**Syllabus for Class Test 1**

**DAA Sem V Div E**

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| **Unit** | **Description** | **CO#** |
| **1** | **Introduction:**  What is Algorithms, types of Algorithms: greedy, divide & conquer, Analysis of Algorithms complexity. | **CO1** |
| **2** | **Analyzing the Algorithms:**  Time and Space Complexity of Algorithms, Asymptotic notations, Asymptotic order, Properties of big oh, big omega, and big theta, Classifying functions by their asymptotic growth rates, Best case, average Case and worst case analysis. | **CO1** |
| **3** | **Divide and Conquer Technique:**  The general method, control abstraction for divide and conquer, Merge sort, Quick sort, Strassen’s matrix multiplication, Time-Space complexity analysis. | **CO2** |
| **4** | **Greedy Technique:**  The general method, control abstraction, Case study on: Minimum spanning trees: Prim’s and Kruskal’s algorithm, Time-Space complexity analysis. | **CO2** |