SYNERGY INSTITUTE OF ENGINEERING AND TECHNOLOGY, DHENKANAL
Near NH-55, Banamaliprasad – 759001
DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING
NBA ACCREDITED
Assignment-II
Full Marks-40   Duration- Within 1 Week from Notification
Name-   Registration No-

Subject with Code: Computer Organization and Architecture (CSPC2005)

Year & Semester: 2nd & IV

Course & Branch: B. Tech. & CSE
Academic Session: 2024-2025

Course Outcome	Total Marks	Marks Secured	Signature of Evaluator
CO2	40		
Level	Total Marks	Marks Secured	
L1-L3			
L4-L6			

Section-A
Answer All Questions

1. What is locality of reference?   **[2 marks] [CO2] [L2]**

2. What is µPC?   **[2 marks] [CO2] [L2]**

3. What is the use of **WMFC** control signal?   **[2 marks] [CO2] [L2]**

4. What is the difference between memory access and memory cycle time?   **[2 marks] [CO2] [L2]**

Section-B
Answer All Questions

1. Explain the conversion of **virtual address** to **physical address**.   **[6 marks] [CO2] [L2]**

2. Explain the main memory address format in **direct**, **associative** & **set associative** mapping. **[6 marks] [CO2] [L2]**

Section-C
Answer All Questions

1. Differentiate between write through and write back policies with example.   **[10 marks] [CO2] [L2]**

2. ADD (R3), R1
   Describe the machine instructions of the above instruction using one bus organization with diagram
                                                                               [10 marks] [CO2] [L2]

Additional Questions

1. What is cache memory?

2. What is control store?

3. Explain the two approaches for generating control signals.