I researched a few methods of publishing Jupyter Notebook figures locally (Voila) or online (Binder and Google Colab). Below are the steps to use/set up each method.

#### I. Voilà

- local host
- should already have Python anaconda environment (I used it for Jupyter Notebook). If you don't have it yet, you can download it here
- more command-line options like showing source code (--strip\_sources=False), changing theme/template (--theme=dark), etc.

I followed this guide but I will summarize the steps below. in terminal:

- 1. "pip install Voila" or "conda install -c conda-forge"
- 2. "voila fileName.ipynb"

I referenced this article to find ways to publish the Jupyter Notebook script for my graphs. I tried the first and third methods. I don't know how to hide source code for Binder or Colab.

#### II. Binder

- very slow the first time
- makes a link that can be embedded
- uses <u>public</u> repositories (harder with BitBucket which will need the commit)

# go to mybinder.org:

- easier with GitHub: paste link (ex. https://github.com/katieguo/jupyter-test), click launch
- with BitBucket (followed this link to do so): paste link, hit launch. copy paste link into new tab and change "gh" to "git" (ex. https://mybinder.org/v2/gh/... > https://mybinder.org/v2/git/...)

# III. Google Colab

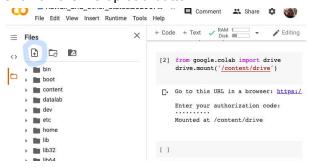
go to colab.research.google.com:

- upload ipynb file

FOR DATA: the notebook does not include the csv files used, so Colab will need to access the data (option 2 and 3 below are from this article):

1. From BitBucket/Github

- a. Upload the data (I used the same csv files) in a public BitBucket or Github Repository. Open the data file.
- b. Open the raw data (for BitBucket: click "..." in the upper right corner next to "Edit"> Open raw. for GitHub: "Raw" in the upper left corner).
- c. Copy-paste the URL to replace the file name in Colab.
- 2. Load data from your local drive
  - a. Click on the file upload button



### OR

(in Colab) write

from google.colab import files
data\_to\_load = files.upload()
and select a file once asked.

b. (in Colab) write

import io

```
df = pd.read csv(io.BytesIO(data to load['filename.csv']))
```

- 3. Load data from your Google Drive
  - a. Upload the csv file to your Google Drive
  - b. (in Colab) write

```
from google.colab import drive
drive.mount('/content/drive')
```

OR

Click on the folder shown and it will automatically write it for you)



- c. Allow Google Drive File Stream to access your Google account and paste the verification code into the provided area
- d. Click on the folder shape in the upper right > content > drive > My Drive and locate the csv file. Right-click and select Copy Path
- e. (in Colab) copy the path in the code below. if pandas has not been imported then write "import pandas as pd" before any of the below.

```
path = "copy_path_here"

df_bonus = pd.read_csv(path)

or

df bonus = pd.read csv("copy path here")
```