B.C.A.(First Semester) Examination, February/March-2022

BCA-1001

Computer Fundamental & Problem Solving Techniques

Time : 1:30 Hours   **Maximum Marks-100**

जब तक कहा न जाय, इस प्रश्नपुस्तिका को न खोलें

491

निर्देश : —

1. परीक्षार्थी अपने अनुक्रमांक, विषय एवं प्रश्नपुस्तिका की सीरीज का विवरण यथास्थान सही– सही भरें, अन्यथा मूल्यांकन में किसी भी प्रकार की विसंगति की दशा में उसकी जिम्मेदारी स्वयं परीक्षार्थी की होगी।

2. इस प्रश्नपुस्तिका में 100 प्रश्न हैं, जिनमे से केवल 75 प्रश्नों के उत्तर परीक्षार्थियों द्वारा दिये जाने है। प्रत्येक प्रश्न के चार वैकल्पिक उत्तर प्रश्न के नीचे दिये गये हैं। इन चारों में से केवल एक ही उत्तर सही है। जिस उत्तर को आप सही या सबसे उचित समझते हैं, अपने उत्तर पत्रक (O.M.R. ANSWER SHEET)में उसके अक्षर वाले वृत्त को काले या नीले बाल प्वांइट पेन से पूरा भर दें। यदि किसी परीक्षार्थी द्वारा निर्धारित प्रश्नों से अधिक प्रश्नों के उत्तर दिये जाते हैं तो उसके द्वारा हल किये गये प्रथमतः यथा निर्दिष्ट प्रश्नोत्तरों का ही मूल्यांकन किया जायेगा।

3. प्रत्येक प्रश्न के अंक समान हैं। आप के जितने उत्तर सही होंगे, उन्हीं के अनुसार अंक प्रदान किये जायेंगे।

4. सभी उत्तर केवल ओ०एम०आर० उत्तर पत्रक (O.M.R. ANSWER SHEET) पर ही दिये जाने हैं। उत्तर पत्रक में निर्धारित स्थान के अलावा अन्यत्र कहीं पर दिया गया उत्तर मान्य नहीं होगा।

5. ओ०एम०आर० उत्तर पत्रक (O.M.R. ANSWER SHEET) पर कुछ भी लिखने से पूर्व उसमें दिये गये सभी अनुदेशों को सावधानीपूर्वक पढ़ लिया जाय।

6. परीक्षा समाप्ति के उपरान्त परीक्षार्थी कक्ष निरीक्षक को अपनी प्रश्नपुस्तिका बुकलेट एवं ओ०एम०आर० शीट पृथक–पृथक उपलब्ध कराने के बाद ही परीक्षा कक्ष से प्रस्थान करें।

7. निगेटिव मार्किंग नहीं है।

महत्वपूर्ण : — प्रश्नपुस्तिका खोलने पर प्रथमतः जाँच कर देख लें कि प्रश्नपुस्तिका के सभी पृष्ठ भलीभाँति छपे हुए हैं। यदि प्रश्नपुस्तिका में कोई कमी हो, तो कक्ष निरीक्षक को दिखाकर उसी सीरीज की दूसरी प्रश्नपुस्तिका प्राप्त कर लें।

1. The hexadecimal equivalent of the binary number (0010010100)2 is :

(A) 0B4

(B) 0A4

(C) 224

(D) 0114

2. Convert $(52)_{16}$ into its decimal equivalent.

(A) 28

(B) 83

(C) 80

(D) 82

3. The binary number 1110 in hexadecimal format is _____

(A) 6

(B) E

(C) 14

(D) 15

4. The maximum number of bits sufficient to represent a hexadecimal number in binary:

(A) 4

(B) 3

(C) 7

(D) 8

5. ABC is a valid hexadecimal number.

    (A) True

    (B) False

    (C) Ambiguous statement

    (D) None of these

6. What does the symbol D represent in a hexadecimal number system?

    (A) 8

    (B) 16

    (C) 13

    (D) 14

7. A device used for video games, flight simulators, training simulators and for controlling industrial robots.

    (A) Mouse

    (B) Light pen

    (C) Joystick

    (D) Keyboard

8. Which of the following is not a point-and-draw device?

    (A) Keypad

    (B) Trackball

    (C) Touch screen

    (D) Mouse

9. What does GUI stand for?

    (A) Graphical User Instruction

    (B) Ground User Interface

    (C) General User Instruction

    (D) Graphical User Interface

10. The I/O devices are sometimes called the peripheral devices because they surround the CPU and memory of the computer system.

