Vidush Somany Institute of Technology & Research, Kadi

CE / CSE / IT (3rd Semester)

Subject – Data Structures and Algorithms (CT303-N)

Assignment-1

1) What is data organization, and why is it important in computer science?
2) Explain the concept of arrays. How are arrays used in data organization?
3) What are the common operations performed on data structures?
4) Define and explain primitive and non-primitive data types.
5) Explain significance of data structure.
6) Define data structure. Explain linear and non-linear data structure with example.
7) Define time complexity? Explain worst case and best-case complexity with examples.
8) Explain the concept of user-defined data types with an example in a programming language.
9) What is a linked list, and how does it differ from an array?
10) What is a stack, and how does it differ from an array?