## Homework Assignment 4 Optimal Control- MAE 274 Prof. Solmaz S. Kia

## Turn in your HW electronically to the respective folder in Canvas.

Assignment 1. Do the following problems from reference [1] (Kirk, see the class syllabus for the list of references) Turn in: 3.4, 4.8 Optional: 3.3

Assignment 2. Using dynamic programing, find the minimum-time path and time from node 12 to node 1, moving only to the right. The time to travel between points is shown on each segment. Compare the DP result (path and cost) with the ``forward greedy" path (i.e., the one where you just decide the best path of the options available as you move from starting node to final node, assuming that you also only move to the right to avoid repeated nodes.

