**Coding in R - Instructions**

Crash Course

HarpurEdge Fall 2022

09/11/22, 1-4 PM (EST) R Teaching Sessions | 4-5 PM (EST) Inclass Activity

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We will be using R and RStudio for this course. I highly recommend that you download and install R and RStudio before class so that you can follow along.

* Start by downloading R here: <https://cran.r-project.org/>
* Next, download RStudio here: <https://www.rstudio.com/products/rstudio/download/>

Lecture scripts and materials for the course:

You can download them before our class begins and follow along by running the code by yourself on your machine during the lecture.

Session 1: Course Introduction, Setting up R, and R Basics

* RScript: [RCrash\_1\_Basics.R](https://drive.google.com/file/d/1k_RAbB1bdFHGXquGabvltX_6y5Sg1V3Z/view?usp=sharing)

Session 2: Data I/O, R Packages, and Data Visualization

* RScript: [RCrash\_2\_Visuals.R](https://drive.google.com/file/d/1hS5tFod1WVKrA1pYtVAJjunub5m5Pf3Y/view?usp=sharing)
* Data: [data\_ggplot\_1.csv](https://drive.google.com/file/d/1vxy-sM8Ht4yq3k7liiafAlE5do8DQLdD/view?usp=sharing), [data.ggplot\_2.csv](https://drive.google.com/file/d/11Mn5mvpO6Dx158GKb8Pa2ZziUUi6OBCu/view?usp=sharing)

Session 3: Getting to Know Your Data

* RScript: [RCrash\_3\_Analysis.R](https://drive.google.com/file/d/1Cl6QaHtaGAcA9HJdjawaHOEjhyk66_T2/view?usp=sharing)
* Data: [data\_analysis.csv](https://drive.google.com/file/d/1enZ3z_kgbitRayqhXAnSlWvDhwooREXw/view?usp=sharing)

Session 4: In-class Activity

* Download 1: [Inclass\_Activity\_Questions.pdf](https://drive.google.com/file/d/1QqVFUtiBqWc8r0CcGS9Vi1EUscZKWBNh/view?usp=sharing)
* Download 2: [Your\_Answers\_to\_Questions\_Here.R](https://drive.google.com/file/d/1pnc6d6-kSmSwpvOpaRETNW_OPku3_fYI/view?usp=sharing)
* Download 3: [Data\_to\_Analyze.csv](https://drive.google.com/file/d/1gmeztv9golPJE7fwQAE2XHK9VY8WPYC0/view?usp=sharing)

**Some of the Useful Resources**

For some of you who are interested in going deeper with R programming.

* R for Data Science (E-textbook) here: <https://r4ds.had.co.nz/index.html>
* Swirl (To practice R programming) here: <https://swirlstats.com/>
* R cheat sheets here: <https://www.rstudio.com/resources/cheatsheets/>
* R keyboard shortcuts here: <https://support.rstudio.com/hc/en-us/articles/200711853-Keyboard-Shortcuts-in-the-RStudio-IDE>