Answer : d

- 29. You can reset the wrong displayed system of time and dates by using?
 - a) Write
 - b) Calendar
 - c) Write file
 - d) Control panel
 - Answer : d
- 30. What are the different uses of multiple recycle bin for a hard disk ?
 - a) you can set different size for each recycle bin
 - b) you can choose which recycle bin to use to store your deleted files
 - c) You can make any one of them default recycle bin
 - d) None of above

Answer : a

2 Marks Ouestions

- 1. Name any two types of plotters.
- 2. Give one example of specific purpose application software.
- 3. Name the computer programe designed to help the user perform a certain type of work
- 4. Which utility program manages the files and folders on a computer?
- 5. Name any two types of non-impact printers
- 6. Name any two operating systems.
- 7. What is an operating system?
- 8. Name the icon that provides access to all drives, files, and folders on the computer.
- 9. What is Recycle Bin?
- 10. What is Input
- 11. What is Output

5 Marks Ouestions

- 1. Write short notes on the following input devices.
 - (i) Keyboard (ii) Graphic tablet
- 2. What is secondary memory? Describe the two main types of secondary memory.
- 3. Write a short note on cache memory.
- 4. What are impact printers? Describe the different types of impact printers.
- 5. What is software? Describe the four main types of software.
- 6. What is the use of an antivirus program?
- 7. Write short notes on each of the three types of computer languages.
- 8. Write the differences between assembly language and machine language
- 9. What is the need of an operating system?
- 10. What are the four main functions of an operating system?

10 Marks Ouestions

- 1. Explain any two types of operating systems?
- 2. Explain what is an algorithm in computing?
- 3. Explain The Functions Of The Cu And Alu In The Cpu Of A Computer?
- 4. Define The Basic Logical Structure Of A Computer?
- 5. What Do You Mean By Parallel Processing?
- 6. What are the steps to write an algorithm?

- 7. Give advantages and disadvantages of flow chart
- 8. What are the rules to draw off flow chart?
- 9. Draw and briefly explain five symbols commonly used in a flowchart.
- 10. Explain any 5 Input Devices
- 11. Explain any 5 Output devices

<u>UNIT – III</u>

MCO's

- 1. What is the date when Babbage conceived Analytical engine
 - a) 1642
 - b) 1837
 - c) 1880
 - d) 1850
 - Answer : b
- 2. Modern Computers are very reliable but they are not
 - a) Fast
 - b) Powerful
 - c) Infallible
 - d) Cheap

Answer : c

- 3. A byte consists of
 - a) One bit
 - b) Four bits
 - c) Eight bits
 - d) Sixteen bits

Answer : c

- 4. Machine language is
 - a) Machine dependent
 - b) Difficult to program
 - c) Error prone
 - d) All of above
 - Answer : d
- 5. The term gigabyte refers to a) 1024 bytes
 - b) 1024 kilobytes
 - c) 1024 megabytes
 - d) 1024 gigabyte
 - Answer : c
- 6. A compiler is a translating program which
 - a) Translates instruction of a high level language into machine language
 - b) Translates entire source program into machine language program
 - c) It is not involved in program's execution
 - d) All of above

Answer : d

- The difference between memory and storage is that memory is _____ and storage is _____
 a) Temporary, permanent
 - b) Permanent, temporary
 - c) Slow, fast
 - d) All of above
 - Answer : a
- 8. Algorithm and Flow chart help us to
 - a) Know the memory capacity
 - b) Identify the base of a number system
 - c) Direct the output to a printer
 - d) Specify the problem completely and clearly

Answer : d

- 9. How to declare a wide character in the string literal?
 - a) L prefix
 - b) l prefix
 - c) W prefix
 - d) Z prefix
 - Answer : a
- 10. The difference between x and 'x' is?
 - a) The first one refers to a variable whose identifier is x and the second one refers to the character constant x
 - b) The first one is a character constant x and the second one is the string literal x
 - c) Both are same
 - d) Both are string literal

Answer : a

- 11. Which of the following statement is not true about preprocessor directives?
 - a) These are lines read and processed by the preprocessor
 - b) They do not produce any code by themselves
 - c) These must be written on their own line
 - d) They end with a semicolon

Answer : d

- 12. How are the constants declared?
 - a) const keyword
 - b) #define preprocessor
 - c) both const keyword and #define preprocessor
 - d) \$define

Answer : c

- 13. What are the parts of the literal constants?
 - a) integer numerals
 - b) floating-point numerals
 - c) strings and boolean values
 - d) all of the mentioned
 - Answer : d
- 14. The constants are also called as _____

a) const
b) preprocessor
c) literals
d) variables
Answer : c

15. _____ not a secondary constant. a) Character

- b) Array
- c) Pointer Structure
- d) Union

Answer : a

- 16. Is it true that a function may have several declarations, but only one definition?
 - a) Yesb) NoAnswer : a
- 17. Global variable are available to all functions. Does there exist a mechanism by way ofwhich it available to some and not to others.
 - a) Yesb) NoAnswer : b
- 18. The name of the variable used in one function cannot be used in another function?
 - a) True
 - b) False
 - c) May be
 - d) None of the mentioned.

