

# hw5.sagews

April 25, 2014

## Contents

<b>1 Homework 5 - Math 480b - Spring 2014</b>	<b>1</b>
1.1 Problem 1 The command line	1
1.2 Problem 2 in Python	2
1.3 Problem 3 Git	2
1.4 Problem 4 Your Project	2

## 1 Homework 5 - Math 480b - Spring 2014

Due Friday, May 2, 2014 by 6pm

This homework will be automatically collected from the folder homework4 in your project, sometime after 6pm on Friday, May 2, 2014.

For help email Simon Spicer (mlungu@uw.edu) and/or William Stein (wstein@uw.edu) and/or the mailing list sagemath2014@googlegroups.com.

```
%md
```

```
## Problem 1 -- The command line
```

For each of the tasks listed below, write a line that when run **in** the terminal accomplishes the listed task. Assume that the current working directory contains a file called 'hw5.sagews' (namely this homework assignment). Put your code **in** the worksheet cells below this problem (you could even run it by putting **!** before each line).

- Make a copy of the file 'hw5.sagews' called 'a\_copy'.
- Rename 'a\_copy' so it **is** now called 'b\_copy'.
- Make a directory called 'my\_dir'.
- Copy the file 'b\_copy' to a file called 'foo' inside of 'my\_dir'.
- Change the current working directory to 'my\_dir' **and** list the files **in** that directory.
- Rename the directory 'my\_dir' so that it **is** called 'my\_dir2'.
- Copy the directory 'my\_dir2' to obtain another directory 'my\_dir3'.

### 1.1 Problem 1 The command line

For each of the tasks listed below, write a line that when run in the terminal accomplishes the listed task. Assume that the current working directory contains a file called hw5.sagews (namely this homework

assignment). Put your code in the worksheet cells below this problem (you could even run it by putting ! before each line).

- Make a copy of the file hw5.sagews called a\_copy.
- Rename a\_copy so it is now called b\_copy.
- Make a directory called my\_dir.
- Copy the file b\_copy to a file called foo inside of my\_dir.
- Rename the directory my\_dir so that it is called my\_dir2.
- Copy the directory my\_dir2 to obtain another directory my\_dir3.

## 1.2 Problem 2 in Python

Write Python code (e.g., using the shutil, etc. module, but not just using os.system or popen or Subprocess!) to accomplish each of the above tasks from Problem 1. Put the code in worksheet cells below.

## 1.3 Problem 3 Git

- Find a tutorial about git somewhere on the web, put the URL below, and work through it. What did you think of it? What did you learn?
- Create an account on Github.com, and create a (basically empty) project there for your final class project. Put the URL to your project below as your answer to this problem.

## 1.4 Problem 4 Your Project

- List the format of your planned deliverables for your project. For example, a 5-page paper or a worksheet or a modification to sage itself (bug fixes, new feature) or a standalone program written in Java (or Javascript or whatever).
- List anybody you will be collaborating on your project with. Each person has to turn in a complete project of their own. However, by collaborating, you may say person X is doing Y and simply include Y in your project (e.g., each could write some sections of a paper or worksheet).
- Create a timeline for how you'll create the first rough draft of your project. Note that the first rough draft is due May 9, so you should get started soon.