Answer all the questions

Read the questions carefully. Select the most suitable answer.

1. Which of the following is true?
   (1) The first generation computers were based on transistors.
   (2) UNIVAC belongs to first generation of computers.
   (3) Ada Lovelace is the inventor of ENIAC.
   (4) Joseph Jacquard introduced the punch card system.

2. Which of the following is a component of a central processing unit?
   (1) Power supply unit   (3) RAM
   (2) ALU   (4) ROM

3. Which of the following is the **incorrect** statement with respect to computers?
   (1) Gottfried Leibnitz developed Pascaline.
   (2) Vacuum tubes are used in microprocessors.
   (3) ICs consume less power than the transistor circuits.
   (4) Analytical engine was based on punch card system

4. The binary equivalent of 163 is

   (1) 10100111   (3) 10110111
   (2) 10100011   (4) 01111011

5. The hexadecimal number A8 has the decimal value equivalent to
   (1) 127   (3) 283
   (2) 256   (4) 168

6. The minimum number of bits required to store the hexadecimal number 1A3 is

   (1) 12   (3) 5
   (2) 9   (4) 7

7. 124 and 457 can be represented by

   (1) $7C_{16}$ and $1C_8$ (3) 174_8 and $1C9_{16}$
   (2) 714_{16} and 711_8 (4) $111\ 1100_2$ and 147_8

8. Which of the following is not an optical media device?

   (1) CD   (3) Hard disk
   (2) Blue -ray   (4) DVD

9. Select the operation represented by the following truth table:

Input 1	Input 2	Output
0	0	0
0	1	1
1	0	1
1	1	1

(1) OR   (3) AND

(2) NOT   (4) XOR

10. Which of the following is incorrect if $A = 1$ and $B = \bar{A}$ in the given logic circuit?

(1) $C = 0$ (3) $A.B = 0$

(2) $B = 1$ (4) $B = 0$
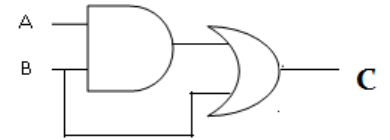
Questions from **11 and 12** are based on the following worksheet.

11. The cell O33 contains the formula =O31*O$32.What is the value displayed If we copied this formula in to cell O35?

(1) 32

(2) 63

(3) 9

(4) 16

12. The cell Q31 contains the formula =O31+P31 - 6 .When we copy that formula into Q32 it will be displayed as

(1) =P32-O32 - 6   (3) =O31+P31 - 6

(2) =O32+P32 – 6   (4) =O33 –P33 - 6

13. Browsing internet to get information belongs to

(1) Half-Simplex mode   (3) Full-Duplex mode

(2) Simplex mode   (4) Half-Duplex mode

14. What is incorrect about the IP address of a device?

(1) It is usually represented in dotted decimal notation.

(2) An IP address has 32-bytes.

(3) It is a unique identifier for a computer or device on a network.

(4) It consists of four bytes.

15. The correct Boolean expression for the X in the following circuit is

(1) $(\overline{A + B}).\bar{B}$

(2) $(\bar{A}.\bar{B}) + \bar{B}$

(3) $(\overline{A.B}).\bar{B}$

(4) $(\bar{A} + \bar{B}).\bar{B}$
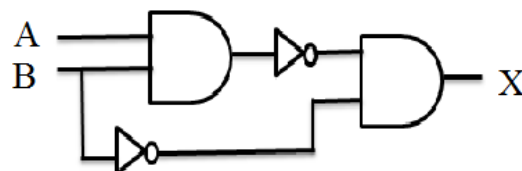
16. Which of the following function keys activate the spell checker, slide show and Help respectively?
    (1) F9 ,F12 and F1   (3)F7,F8 and F9
    (2) F7 ,F5 and F1   (4)F5 , F1and Shift + F7

17. ……………………is not an open source web editor.
    (1) Kompozer   (3) ckeditor
    (2) Frontpage   (4) Bluegriffon

18. Internet uses
    (1) Packet switching   (3) Circuit switching
    (2) Telephone switching   (4) Telex switching

19. Which of the following is not a service of the Internet
    (3) WWW   (3) E-mail
    (4) Remote access   (4) HTML

Questions **20 to 22** are based on the given address typed into the address bar of a web browser.
https://www.bargainbooks-r-us.co.uk/index.htm

20. The domain name of the given address is ……………………………………
    (1) https   (3) bargainbooks-r-us.co.uk
    (2) www.bargainbooks   (4)us.co.uk/index.htm

21. What is incorrect about index.htm?
    (1) It is the requested web page
    (2) It is the requested name of the file
    (3) It is the URL
    (4) It is the home page of the web site

22. Which of the following is incorrect about the given address?
    (1) This is an encrypted web site.
    (2) This site should not be used to send data.
    (3) It uses the secure version of HTTP.
    (4) https and http are protocols.

