

No calculators

In Math 34A this quarter we'll be using the "Fixed Length" format for gradescope. This means that gradescope will expect the pages you submit to match the assignment pdf's pages. We have made the pdfs fillable, so that you can simply type your work and answers on the pdf and upload that. If you have a tablet such as an iPad, you can alternatively use your favorite app to write on the pdf with your stylus.

1. $2 + 2 =$

Sometimes a problem may have a lot of text to state the question, and there's nothing for you to write on that page. In this case you will find space for scratch work on the following page. You will need to show your work on exams. You do not need to do the following question today, it is presented here as an example.

2. Today we're making hot sauce. A Google search revealed a recipe that calls for:

- 18 jalapeños.
- 1 cup of water.
- 2 cups of vinegar.

as well as some aromatics. Spiciness of a pepper is measured in Scoville units, and jalapeños have 5000 Scoville units each. We only have 4 jalapeños on hand, but we have plenty of the following peppers:

- Anaheim peppers (1000 Scoville units).
 - Serrano peppers (15,000 Scoville units).
 - Cayenne peppers (50,000 Scoville units).
 - Thai peppers (70,000 Scoville units).
 - Habanero peppers (150,000 Scoville units).
 - Ghost peppers (1,000,000 Scoville units)
 - Carolina reapers (2,000,000 Scoville units)
- i) What is the hottest pepper we could include without our hot sauce becoming spicier than the original recipe?
- ii) You decide to use all four of your jalapeños, and use serrano peppers to complete the recipe. How many serranos should you use if you want to make a hot sauce that is exactly as spicy as the original recipe?
- iii) You're really curious about the flavor of the Carolina reaper, but you want to dilute the spiciness with water/vinegar. How many cups of water do you need to add to a Carolina reaper to make hot sauce that is as spicy as the original recipe?

2. Scratch work:

Answers: (You can just write “42” in all boxes)

(i)

(ii)

(iii)

3. Now it’s time to export your pdf and upload to gradescope. Here is how to do this with fillable pdf:

1) Download the exam. It is a **fillable pdf** and the boxes can be filled in.

2) Choose when you want to do the exam following the instructions at the top of the exam.

3) Write out the answers to the exam on paper.

4) Copy your work from paper and fill in the boxes on the pdf .

To do this:

On a mac use the program **Preview**

on a pc use <https://www.pdfescape.com/windows/>

or other software such as **chrome** browser

To type x raised to the power of -3 type $x^{(-3)}$

5) Convert the exam to **regular pdf** so that you can no longer fill anything in.

Ways to do this:

i) **save the exam as pdf.**

ii) print but divert the printing using "save as pdf".

Test you have succeeded by opening it and making sure you can no longer fill boxes in the midterm.

Also check the boxes are filled in !

6) **upload the pdf to Gradescope.**

using instructions for uploading a pdf to Gradescope in this folder.

[use your email address for this](#)

You must not print or scan it.

You must access gradescope using the link on Gauchospace

For those of you with a tablet, make sure you know how to export a PDF from your favorite note-taking app. Sometimes students take a screenshot of their iPad and submit that, but it's a really clunky way to do things. Here are some resources:

- [Exporting documents or pages in GoodNotes 5](#)
- [Exporting Notes in Notability](#)

In either case, the process mostly amounts to “look for the Share 📄 button”.

That's it! This is going to be a great quarter. Now test what you've learned by uploading this quiz to gradescope.