

1. A floating point is said to be normalized if the most significant digit of the mantissa is—
(A) Zero (B) Non-zero
(C) Negative (D) Positive
(E) None of the above
2. Which of the following application is suitable for FIFO Queue?
(A) An inventory of parts is to be processed by part number
(B) A dictionary of words used by a spelling checker is to be created
(C) A program to solve a maze is to back track to an earlier position when a dead end position is reached
(D) A program to keep track of patients as the check into clinic, assigning them to doctors a first come, first served basis
(E) None of the above
3. The field that investigates the mechanics of human intelligence is—
(A) Artificial Science
(B) Cognitive Science
(C) Psychology
(D) Sociology
(E) None of the above
4. Which data structure is needed to convert infix notation to postfix notation?
(A) Branch (B) Queue
(C) Tree (D) Stack
(E) None of the above
5. Data are followed to be transmitted in only one direction in a—
(A) Simplex Channel
(B) Duplex Channel
(C) Half-Duplex Channel
(D) Full-Duplex Channel
(E) None of the above
6. Which of the following statement is not true regarding graph?
(A) A graph consists of set of nodes and a set of arcs
(B) A graph is a tree
(C) A tree is a graph
(D) Graphs can be directed
(E) None of the above
7. Implementation of an inverted list to maintain the record list for each value for a given attribute can be done by—
(A) Sequential file
(B) Direct file
(C) Indexed file
(D) Indexed sequential
(E) None of the above
8. A 6-MHz channel is used by digital signaling system utilizing 4-level signals. What is maximum possible transmission rate?
(A) 1.5 M band/sec
(B) 6 M band/sec
(C) 12 M band/sec
(D) 24 M band/sec
(E) None of the above
9. Which of the following is a type of ISDN (Integrated Services Digital Network)?
(A) Narrow Band
(B) Broad Band
(C) Both (A) and (B)
(D) Medium Band
(E) None of the above
10. Which of the following is easiest software development process model?
(A) Waterfall Model
(B) Prototyping
(C) Interactive enhancement
(D) Spiral Model
(E) None of the above
11. Which of the following feature is related to virtual circuit?
(A) Connection Oriented
(B) Each packet sent is routed independently of its predecessors
(C) Successive packets may follow different routes
(D) Congestion control is difficult
(E) None of the above
12. Which one of the following interrupt is non-maskable?
(A) TRAP (B) RST 7.5
(C) INTR (D) RST 6.5
(E) None of the above
13. Binding the same name to multiple operations whose signature differ in number or types of arguments?
(A) Overloading
(B) Origin class
(C) Object model
(D) Package
(E) None of the above
14. The C declaration in A[3][5] of containing ... elements is itself an array containing ... integers.
(A) 3, 5 (B) 5, 3
(C) 3, 3 (D) 5, 5
(E) None of the above
15. What is the drawback of infrared and millimeter waves?
(A) They are directional
(B) They cannot pass through solid objects
(C) License is needed
(D) Can be used outdoor
(E) None of the above
16. Indexes created from a sequential (or sorted) set of primary keys are referred to as—
(A) Indexed file organisation
(B) Sequential file
(C) Index sequential
(D) All of the above
(E) None of the above