Answer : b

- 19. Which keyword is used to prevent any changes in the variable within a C program? a) immutable
 - b) mutable
 - c) const
 - d) volatile
 - Answer : c

20. Which of the following declaration is illegal?

- a) char *str = "Best C programming classes by AllIndiaExams";
- b) char str[] = "Best C programming classes by AllIndiaExams";
- c) char str[20] = "Best C programming classes by AllIndiaExams";

d) char[] str = "Best C programming classes by AllIndiaExams";

Answer : d

21. What will be the output of the following C code?

```
#include
int main()
{ if (~0 == 1) printf("yes\n"); else printf("no\n");
}
a) yes
```

b) noc) compile time errord) undefinedAnswer : b

- 22. Each program can have_____.
 - a) Functions
 - b) Output
 - c) Input
 - d) All of These
 - Answer : d

23. A program is a sequence of ______ written in a programming language. a) Lines

- b) Code Word
- c) Functions
- d) Instructions
- Answer : d
- 24. The wheel located between the two standard buttons on a mouse is used to _____
 - a) Click on web pages
 - b) Shutdown
 - c) Click and select items
 - d) Scroll
 - Answer : d
- 25. Using output devices one can _____
 - a) Input data
 - b) Store data
 - c) Scan data
 - d) View or print data
 - Answer : d
- 26. Which of the following is a temporary output?
 - a) Hard copyb) Soft copyc) Duplicate copyd) On paperAnswer : b
- 27. Which of the following Printers have a speed in the range of 40-300 characters per second?
 - a) Inkjetb) Laserc) Dot matrixd) DrumAnswer : a

b) Mirroringc) Strippingd) RAID classificationAnswer: c

- 29. Which is the device used for converting maps, pictures and drawings into digital form for storage in computers?
 - a) Digitizer
 - b) Scanner
 - c) Image Scanner
 - d) MICR

Answer : a

- 30. Name the device that converts text information into spoken sentences.
 - a) Speech Sensors
 - b) Compact convertors
 - c) Speech Synthesizers
 - d) Voice systems

Answer : c

2 Marks Ouestions

- 1. What is datatype?
- 2. What is Constant?
- 3. What is Variable?
- 4. What is Operator?
- 5. What is Expression?
- 6. How to reading a character?
- 7. How to Writing a Character?
- 8. What is formatted Input?
- 9. What is formatted output?
- 10. What are Symbolic constants?

5 / 10 Marks Questions

- 1. What are the key features in the C programming language?
- 2. What are the basic data types associated with C?
- 3. What is the description for syntax errors?
- 4. What is the process to create increment and decrement statement in C?
- 5. What are reserved words with a programming language?
- 6. Describe static function with its usage?
- 7. What is the difference between abs() and fabs() functions?
- 8. Describe the difference between = and == symbols in C programming?
- 9. What is variable initialization and why is it important?
- 10. What are header files and what are its uses in C programming?

$\underline{UNIT} - \underline{IV}$

MCOs

1. A labeled statement consist of an identifier followed by a) ;

b) : c) , d) = **Answer : b**

- 2. Which loop is guaranteed to execute at least one time.
 - a) for
 - b) while
 - c) do while
 - d) None of the above
 - Answer : c
- 3. Switch statement accepts.
 - a) int
 - b) charc) longd) All of the aboveAnswer : d
- 4. Which of the following is an invalid if-else statement?
 - a) if (if (a == 1)){}
 b) if (a){}
 c) if ((char) a){}
 d) if (func1 (a)){}
 Answer : a
- 5. goto can be used to jump from main to within a function?
 - a) TRUEb) FALSEc) May Bed) Can't SayAnswer: b
- 6. Which keyword can be used for coming out of recursion?
 - a) return
 b) break
 c) exit
 d) both A and B
 Answer: a
- 7. The continue statement cannot be used with
 - a) forb) whilec) do whiled) switchAnswer : d
- 8. Which of the following sentences are correct about a switch loop in a C program?
 - 1. switch is useful when we wish to check the value of variable against a particular set of values.
 - 2. switch is useful when we wish to check whether a value falls in different ranges.

