

## Problem Set 0

Welcome to CS103! This assignment is designed to help you get your development environment set up so that you can compile, run, and debug C++ programs. There isn't any actual programming or involved. It's mostly a way for us to ensure everyone has a working development environment before the first major problem set goes out on Friday and that everyone knows how to submit on GradeScope. It also teaches you the basics of LaTeX, which is a typesetting tool used to make mathematical documents (such as your problem set submissions!)

**This assignment must be completed individually. Working in pairs is not permitted.  
Due Thursday, June 25<sup>th</sup> at 11:59PM. No late submissions accepted.**

### ***Step One: Sign up for GradeScope***

All assignment submissions in this course will be done through GradeScope. Check out the “**Problem Set Policies**” handout for details about how to submit work online. ***Please register on GradeScope using your Stanford email address.***

### ***Step Two: Read About the Honor Code***

You are required to read the handout on the Stanford Honor Code on the CS103 website before submitting assignments in this class. Take a minute to read over it before proceeding to the next steps.

### ***Step Three: Download and Install Qt Creator***

Your first task is to download and install Qt Creator, the development environment that we'll be using in CS103 this quarter. To do so, visit the website (<http://web.stanford.edu/class/archive/cs/cs103/cs103.1208/> or <http://cs103.stanford.edu>: make sure it says Summer 2020 and not Spring 2020) and click the “Qt Creator” link under the “Resources” section and follow the instructions there. If you run into trouble installing Qt Creator, don't panic! There's a large troubleshooting guide available through the Qt Creator link, and if that fails, feel free to ask for help on Campuswire or in office hours.

The instructions for installing Qt Creator are the same here as they are for CS106B/X. If you've taken CS106B/X within the past year, you should be able to use the install you already have set up. If you've taken CS106B/X longer ago than that, you should follow the instructions to get the newest version.

### ***Step Four: Download the Starter Files***

Now that you've got Qt Creator set up and ready to go, you can start compiling and running C++ programs! To help you get some practice importing and building projects, go to the CS103 website and download the starter files for Problem Set 0 and open them in Qt Creator.

### ***Step Five: Answer Some Questions***

The program that you've just downloaded contains a quiz on the Stanford Honor Code as it applies in CS103. Answer all the quiz questions, enter your @stanford.edu email address, and you'll get a code that you'll submit on GradeScope. Once you've gotten your code, copy and paste it into res/code.txt in the "Other Files" folder.

### ***Step Six: Modify the LaTeX Template***

As part of this course, we require you to submit your problem sets written in LaTeX. LaTeX is kind of like a programming language: you type in "code" and it generates some output. In this case, the output is a formatted document that nicely handles things like equations and math symbols (ever tried to put an integral symbol in a normal text editor? Not fun.) Linked in the resources tab and also on the Problem Set 0 assignment page is our **Guide to LaTeX**. It will tell you how to get started. And just as we need a compiler for code that we write, we also need some kind of compiler for LaTeX. In this class we will use the website Overleaf.com. Instructions for setting this up are available in the **Guide to LaTeX**.

Once you have setup your Overleaf account, open the LaTeX template from the Problem Set 0 assignment page. This should give you a webpage that is a LaTeX file. Copy it (command-a or control-a lets you select all the text easily), open a new document on Overleaf, and replace their default document text with your copied template. Follow the instructions in the template. Then, use the Overleaf compile button to create a PDF of your work. Check it to make sure it matches what the template requested. Once this is done, recompile and download the PDF.

### ***Step Six: Submit Everything!***

Submit the code.txt file from QT Creator on GradeScope under "Problem Set 0 Coding". Submit the LaTeX generated PDF on GradeScope under "Problem Set 0 PDF". About half of our problem sets have small coding portions that you will submit like this, while also submitting the rest of your assignment on a separate GradeScope assignment.

That's it. You're done!