

# References

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## Resources

Here is a list of some of the best resources for R, LaTeX and R Markdown:

1. **Using R for Introductory Econometrics**: This is the main textbook for using R in this course.
2. **R Tutorial**: A powerful **interactive** tutorial for learning R
3. **Quick-R**: A nice introduction to R with simple examples
4. **R-bloggers**: News and blogs about R
5. **Stack Overflow**: A general discussion forum for programmers, including many R users
6. **Bookdown**: A comprehensive resource for learning R Markdown
7. **LaTeX**: Quick introduction to LaTeX (this is optional)

## Packages

The standard distribution of R already comes with a number of packages. Packages are extensions to R by advanced users. They help you to easily make use of a wealth of extensions generated by a big and active community. The packages that we will use in our course are (not limited to) the followings:

- **wooldridge**: Accessing the datasets in the textbook
- **lmtest**: Testing linear regression models
- **car**: Companion to Applied Regression
- **stargazer**: formatted tables of regression results
- **corrgram**: very useful package to draw the correlograms
- **dplyr**: dplyr is a powerful R-package to transform and summarize tabular data with rows and columns
- **ggplot2**: the most powerful R-package for visualization

In order to install a new package use the command `install.packages("name of the package here")`. You only need to install a package once! After that use either `library(package name)` to load the package.

## Useful short cuts

- Run codes line by line: **Ctrl+Enter**
- Comment out multiple lines: Select the lines you want to comment out and then press: **Ctrl+Shift+C**
- Auto-indent multiple lines of codes: Select the lines and press: **Ctrl+shift+A**
- Knit the Rmarkdown document: **Ctrl+Shift+K**
- Add r chunks in R Markdown: **Alt+Ctrl+I**

## Cheatsheets

In Rstudio there are some built-in cheatsheets available. To access them go to *Help / Cheatsheets*. I highly encourage you to print out the following cheatsheets:

1. Rstudio IDE Cheat Sheet
2. R Markdown Cheat Sheet
3. R Markdown Reference Guide
4. Data Visualization with ggplot2
5. Data Transformation with dplyr