EX.NO: 1 DATE:

Reg no:220701007

8- QUEENS PROBLEM

AIM :

To implement an 8-Queesns problem using Python.

You are given an 8x8 board; find a way to place 8 queens such that no queen can attack any other queen on the chessboard. A queen can only be attacked if it lies on the same row, same column ,or the same diagonal as any other queen. Print all the possible configurations. To solve this problem, we will make use of the Backtracking algorithm. The backtracking algorithm, in general checks all possible configurations and test whether the required result is obtained or not. For the given problem, we will explore all possible positions the queens can berelatively placed at. The solution will be correct when the number of placed queens = 8.

A board game with a chess board

Description automatically generated

CODE:

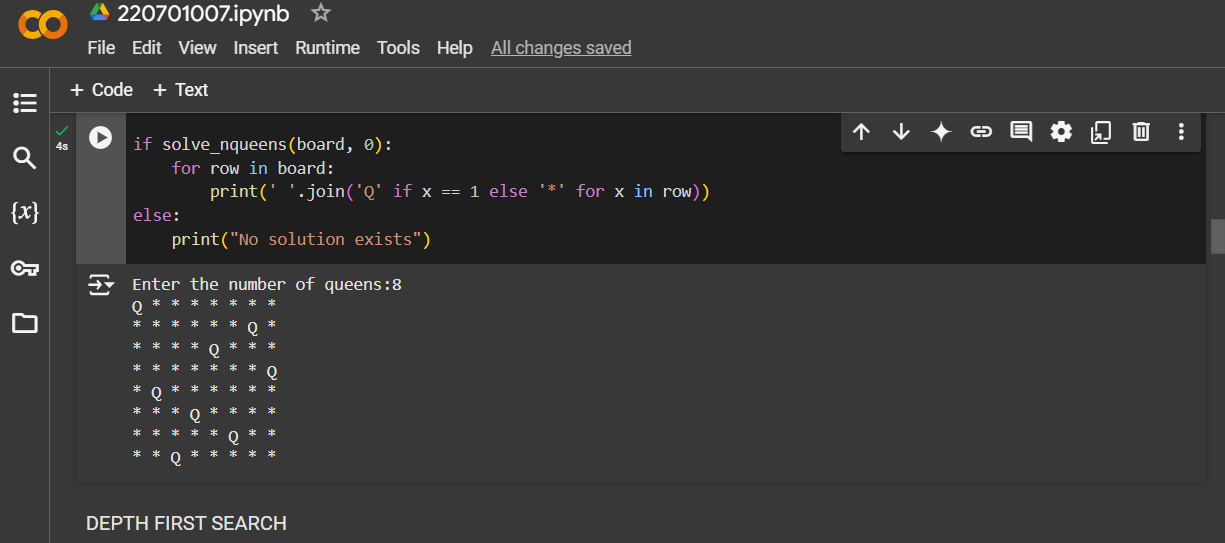
A screenshot of a computer program

Description automatically generated

A computer code with text

Description automatically generated with medium confidence

OUTPUT:



RESULT:

Thus the 8-Queesns problem using Python has been implemented successfully