

OS X Setup for Data Science - R, MySQL, IPython, Git

Command to install Homebrew via OS X terminal:

\$**ruby -e "\$(curl -fsSL https://raw.githubusercontent.com/Homebrew/install/master/install)"**
Homebrew will be installed in the **/usr/local** directory

Useful Homebrew Commands for OSX:

- Updates for OSX: **\$brew update** # (updates list of available packages)
- Upgrades for OSX: **\$brew upgrade** # (installs newer versions of packages)
- List all the packages installed by brew: **\$brew list**
- List broken packages/installers: **\$brew doctor**

Install R in OSX via terminal:

- **\$brew tap homebrew/science**
- **\$brew install gcc**
- **\$brew install Caskroom/cask/xquartz**
- **\$brew install r**

Install R-Studio:

- Website: <https://www.rstudio.com/products/rstudio/download/>

Install MySQL & MySQL Workbench:

- Website: <https://coderwall.com/p/os6woq/uninstall-all-those-broken-versions-of-mysql-and-re-install-it-with-brew-on-mac-mavericks>
- Access mysql from terminal: **mysql -u root -p**
- Install MySQL workbench: **\$brew cask install mysqlworkbench**

Install Python v2.7, Anaconda and Jupyter:

- Anaconda Installer 32/64 bit for Python 2.7: <https://www.continuum.io/downloads>
- Copy downloaded file to the desired directory and execute the command below via terminal:
\$bash Anaconda2-2.4.0-Linux-x86_64.sh
- Restart the terminal.
- Check python version: **\$python --version**
- Install jupyter via Anaconda: **\$conda install jupyter**
- Update Conda Installer: **\$conda update conda**
- Update Anaconda: **\$conda update anaconda**
- Check ipython notebook: **\$ipython notebook**
- Pymysql database connectors for python: **\$conda install pymysql**

Install R Kernel for Jupyter:

- Install zmq package: `$brew install zmq`
- Update/Upgrade brew
- Open R via Ubuntu terminal (type `R` in the terminal) and execute the following commands:

#1. Install New Packages:

```
install.packages(  
  c('rvmq','repr','IRkernel','IRdisplay'),  
  repos = c('http://irkernel.github.io/', getOption('repos'))  
)
```

#2. Install IR Kernel

```
IRkernel::installspec()
```

Basic Conda Commands:

- Conda version: `$conda --version`
- Update Anaconda: `$conda update anaconda`
- Update Conda Installer: `$conda update conda`
- List all installed Conda packages: `$conda list`
- Search for a package: `$conda search packageName`
- Install Conda packages: `$conda install packageName` or `$pip install packageName`
- Remove installed Conda package: `$conda remove packageName`

Install Git:

- `$brew update`
- `$brew install git`

Check command history:

- Terminal command history from start till shutdown: `$history > history.txt`
- View terminal history: `$cat history.txt`