

**Assignment - 2024**  
**BCA Sem IV**  
**Data Structure**  
**BCA-403**

**Time : 1.00 Hrs**

**Max Marks 15**  
**Min Marks 6**

**Unit - I**

- A. What is Data Structure? 0.5 Marks  
B. What is Algorithm? 0.5 Marks  
C. Discuss various operations of data structure? 2.5 Marks

**OR**

Explain use of new and delete keywords.

- D. Explain various types of data structure in brief. 4 Marks

**OR**

Explain time-space complexity of an algorithm in detail?

**Unit - II**

- A. What is pointer? 0.5 Marks  
B. What is a record? 0.5 Marks  
C. Differentiate between static and dynamic array? 2.5 Marks

**OR**

Explain pointer to array in brief?

- D. Write algorithm to insert an element in one dimensional array. 4 Marks

**OR**

What do you mean by Multi-dimensional array? Explain with example.