    (A) True

    (B) False

    (C) Ambiguous statement

    (D) None of these

11. These devices provide a means of communication between a computer and outer word.

    (A) I/O

    (B) Storage

    (C) Compact

    (D) Drivers

12. Which command is used to delete the directory that is empty?

    (A) Del *. *

    (B) RD

    (C) Erase

    (D) MD

13. Which command displays current directory name or change from one to another?

(A) Chdir

(B) Cd

(C) Mkdir

(D) Both a and b

14. Which command creates a directory or subdirectory?

(A) Dir

(B) Mkdir

(C) Md

(D) None of these

15. Which command will be used to display a file within the specified directory of pathname?

(A) Dir\pathname

(B) Dir\pathname \pathname

(C) Dir/ch

(D) Dir \pathname\filename

16. Which command displays the directory list including files in tree structure?

(A) Dir/s/f

(B) Tree/f

(C) Tree/s/f

(D) Dir/f

17. Which command should be used to display all files within the specified subordinate directory of the subdirectory?

(A) Dir \ pathname

(B) Dir \ pathname \ pathname

(C) Dir \ ch

(D) Dir \ pathname \ filename

18. Which command is used to display all the files having the (.exe) extension but different filename?

(A) Dir filename. *

(B) Dir filename.ext

(C) Dir * .sys

(D) Dir * .ext

19. Which command displays comma for thousand separating on file size while listing?

(A) Dir/w

(B) Dir/s

(C) Dir/b

(D) Dir/c

20. Which command displays only file and directory names without size, date and time information?

(A) Dir/w

(B) Dir a:

(C) Dir/b

(D) Dir/s

21. Which command displays all the files having the same name but different extensions?

(A) Dir filename. *

(B) Dir filename.ext

(C) Dir * .sys

(D) Dir * .ext

22. Only filenames and extensions are to be displayed in wide format, which command you'll use?

(A) Dir/w

(B) Dir a:

(C) Dir/s

(D) Dir/b

23. Which command lists the contents of current directory of a disk?

(A) Copy

(B) Tree

(C) Cd

(D) Dir

24. Which of the following extensions suggest that file is a backup copy

(A) Bak

(B) Bas

(C) Com

(D) Txt

25. If you need to duplicate the entire disk, which command will you use?

(A) Copy

(B) Disk copy

(C) Chkdsk

(D) Format

26. Each time you turn on your computer, it will check on the control file

    (A) Command.com, io.sys

    (B) Command.com, date.com, dir.com

    (C) Command.com, io.sys, msdos.sys

    (D) Chkdsk.exe

27. Which command divides the surface of the blank disk into sectors and assign a unique address to each one

    (A) Ver

    (B) Format

    (C) Fat

    (D) Chkdsk

28. If you don't know the current time, which command will you use to display

    (A) Copy

    (B) Ver

    (C) Time

    (D) Format

29. While working with Ms-Dos which command transfers a specific file from one disk to another?

    (A) Copy

    (B) Disk copy

    (C) Time

    (D) Rename

30. In Ms-Dos what command you will use to display system date?

    (A) Date command

    (B) Ver command

    (C) Disk command

    (D) Format command

31. In MS-Dos 6.22, which part identifies the product uniquely?

    (A) MS

    (B) DOS

    (C) Ms-DOS

    (D) 6.22

32. ASCII stands for _____

    (A) American standard code for information interchange

    (B) American scientific code for information interchange

    (C) American scientific code for international interchange

    (D) American standard code of international interchange

33. Perform BCD addition: 2+3= _____
    (A) 0010
    (B) 0011
    (C) 0101
    (D) 1010

34. 1 zettabyte = _____
    (A) 1024 TB
    (B) 1024 EB
    (C) 1024 ZB
    (D) 1024 PB

35. What does BCD stand for?

   (A) Bitwise coded decimal

   (B) Binary coded decimal

   (C) Binary converted decimal

   (D) Bitwise converted decimal

36. The 2's complement of 5 is _____

   (A) 1011

   (B) 0101

   (C) 1010

   (D) 0011

37. A device that uses positional notation to represent a decimal number.

   (A) Abacus

   (B) Calculator

   (C) Pascaline

   (D) Computer

38. The LSB and MSB of 1243247 are ___ and ___

   (A) 1, 7

   (B) 4, 7

   (C) 7, 1

   (D) 4, 1

39. The base is the total number of digits in a number system.

   (A) True

   (B) False

   (C) Ambiguous statement

   (D) None of these

40. How is the number 5 represented in non-positional number system?

    (A) IIIII

    (B) 5

    (C) V

    (D) v

41. Which of the following is not a type of number system?

    (A) Positional

    (B) Non-Positional

    (C) Octal

    (D) Fractional

42. If the decimal number is a fraction then its binary equivalent is obtained by _____

    the number continuously by 2.

