

Ain Shams University Faculty of Engineering Computer Engineering and Software Systems

CSE 332: Design and Analysis of Algorithms – Spring 2022

Lab 4

- 1- There are n coins in a line, heads and tails in random order. On each move, one can turn over any number of coins laying in succession. Design an algorithm to turn all the coins heads up in the minimum number of moves. How many moves are required in the worst case?
- 2- Parliament Pacification In a parliament, Each member has at most three enemies. (We assume that enmity is always mutual.) True or false: one can always divide the parliament into two chambers in such a way that no parliamentarian has more than one enemy in his or her chamber?