

Web Engineering Lab

Lab 04**Marks 100**

Instructions

Work on this quiz/lab individually.

You are **NOT** allowed to use internet, mobile phone.

You are **NOT** allowed to borrow anything from your peer student.

What you have to do

Program the following tasks. The name of your files will be according to the task given in this lab.

Lab timing: 09:20AM – 11:00AM

Task 1**[100]**

Write a code for class **Health** with data-members `name`, `weight`, `height` and BMI [Formula: $\text{weight (kg)} / [\text{height (m)}^2]$] of a person. You need to make an **Array of N** people where **N** will be an input from the user. Your program must throw a **NegativeArraySizeException** if the user enters negative value of **N**.

Create a class `Driver` with following functionalities:

- `Save()` : This method should input the person's attributes and an index of array to save the data on respective index/location. It must throw back an **indexOccupiedException**, if the index is already occupied.

You must have to provide the exception handling code in your program.

- `Retrieve()` : This method should input the index number from user and print the respective values from the object in array. This method must throw back an **indexException** to its caller method, if the index is not valid.
- `main()` : Provide a switch-based menu to execute this program in the following way:
 1. Add value in the array
 2. Retrieve and print the information of specific user at index `n`.
 3. Exit

😊😊😊 **BEST OF LUCK** 😊😊😊
