

LESSON PLAN

SUB: DATA STRUCTURE

BRANCH:- COMPUTER SCIENCE& ENGG.

SEMESTER:3RD

NAME OF FACULTY: ABHISHEK PADHI (GF in CSE)



GOVERNMENT POLYTECHNIC, BHADRAK

SESSION: 2025-26

Hod, CSE

Academic Co-ordinator

Academic Co-ordinator

Principal

Govt. Polytechnic, Bhadrak

DEPARTMENT OF Computer Science & Engg.,

Discipline: Computer Science and Engineering	Semester: 3 rd , Winter/2025	Name of the Faculty: Mr. ABHISHEK PADHI, Lecturer EmailID: abhishekpadi24@gmail.com
Subject: Data Structure, Theory-3	No .of Days/week: 04	StartDate: 14/07/2025 End Date: 15/11/2025

Week	Class Day	Theory Topics
1st	1st	Introduction to data structure
	2nd	Basic Terminology
	3rd	Classification on data structure
2nd	1st	Explain different operations on data structure
	2nd	Explain Asymptotic analysis of algorithm
	3rd	Explain worst-case analysis of algorithm
3rd	1st	Stack-introduction to stack
	2nd	Array representation of Stacks
	3rd	Operation & application of stacks
4th	1st	Infix-to-Postfix Transformation
	2nd	Queues, Array representation of Queues
	3rd	Operation & types of Queue, Application of queue-round robin algorithm.
5 th	1st	Queues, Array representation of Queues

	2nd	Operation & types of Queue. Application of queue-round robin algorithm.
	3rd	Linked list & Operation on a linked list
6th	1st	Circular linked list
	2nd	Doubly linked lists
	3rd	Operation on a single link list
7th	1st	Circular linked list
	2nd	Doubly linked lists
	3rd	Operation on a single link list
8th	1st	Linked list & Operation on a linked list
	2nd	Circular linked list
	3rd	Doubly linked lists
9th	1st	Linked list & Operation on a linked list
	2nd	Non-linear data structure
	3rd	Tree-Basic Terminologies
10th	1st	Concept of Binary trees
	2nd	Representation of Binary trees using Arrays
	3rd	Concept of Graphs
11th	1st	representation of Graphs-Set
	2nd	representation of Graphics Linked
	3rd	representation of Graphs-Matrix
12th	1st	Tree-Basic Terminologies
	2nd	Concept of Binary trees
	3rd	Representation of Binary trees using Arrays
13th	1st	Revision
	2nd	Assessment
	3rd	Quiz Test
14th	1st	Previous year Questions
	2nd	Previous year Question
	3rd	Previous year Question
15th	1st	Revision
	2nd	Revision
	3rd	Quiz Test

Abhishek Padhy
Signature of faculty