

# Homework 2

## EGR 445/545

Do the following problems from the textbook:

- 3.3
  - for problems 3.3 and 3.4, find the HT matrices,  ${}^i{}_{i-1}\mathbf{T}$  for each link “by hand” based on eqn. 3.6
  - you do not need to multiply out the matrices to find  ${}^B_W\mathbf{T}$
  - you can use Dr. Krauss’ `robotics_sympy` Python module to check your answers
    - \* see `robotics_sympy.DH`
- 3.4
- 3.9
  - yes, you have to do symbolic matrix multiplication “by hand”, but it is a simple problem
- 3.16

Note that these problems are the same in the third and fourth editions of the book, as well as the official ebook on Blackboard

- also note that this might not be the case if you have acquired a low cost international edition of the book