23. Which of the following statements are true?

    A. A step by step description of solving a program is known as an algorithm

    B. Algorithms can be represented only by using flow charts.

    C. A pseudocode is a textual representation of an algorithm.

    (1) A and B only   (3) A and C only

    (2) B and C only   (4) All are correct

24. Which of the following statements are **true**?
    (1) Machine languages execute programs slower than high level programming languages
    (2) First generation programming languages are machine dependent.
    (3) Machine dependency is a feature of high level programming languages
    (4) Assembly language does not need a translator.

25. Which of the following statements are correct?
    A. HTML is a computer language.
    B. In order to write HTML we need an internet connection.
    C. To make a list of items from A to E, <OL> tag should be used.
    (1) A only   (3) C only
    (2) B only   (4) All of the above

26. What is incorrect about identifiers in Pascal language?
    (1) Reserved words cannot be used as identifiers.
    (2) They should start with an English letter.
    (3) They are case sensitive.
    (4) Space is not allowed in identifiers.

27. …………………. is not a data type in Pascal language.
    (1) char   (3) real
    (2) Int   (4) boolean

28. When 7 + 25/5 * 7 MOD 3 is evaluated according to operator precedence the answer is
    (1) 1   (3) 21
    (2) 7   (4) 4

29. What is the first output of the following code segment?
    (1) y is 0
    (2) y is -1
    (3) y is 1
    (4) y is 3

```
x = 0
y=2
while x = < 4
   x = x + 1
   y = x-2
   print ("y is", x)
```

30. Which of the following gives a correct matching of the contents of Column A with those of Column B when we consider school as a system?
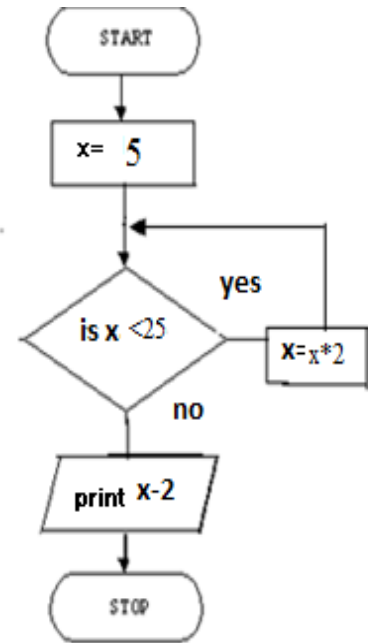
                    A   B

p	input
q	output
r	process

i	Good citizens.
ii	children
iii	All activities done in school

    (1) (p-i),(q-ii),(r-iii)   (3)(p-iii),(q-i),(r-ii)
    (2) (p-ii),(q-i),(r-iii)   (4) (q-iii),(r-ii),(p-i)

Consider the given flow chart to answer the questions **31 to 33**.

31. Which of the following represents process, decision and output respectively?

(1) X=5,X=X*2, Is X>25
(2) X=X*2, Is X<25, print X-2
(3) Is X>25, X=X*2, print X-2
(4) X=X*2, X=5, print X-2

32. What is the output of the flow chart?

(1) 20   (3)38
(2) 40   (4)10

33. The most suitable structure to implement the above flow chart is to use a

(1) While loop   (3) case
(2) For loop   (4)until loop

Questions **34 to 36** are based on the Book table.

Book table

ISBN	Title	Numpages	Price
2342	DigitalDesign	245	200
2540	E commerce	110	400
2367	Web design	455	500
1345	E commerce	782	150
2343	Networking	643	275

34. Most suitable data types for the fields ISBN, Numpages and Title are

(1) Text, Text, Text   (3) Number, Text, Text
(2) Number ,Text, Number   (4)Text, Number, Text

35. The primary key of Book table is

(1) Title   (3) ISBN
(2) Price   (4)Numpages

36. Number of fields in the Book table is …………..

(1) 6   (3) 4
(2) 3   (4) 5

37. Which one of the following statement is correct?

(1) Ctrl + M can be used to create a new presentation.
(2) Hyperlinks cannot be inserted in slides.
(3) Ctrl + Z will undo the last action we perform
(4) Ctrl + Home brings you to the next slide in your presentation

38. Which one of the following statement is incorrect regarding health hazards related to ICT?

    (1) The computer keyboard should be lower than the elbow and top of monitor at eye level.
    (2) Any repetitive movement can result in a health problem called CVS.
    (3) Looking away from the monitor at regular intervals will prevent eye strain
    (4) Should use wrist-rests to support the wrists while typing to prevent RSI.

39. Which one of the following statement is **correct** about the Most Significant Bit of a number?

    (1) MSB is the value in the right extreme in a whole number.
    (2) It is the value which is not zero, in the left extreme in a whole number.
    (3) MSB is the value in the left extreme in a decimal number.
    (4) MSB is the value which is zero, in the left extreme in a whole number.

40. Which of the following statement is **incorrect** about harmful software and resultant damages?

    (1) Spam is unauthorized e mail.
    (2) Adware misdirects users to different web sites.
    (3) Bots are used to collect personal information.
    (4) Trojan horse does not spread by itself.