

Student: Drashya v naik

Score: 21/24 (87.50%)

Code: 4844

1. How many inputs are available in the 7447 BCD-to-seven segment decoder used to drive the LED display?

- A) One
B) **Four (Correct)**
C) Seven
D) Eight

2. What is the power supply required to operate the most standard TTL ICs properly?

- A) + 1.5v to +2.5V
B) - 1.5v to - 2.5V
C) **+ 4.75v to + 5.25V (Correct)**
D) + 7.5v to + 12V

3. What is the propagation delay of the standard TTL chip?

- A) 5 ns
B) 8 ns
C) **10 ns (Correct)**
D) 12 ns

4. What is the power dissipation of the standard TTL chip?

- A) 5 mW/gate
B) **10 mW/gate (Correct)**
C) 15 mW/gate
D) 20 mW/gate

5. What is the decimal conversion number for the octal number (2374)₈?

- A) (1266)₁₀
B) **(1276)₁₀ (Correct)**
C) (1286)₁₀
D) (1296)₁₀

6. What is the digital signal value for the analog signal value 6V?

- A) 100
B) 101
C) **110 (Correct)**
D) 111

7. What is the decimal number for the binary number 0101?

- A) 4
B) **5 (Correct)**
C) 6
D) 7

8. Which IC is used for (DEMUX) function in data transmission?

- A) IC 7483
B) IC 7486
C) **74 LS 138 (Correct)**
D) 74 LS 151

9. Which circuits requires the flip - flops for their operation?

- A) Amplifier circuits
B) Oscillator circuits
C) Modulator circuits
D) **Memory circuits (Correct)**

10. What is the use of flip - flop?

A) It stores energy

C) It stores current

B) It stores voltage

D) It stores binary information (Correct)

11. What is the maximum possible number of flip-flops in a decade counter?

- A) 10^n
B) **2^n (Correct)**
C) 2^{n+1}
D) 3^n

12. What is the purpose of using IC74LS190?

- A) Attenuator
B) Comparator
C) **Up/down counter (Correct)**
D) Modulator

13. Which IC is used for the function of 4 bit shift register?

- A) IC 7404
B) IC 7447
C) IC 7493
D) **IC 7495 (Correct)**

14. What is the information stored in digital registers?

- A) Analog values
B) **Binary values (Correct)**
C) Decimal values
D) Alphanumeric values

15. How many transistors are built inside the Very Large Scale Integration (VLSI) IC package?

- A) **1000 and above (Correct)**
B) 1 to 10 transistors
C) 10 to 100 transistors
D) 100 to 1000 transistors

16. Which IC package consist of 100 to 1000 transistors?

- A) **Large scale integration (LSI) (Correct)**
B) Small scale integration (SSI)
C) Medium scale integration (MSI)
D) Very large scale integration (VLSI)

17. Which is the 3 terminal, negative voltage regulator IC?

- A) LM 320
B) LM 340
C) **IC 7905 (Correct)**
D) IC 7812

18. Which three terminal voltage regulator IC has adjustable output?

- A) LM 100
B) LM 105
C) LM 305
D) **LM 317 (Correct)**

19. How much is the maximum load current of the negative voltage regulator IC 7912?

- A) 1.0 A
B) 1.5 A (Incorrect)
C) 2.0 A
D) 0.55 A

20. What is the current rating of voltage regulator IC LM338K?

- A) 2A
B) 3A
C) 4A
D) 5A (Correct)

21. Which method is followed to troubleshoot the problem causing section by the symptom?

- A) Step by step method (Incorrect)
B) Sensory test method
C) Trial and error method
D) Logical approach method

22. What is the current rating of voltage regulator IC LM317L?

- A) 0.1 A (Correct)
B) 0.2 A
C) 0.3 A
D) 0.4 A

23. What is the range of output voltage of regulator IC LM 317?

- A) 0 to 25 V
B) 0 to 30 V
C) 0 to 32 V
D) 1.2 V to 32 V (Correct)

24. Which type of voltage regulator is IC 723?

- A) Multipin variable voltage regulator (Incorrect)
B) Three pin positive voltage regulator
C) Three pin negative voltage regulator
D) Three pin adjustable voltage regulator