17. A central computer surrounded by one or more satellite computers is called—
 (A) Bus Network
 (B) Ring Network
 (C) Star Network
 (D) All of the above
 (E) None of the above
18. Which of the following is a major component of the telephone system?
 (A) Local loop
 (B) Trunks
 (C) Switching Office
 (D) All of the above
 (E) None of the above
19. A linear list of elements in which deletion can be done from one end and insertion can take place only at other end (rear) is known as—
 (A) Queues (B) Stacks
 (C) Trees (D) Branch
 (E) None of the above
20. For tree, which of the following list traversing through the entire list is not necessary?
 (A) Circular list
 (B) Singly linked list
 (C) Doubly linked list
 (D) Both (B) and (C)
 (E) None of the above
21. Which of the following is not included in DML (Data Manipulation Language)?
 (A) INSERT
 (B) UPDATE
 (C) DELETE
 (D) CAREATE
 (E) None of the above
22. Which of the following communication service provides messages preparation and transmission facilities?
 (A) Teletex (B) Teletext
 (C) X 400 (D) Fax
 (E) None of the above
23. Which of the following scheduler is in charge of handling the swapped out process?
 (A) Short term
 (B) Medium term
 (C) Long term
 (D) Both (A) and (B)
 (E) None of the above
24. Which of the following is not used as a data structure?
 (A) Array
 (B) Linked List
 (C) Graph
 (D) Directory
 (E) None of the above
25. Which of the following statement is not true in context of strings in C language?
 (A) It is array of characters
 (B) Last character of character array is always '0'
 (C) C inserts the null character automatically
 (D) Any string in C can be read by the function get char '0'.
 (E) None of the above
26. Which command will be used with vi editor to append text at end of line?
 (A) A (B) a
 (C) i (D) I
 (E) None of the above
27. Which the result of a computation depends on the speed of the processes involved there is said to be?
 (A) Cycle stealing
 (B) Race condition
 (C) A time lock
 (D) A dead lock
 (E) None of the above
28. Which of the following feature is true regarding concatenated virtual circuits?
 (A) A sequence of virtual circuits is set up from source through one or more gateways to the destination
 (B) Each gateway maintains table telling which virtual circle pass through it
 (C) The scheme works best when all the networks have roughly the same properties
 (D) All of the above
 (E) None of the above
29. A compiler which runs on one machine and generates a code for another machine—
 (A) Bootstrap
 (B) Cross-compiler
 (C) Lexical analyzer
 (D) All of the above
 (E) None of the above
30. Banker's algorithm for resource allocation deals with—
 (A) Dead lock prevention
 (B) Dead lock avoidance
 (C) Dead lock recovery
 (D) Mutual exclusion
 (E) None of the above
31. A method, which transfers the entire block of data from its own buffer to main memory takes place without intervention by cup—
 (A) Programmed input/output
 (B) Interrupt driven input / output
 (C) Direct Memory Access (DMA)
 (D) Resident Monitor
 (E) None of the above
32. Which the maximum clock rate is quoted for a logic family, it applies to a?
 (A) Shiftregister
 (B) Flip-flop
 (C) Counter
 (D) Single logic gate
 (E) None of the above
33. Which of the following table helps in representing the previous and next state of the sequential circuit prior to and after the clock pulse respectively?
 (A) Truth table
 (B) Characteristic table
 (C) Excitation table
 (D) Both (A) and (B)
 (E) None of the above
34. A large computer information system maintains many different computer files. Which among them is called a perpetual file?
 (A) Specialized file
 (B) Log file
 (C) Master file
 (D) History file
 (E) None of the above
35. One method of programming a computer to exhibit intelligence is called modeling—
 (A) Simulation
 (B) Cognitization
 (C) Psychic amelioration
 (D) Duplication
 (E) None of the above

36. In fiber optics the attenuation of light through glass depends on the—
 (A) Wavelength of light
 (B) Frequency of light
 (C) Speed of light
 (D) All of the above
 (E) None of the above
37. Ap-channel enhancement type MOSFET performs much the same function a PNP Transistor except that—
 (A) It operates much faster
 (B) It is considerably larger
 (C) It is controlled by voltage larger than current
 (D) It is controlled by current rather than a voltage like a bipolar transistor
 (E) None of the above
38. Among directory entry-node and file contents, which will be changed when a file is updated ?
 (A) Only directory entry and file contents
 (B) Only inode and file contents
 (C) Both (A) and (B)
 (D) Only directory entry
 (E) None of the above
39. Which of the following is an important component of semantic analysis ?
 (A) Symbol table
 (B) Type checking
 (C) Lex
 (D) Yacc
 (E) None of the above
40. Which of the following systems implementation approaches should be used if you want to run the old system and the new system at the same time for a specified period ?
 (A) Direct (B) Pilot
 (C) Phased (D) Parallel
 (E) None of the above
41. Which of the following derivation does a top-down parser ? The input is assumed to be scanned in left to right order ?
 (A) Left most derivation
 (B) Left most derivation traced out in reverse
 (C) Right most derivation
 (D) Right most derivation traced out in reverse
 (E) None of the above
42. CIDR (Classless Inter Domain Routing)—
 (A) It is used in class C Networks
 (B) It is used in class B Networks
 (C) It is used in class A Networks
 (D) All of the above
 (E) None of the above
43. Internal auditors should review data system design before they are—
 (A) Developed
 (B) Implemented
 (C) Modified
 (D) All of the above
 (E) None of the above
44. Which language has recently become the defector standard for interfacing application programs with relational database system ?
 (A) Oracle (B) SQL
 (C) Dbase (D) 4GL
 (E) None of the above
45. A program that places programs into main memory and prepares them for execution—
 (A) Linker
 (B) Assembler
 (C) Loader
 (D) Absolute entity
 (E) None of the above
46. A generalization of the Boyce Codd Normal Form to relation schemes which includes the multivated dependencies is called—
 (A) Second Normal Form
 (B) Third Normal Form
 (C) Fourth Normal Form
 (D) Fifth Normal Form
 (E) None of the above
47. Lexical Analyzer transforms as input streams into—
 (A) Regular Expression
 (B) Sequence of tokens
 (C) Binary
 (D) Symbols
 (E) None of the above
48. If we traverse binary search tree, in which manner that we get in ascending manner—
 (A) Inorder
 (B) Preorder
 (C) Post order
 (D) Graph
 (E) None of the above
49. Binary number 101110000 is equivalent to decimal—
 (A) 716 (B) 722
 (C) 718 (D) 724
50. The collection of communication line and routers form the—
 (A) Router
 (B) Bridge
 (C) Subnet
 (D) Packet