

# Artificial Intelligence

## Fall 2020

### Lab-Assignment

**The objective of this lab is to:** Hill Climbing Algorithm

**Course & Lab Instructor:** *Dr. Mian Mubashir*

#### **Instructions**

*Don't share your code with anyone until evaluation.*

*Plagiarism will result in penalties.*

*Your code must run without errors.*

*Your code must produce a generalized solution which can solve problem of any size.*

*The evaluation will be based on viva. Failure to explain your own code will result in penalties.*

*You are required to submit a single zip file BCSF20M001.zip. Failed to follow naming format will result in no grade.*

#### **Problem Statement**

A software artifact is required which can solve the 8 queen problem using Hill Climbing Algorithm with 100 sideways moves. The initial state must be generated randomly. The program must print results on standard output. The output must contain all states explored by the solution; each line in the output must be a single state.