1. What files do you need to open a shapefile
   1. .shp
   2. .shx
   3. .prj
   4. .dbf
   5. .prj
2. When provided data what do you do first?
   1. Open it and look at it – in QGIS or excel
3. What is wide data
   1. Data where any values are not repeated in the rows and each variable is a column
4. What is long data
   1. Long table, where values do repeat (e.g. Borough name or borough code or year of observation)
5. How did we change from one to the other
   1. Pivot table
6. What are the benefits of a geodatabase
   1. Can store all data for your project in one file
   2. Both raster and vector can be stored within it
   3. Easy to share 1 file as opposed to many
7. What is a thematic map
   1. Map of a “theme”
   2. Map of a column of data
8. How do you join non spatial data to spatial data
   1. Using a unique field (e.g. ID)
   2. Through a join function or tool
   3. In QGIS you must export it to save it
9. In R what is a package
   1. Collections of functions and data
10. In R what is a function
    1. Code that is made into a command to make running the code easier for us, e.g. read\_csv()
    2. Note packages are always a single work, e.g. tidyverse, functions always end with (), e.g. read\_csv()
11. In R what is an argument
    1. A specification within a function that controls how it works
12. How does loading data in R and QGIS differ and what are the benefits
    1. R is object orientated
    2. R shows all the columns (e.g. geometry)
    3. QGIS shows you the polygons
13. In R what does a %>% mean
    1. Then