    (A) Dividing

    (B) Multiplying

    (C) Adding

    (D) Subtracting

43. The octal number 645 in power of 8 is equal

    (A) 450

    (B) 451

    (C) 421

    (D) 501

44. The two digits hexadecimal number which has largest value is ___ which corresponds to _____

(A) FE, 255 decimal

(B) FF, 254 decimal

(C) EF, 255 decimal

(D) EF, 245 decimal

45. The decimal equivalent of (LM17) is given by

(A) 491

(B) 499

(C) 497

(D) 498

46. $(170)_{10}$ is equivalent to
(A) $(FD)_{16}$
(B) $(DF)_{16}$
(C) $(AA)_{16}$
(D) $(AF)_{16}$

47. Convert in to decimal: $(214)_8 =?$
(A) $(140)_{10}$
(B) $(141)_{10}$
(C) $(142)_{10}$
(D) $(130)_{10}$

48. One hex digit is sometimes referred to as a(n):
(A) Byte
(B) Nibble
(C) Grouping
(D) Instruction

49. The digital systems usually operate on _____ system.

   (A) Binary

   (B) Decimal

   (C) Octal

   (D) Hexadecimal

50. The binary addition 1+1+1 gives

   (A) 111

   (B) 10

   (C) 110

   (D) 11

51. The cumulative addition of the four binary bits (1+1+1+1) gives
   (A) 1111
   (B) 111
   (C) 100
   (D) 1001

52. Which of the following is the correct representation of a binary number?
   (A) $(124)_2$
   (B) 1110
   (C) $(110)^2$
   (D) $(000)_2$

53. Which of the following is not a binary number?
   (A) 1111
   (B) 101
   (C) 11 E
   (D) 000

54. Convert the binary equivalent 10101 to its decimal equivalent.
   (A) 21
   (B) 12
   (C) 22
   (D) 31

55. A bit in a computer terminology means either 0 or 1.

   (A) True

   (B) False

   (C) Ambiguous statement

   (D) None of These

56. The input hexadecimal representation of 1110 is _____

   (A) 0111

   (B) E

   (C) 15

   (D) 14

57. The octal equivalent of 1100101.001010 is _____

   (A) 624.12

   (B) 145.12

   (C) 154.12

   (D) 145.21

58. A computer language that is written in binary codes only is _____
   (A) Machine language
   (B) C
   (C) C#
   (D) Pascal

59. The binary equivalent of the decimal number 10 is _____
   (A) 0010
   (B) 10
   (C) 1010
   (D) 010

60. The value of radix in binary number system is _____
   (A) 2
   (B) 8
   (C) 10
   (D) 1

61. Which of the following is not a positional number system?

    (A) Roman Number System

    (B) Octal Number System

    (C) Binary Number System

    (D) Hexadecimal Number System

62. The Arithmetic Logic Unit performs which arithmetical operation?
    (A) $(+, -, *, /)$
    (B) (True. False)
    (C) $(<, >, =, > =, < >)$
    (D) All of these

63. Full form of CPU

    (A) Central Processing Unit

    (B) Central Program Unit

    (C) Common Processing Unit

    (D) Central Personal Unit

64. Full form of ALU

    (A) Application Logic Unit

    (B) Array Logic Unit

    (C) Arithmetic Logic Unit

    (D) Auxilary Logic Unit

65. What is information?
    (A) Processed Data
    (B) Collection of a Program
    (C) Raw Data
    (D) Collection of Instructions

66. Data in computer terminology mean?

    (A) Figure

    (B) Raw facts

    (C) Both a & b

    (D) None of these

67. The memory implemented using the semiconductor chips is _____

    (A) Cache

    (B) Main

    (C) Secondary

    (D) Registers

68. Which of the following is the fastest means of memory access for CPU?

    (A) Registers
    (B) Cache
    (C) Main memory
    (D) Virtual memory

69. Cache memory is the onboard storage.

    (A) True
    (B) False
    (C) Ambiguous Statement
    (D) None of these

70. Any electronic holding place where data can be stored and retrieved later whenever required is _____

    (A) Memory
    (B) Drive
    (C) Disk
    (D) Circuit

71. Which of the following is a technique that marked the beginning of computer communications?

(A) User Environment

(B) Batch Environment

(C) Time Sharing

(D) Message passing

72. Which of the following is created when a user opens an account in the computer system?

(A) SFD

(B) MFD

(C) Subdirectory

(D) RFD

73. Which of the following package allows individuals to use personal computers for storing and retrieving their personal information?

(A) Personal assistance package

(B) Graphics package

(C) Spreadsheet package

(D) Animation package

74. What does CAD stands for?

(A) Calculation Aided Design

(B) Computer Aided Design

(C) Calculation Aided Draft

(D) Computer Aided Draft

75. Which of the following is known as the language made up of binary-coded instructions?

(A) High level

(B) BASIC

(C) C

(D) Machine

76. Which of the following can access the server?

(A) Web Client

(B) User

(C) Web Browser

(D) Web Server

77. Which of the following is the device used for converting maps, pictures and drawings into digital form for storage in computers?

