Sukkur IBA University
Kandhkot Campus
Lab Task - V
Fall 2022

Course: Data Structures   **Class**: BS (CS) – III
Date: October 04 , 2022   **Time**: 2 hour
Instructor: Syed Muzamil Hussain Shah

General Instructions:

In this lab you are going to do empirical analysis of algorithms.

Question 01 Empirical Analysis Code

For this task you must have Singly, Doubly Linked list, Stack, and Queue code:

1. Do the empirical time and space complexity of analysis of all algorithms which you have implemented in Singly, Doubly Linked list, Stack, and Queue (I.e add first, enqueue, etc).

2. create a separate table for each data structure and note the time taken by its algorithms. Following table is the example template.

No.	Name	Time Complexity (milliseconds)	Space complexity (Kilo Bytes)	Hardware Info (Processor, GPU, etc)
Singly Linked List				
1.	addFirst			