

Homework #8

due Tuesday, October 22

Exercises from Strang:

Problem Set 4.3 #1, 5, 9¹, 19, 25

Problem Set 4.4 #4, 10, 15, 20, 23, 24

Additional practice problems (ungraded):

Problem Set 4.3 #7, 12, 17, 18, 21

Problem Set 4.4 #6, 11, 32, 33

Note: All computations for the exercises from Strang should be exact. That is, where you have square roots, they should stay as square roots, not decimals. Feel free to use Sage, but be sure to explain all your work.

¹The points referred to are $(0, 0)$, $(1, 8)$, $(3, 8)$, and $(4, 20)$. Use Sage Cell to find the solution. Ignore the last part of the question. Instead, plot the points and the parabola, as well as the errors.