June : 2026

COMPUTER SCIENCE

Paper: GEC-CSC-201

BASICS OF HARDWARE MAINTENANCE

Time: 2 Hours **Total Mark: 45**

(The figures in the right margin indicate full marks of the questions)

1. Choose the correct answer from the following: 1×5=5

   i. Which directs all computer operations?

   a. ALU b. Control Unit

   c. Registers d. None of these

   ii. What is the unit of Current?

   a. Ampere (A) b. Coulomb (C)

   c. Unidirectional d. None of these

   iii. The smallest unit of data is?

   a. Nibble b. Byte

   c. KB d. Bit

   iv. Which memory is Temporary and Volatile?

   a. Secondary b. RAM

   c. ROM d. Cache memory

   v. In which type of current the flow of electric charge is unidirectional?

   a. Direct current b. Alternating current

   c. Both a and b d. None of these

2. Answer the following questions *(any three)*: 3×4=12

i. Differentiate between CPU sockets and ports? Give examples.

ii. Compare and contrast between SRAM and DRAM based on four parameters.

iii. Define hard disk drive jumper-setting? Explain its primary purposes.

iv. What is the difference between Internal and External hardware components? Give two examples of each.

v. List four common causes of keyboard lag in wireless keyboard.

3. Answer the lfollowing questions *(any four)*: 4×7=28

i. Briefly explain the different sections of motherboard with their purposes.

ii. Define electric current. What is conventional current and electron flow? Also differentiate between direct current and alternating current as per their features.

iii. What is SMPS? Explain different pin voltage and how to test in multimeter.

iv. Explain the working principal of an optical mouse with a block diagram.

v. Briefly explain the working of a computer system with a suitable block diagram and also mention the role of each component.

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