3. Compiler implements a jump table for cases used in switch.

- 4. It is not necessary to use a break in every switch statement.
- a) 1,2
- b) 1,3,4

c) 2,4 d) 2

Answer : b

- 9. Which of the following sentences are correct about a for loop in a C program?
 - 1. for loop works faster than a while loop.
 - 2. All things that can be done using a for loop can also be done using a while loop
 - 3. for(;;); implements an infinite loop.
 - 4. for loop can be used if we want statements in a loop get executed at least once.

a) 1

- b) 1, 2
- c) 2, 3
- d) 2, 3, 4

Answer : d

- 10. Which of the following statements are correct about if-else statements in a C-program?
 - 1. Every if-else statement can be replaced by an equivalent statements using ?: operators
 - 2. Nested if-else statements are allowed.
 - 3. Multiple statements in an if block are allowed.
 - 4. Multiple statements in an else block are allowed.
 - a) 1 and 2 $\,$
 - b) 2 and 3
 - c) 1, 2 and 4
 - d) 2, 3, 4

Answer : d

11. A file is preferable to an array of structures because

- a) file lives even after the program that created it terminates
- b) memory space will not be wasted
- c) there are many system tools to manipulate files
- d) All of the above

Answer : d

- 12. Choose the correct statements
 - a) Array stores data of the same type
 - b) Array can be a part of a structure
 - c) Array of structure is allowed
 - d) All of the above

Answer : d

13 Choose the correct statements

- a) an entire array can be passed as an argument to a function
- b) a part of an array can be passed as argument to a function
- c) any change done to an array that is passed as an argument to a function will be local to the function

d) Both (a) & (b) Answer : d

14 If arr is a two dimensional array of 10 rows and 12 columns, then arr (5) logically points to the

a) sixth row b) Fifth row

- c) fifth column
- d) sixth column
- Answer : a

15 A set of names can be represented as a

- a) two-dimensional array of characters
- b) one-dimensional array of strings
- c) one-dimensional array of pointers to character
- d) All of above

Answer : d

16 C does no automatic array bound checking. This is

- a) true
- b) false
- c) C's asset
- d) C's shortcoming
- Answer : d
- 17. If a two dimensional array is used as a formal parameter, then
 - a) both the subscripts may be left empty
 - b) the first (row) subscript may be left empty
 - c) the first subscript must be left empty
 - d) both the subscripts must be left empty
 - Answer : b
- 18. The maximum number of dimension an array can have in C is
 - a) 3
 - b) 4
 - c) 5
 - d) compiler dependent
 - Answer : d
- 19. The parameter passing mechanism for an array is
 - a) call by valueb) call by value-result
 - c) call by reference
 - d) none of these
 - Answer : c
- 20. While passing an array as an actual argument, the function call must have the array name
 - a) with empty brackets
 - b) with its size
 - c) alone

d) none of the above **Answer : c**

- 21. Is initialization mandatory for local static variables?
 - a) YES
 - b) NO
 - c) Depends on the compiler
 - d) Depends on the standard

Answer : b

- 22. What is the format identifier for "static a = 20.5;"?
 - a) %s
 - b) %d

c) %f

d) Illegal declaration due to absence of data type

Answer : b

- 23. Array sizes are optional during array declaration by using keyword.
 - a) auto
 - b) static
 - c) extern
 - d) register

Answer : c

- 24. What is the scope of a function?
 - a) Whole source file in which it is defined
 - b) From the point of declaration to the end of the file in which it is defined
 - c) Any source file in a program
 - d) From the point of declaration to the end of the file being compiled **Answer : d**
- 25. What is the scope of an external variable?
 - a) Whole source file in which it is defined
 - b) From the point of declaration to the end of the file in which it is defined
 - c) Any source file in a program
 - d) From the point of declaration to the end of the file being compiled **Answer : d**
- 26. Which of the following function is more appropriate for reading in a multi-word string?
 - a) A.printf();
 - b) scanf();
 - c) gets();
 - d) puts();

Answer : c

- 27. Which of the following function is used to find the first occurrence of a given string inanother string?
 - a) strchr()
 - b) strrchr()
 - c) strstr()

- d) strnset()
 Answer : c
- 28. The library function used to find the last occurrence of a character in a string is
 - a) strnstr()
 b) laststr()
 c) strrchr()
 d) strstr()
 Answer: c