(A) Image Scanner

(B) Digitizer

(C) MICR

(D) Scanner

78. Which of the following are the input devices that enable direct data entry into a computer system from source documents?

(A) System Access devices

(B) Data acquiring devices

(C) Data retrieving devices

(D) Date Scanning devices

79. Which of the following devices provides the communication between a computer and the outer world?

(A) Compact

(B) I/O

(C) Drivers

(D) Storage

80. Which of the following is known as the interval between the instant a computer makes a request for the transfer of data from a disk system to the primary storage and the instance the operation is completed?

(A) Disk utilization time

(B) Drive utilization time

(C) Disk access time

(D) Disk arrival time

81. Which of the following storage is a system where a robotic arm will connect or disconnect off-line mass storage media according to the computer operating system demands?

(A) Magnetic

(B) Secondary

(C) Virtual

(D) Tertiary

82. Which of the following defines the assigned ordering among the characters used by the computer?

(A) Accumulation

(B) Sorting

(C) Collating Sequence

(D) Unicode

83. Which of the following are physical devices of a computer?

(A) Hardware

(B) Software

(C) System Software

(D) Package

84. Which of the following is used in EBCDIC?

(A) Super Computers

(B) Mainframes

(C) Machine Codes

(D) Programming

85. Which of the following device use positional notation to represent a decimal number?

(A) Pascaline

(B) Abacus

(C) Computer

(D) Calculator

86. Which of the following is designed to control the operations of a computer?

(A) User

(B) Application Software

(C) System Software

(D) Utility Software

87. Which of the following part of a processor contains the hardware necessary to perform all the operations required by a computer?

   (A) Controller

   (B) Registers

   (C) Cache

   (D) Data path

88. Which of the following is not a type of computer code?

   (A) EDIC

   (B) ASCII

   (C) BCD

   (D) EBCDIC

89. Which of the following monitor looks like a television and normally used with non-portable computer systems?

   (A) LED

   (B) LCD

   (C) CRT

   (D) Flat Panel Monitors

90. Which of the following unit is responsible for converting the data received from the user into a computer understandable format?

   (A) Output Unit

   (B) Input Unit

   (C) Memory Unit

   (D) Arithmetic & Logic Unit

91. Which of the following is the smallest unit of data in a computer?

    (A) Bit

    (B) KB

    (C) Nibble

    (D) Byte

92. What is the word length of a personal computer?

    (A) 32 bits

    (B) 8 bits

    (C) 64 bits

    (D) 16 bits

93. Which of the following is not a characteristic of a computer?

    (A) Versatility

    (B) Accuracy

    (C) Diligence

    (D) I.Q.

94. Which of the following is the brain of the computer?

    (A) Central Processing Unit

    (B) Memory

    (C) Arithmetic and Logic Unit

    (D) Control Unit

95. Which of the following computer language is written in binary codes only?

    (A) Pascal

    (B) Machine language

    (C) C

    (D) C#

96. Which of the following language does computer understand?

(A) Computer Understands Only C Language

(B) Computer Understands Only Assembly Language

(C) Computer Understands Only Binary Language

(D) Computer Understands Only BASIC

97. What is the full form of CPU?

(A) Computer Processing Unit

(B) Computer Principle Unit

(C) Central Processing Unit

(D) Control Processing Unit

98. Which of the following is the correct definition of Computer?

(A) Computer is a machine or device that can be programmed to perform arithmetical or logic operation sequences automatically

(B) Computer understands only binary language which is written in the form of 0s & 1s

(C) Computer is a programmable electronic device that stores, retrieves, and processes the data

(D) All of the mentioned

99. Which of the following is the correct abbreviation of COMPUTER?

(A) Commonly Occupied Machines Used in Technical and Educational Research

(B) Commonly Operated Machines Used in Technical and Environmental Research

(C) Commonly Oriented Machines Used in Technical and Educational Research

(D) Commonly Operated Machines Used in Technical and Educational Research

100. Who is the father of Computers?

   (A) James Gosling

   (B) Charles Babbage

   (C) Dennis Ritchie

   (D) Bjarne Stroustrup

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Rough Work / रफ कार्य

Rough Work / रफ कार्य

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2. **This Question Booklet contains 100 questions, out of which only 75 Question are to be Answered by the examinee. Every question has 4 options and only one of them is correct. The answer which seems correct to you, darken that option number in your Answer Booklet (O.M.R ANSWER SHEET) completely with black or blue ball point pen. If any examinee will mark more than one answer of a particular question, then the first most option will be considered valid.**

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