Directions for installing and loading _R_ packages on school computers

Due to permission issues, when working on school computers R _packages_ must be installed and loaded from the Z:/ drive. If working on your personal computer, it is best to install packages to their default positions (i.e., you do not need to change the library path). The _packages.R_ file can be used to install all required packages for this course (and will be updated throughout the semester)

To install and load R packages on school computers, follow the directions below:

1. Create a directory on your Z:/ drive called _Rlib_. I will assume that this directory is created in the directions that follow. If you use a different directory name, replace Z:/Rlib with the directory that you created.

2. Open RStudio or the R console.

3. Type the following command into R to change the library path, which tells R where packages should be installed:

   `.libPaths("Z:/Rlib")`

4. Run the commands in _packages.R_. One way to do this is by selecting File->Source R Script and selecting this file. This will run the commands in this file and will install the packages.

5. You can use the following command to test whether this has worked correctly:
   `library(knitr)`

6. If nothing happens, that means it works! If you get any error messages, the package did not install correctly and you should try again or see me if you need help.

7. Once it works, you are ready to use RStudio. However, **make sure to add the following to the beginning of any R script you use (and run this command)** so that any necessary packages will be available.

   `.libPaths("Z:/Rlib")`

Basic steps to installing and loading packages:
1. If on a school computer, you must run the command
   `.libPaths("Z:/Rlib")`

2. Packages are installed using the command
   `install.packages("package.name")`

3. Once a package is installed, it does not need to be installed again (unless it was installed to a temporary location and is therefore no longer available). However, packages need to be loaded with the following command during each session for which a package will be used:
   `library(package.name)`