29. How will you print \n on the screen?

a) printf("\n");
b) echo "\\n";
c) printf('\n');
d) printf("\\n");
Answer: d

- 30. Which of the following function sets first n characters of a string to a given character?
 - a) strinit()
 b) strnset()
 c) strset()
 d) strcset()
 Answer : b
- 31. Which of the following function compares 2 strings with case-insensitively?
 - a) strcmp(s, t)
 b) strcmpcase(s, t)
 c) strcasecmp(s, t)
 d) strchr(s, t)
 - Answer : c
- 32. Which pre-defined function returns a pointer to the last occurence of a character in a string?
 - a) strchr(s, c);b) strrchr(s, c);
 - c) strlchr(s, c);
 - d) strfchr(s, c);
 - Answer : b
- 33. String operation such as strcat(s, t), strcmp(s, t), strcpy(s, t) and strlen(s) heavily rely upon.
 - a) Presence of NULL character
 - b) Presence of new-line character
 - c) Presence of any escape sequence
 - d) None of the mentioned

Answer : a

- 34. What type of return-type used in String operations?
 - a) A.void only
 - b) void and (char *) only

c) void and int onlyd) void, int and (char *) onlyAnswer : d

- 35. Strcat() function adds null character.
 - a) Only if there is space
 - b) Always
 - c) Depends on the standard
 - d) Depends on the compiler
 - Answer : b
- 36. Use_____to determine the null-terminated message string that corresponds to the errorcode errcode.
 - a) strerror()
 - b) strstr()
 - c) strxfrm()
 - d) memset()
 - Answer : a
- 37. This function offers the quickest way to determine whether two character sequences of the same known length match character for the character up to and including any null character in both.
 - a) strcmp()
 b) memcmp()
 c) strncmp()
 d) no such function
 Answer: c
- 38. The ______function returns the number of characters that are present before the terminating null character.
 - a) strlength()b) strlen()
 - c) strlent()
 - d) strchr()
 Answer : b

2 Marks Questions

- 1. What is an array?
- 2. How are elements of an array accessed?
- 3. What is a subscript?
- 4. Which is the smallest subscript?
- 5. How many subscripts does a one and two dimensional array have?
- 6. Write the syntax for declaring a one dimensional array
- 7. Write the syntax for declaring a two dimensional array
- 8. What do you mean by initializing an array?
- 9. What is a string?
- 10. Write the syntax for declaration of a string
- 11. State the difference between a null character and a null sting
- 12. Which header file is needed to perform string operation?
- 13. Which header file is needed to perform character operations?

- 14. Write an example for string initialization
- 15. What is the difference between gets() and scanf() function?
- 16. What is a function?
- 17. What are the different types of functions supported in "C" language?
- 18. What are library functions?
- 19. What is a user defined function?
- 20. What is a nested loop?

5 Marks Questions

- 1. Explain the various string operations with examples
- 2. Explain the various character functions with example
- 3. Give the differences between library functions and user-defined functions
- 4. What is a function call? What is the syntax of a function call?
- 5. Why the return statement is is required in a function body?
- 6. What is a function prototype? When is a function prototype necessary?
- 7. What is the explanation for prototype function in C?
- 8. What are the valid places to have keyword "Break"?

10 Marks Ouestions

- 1. Explain user defined function with an example
- 2. Define the following
 - a. Actual parameters
 - b. formal parameters
 - c. global variables
 - d. local variables
- 3. What are storage classes? Mention different types of storage classes. Explain
- 4. What are the general description for loop statements and available loop types in C?
- 5. What is the general form of function in C?
- 6. How do you declare a variable that will hold string values?

UNIT – V

10 Marks Questions

Development of algorithm, flow chart and program for the following

- 1. Average of a set of numbers
- 2. Area of a triangle
- 3. Sorting a set of numbers in ascending and descending order
- 4. Summing the series of numbers
- 5. Solving the series of numbers.

ABOUT THE AUTHOR

Mrs. G. Amalredge was born in 1983 in Tirunelveli and she is currently working as an Assistant Professor in the Department of Computer Science, St. Joseph's College of Arts and Science for Women, Hosur. She has completed M.C.A in Annamalai University and M.Phil., in Periyar University. She has a versatile experience of 10 years. She has published 6 papers in National and International Journals. Her areas of interest include Networking, Robotics and Natural Language Processing. Received the Best Senior Faculty Award from Novel Research Academy, **Registered under the Ministry of MSME, Government** of India. She has published books on Web Technology (ISBN - 13: 978-93-5577-368-5) and Relational Database Management Systems (ISBN - 13: 978-93-5577-310-4).



