

Instruction for Installing Julia and Related Packages

For Mac users:

1. Download Julia-v1.0 macOS Package (.dmg) from <https://julialang.org/downloads/>
2. Run the downloaded .dmg file, a window will pop up, then drag the Julia-1.0 logo into folder "Applications".
3. Run Julia-1.0 from Launchpad, or open it from Finder by double-clicking on the icon, you should see:

4. Type: `import Pkg`
5. Type: `Pkg.update()` – note that this may take a while....

Installing basic packages
6. Type: `Pkg.add("JuMP")` to install the JuMP package.
7. Type: `Pkg.add("Cbc")` to install the Cbc package (an open-source integer programming solver).
8. Type: `Pkg.add("Clp")` to install the Clp package (an open-source linear programming solver)
9. Type: `Pkg.add("GLPK")` to install the GLPK package (another open-source linear programming solver)

Setting up IJulia: an interactive programming platform

10. Type: `ENV["PYTHON"] = ""`

11. Type: `ENV["JUPYTER"] = ""`

12. Type: `Pkg.add("IJulia")` to install IJulia

13. Whenever you want to use Jupyter notebook do the following:

- a. Type: using IJulia
- b. Type: `notebook()`

14. If the above step does not work, you can try running the notebook directly from command window by typing:

`~/ .julia/packages/Conda/m7vem/deps/usr/bin/jupyter notebook`

15. Download Gurobi (v8.1) from: <http://www.gurobi.com/downloads/download-center>

- a. You will need to register an account first
- b. Be sure to choose "academic account" and register using your Clemson email

16. Install Gurobi by running the file you just downloaded

17. Return to the download webpage <http://www.gurobi.com/downloads/download-center>, click on button "Academic License" to request an academic license, and follow the instructions therein to activate the academic license.

(Refer to <http://www.gurobi.com/documentation/> for Gurobi's official installation guide)

18. Type: `Pkg.add("Gurobi")`

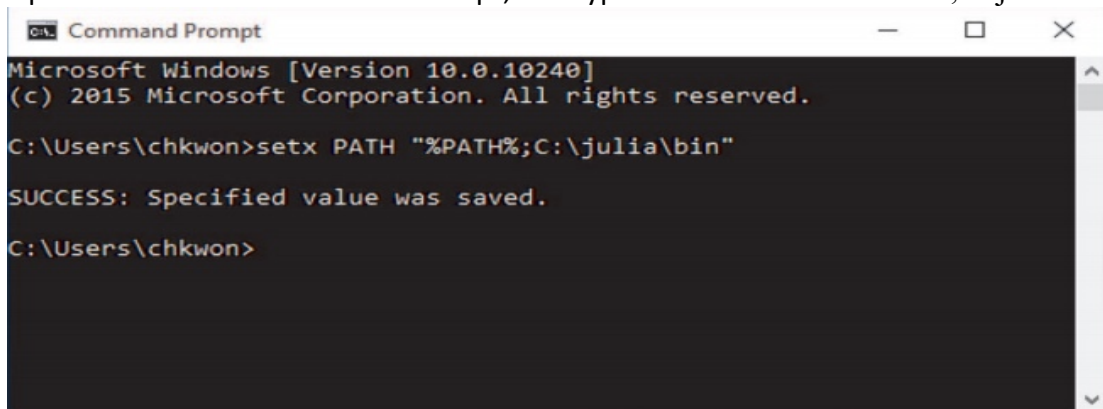
Finally, give it a test by following Step 7 on page 14 of <http://www.chkwon.net/julia/book/juliabook2-preview.pdf>

(copy and paste the codes into the command window)

For installation problems on JuMP, also refer to <http://www.juliaopt.org/JuMP.jl/v0.19.2/installation/>

For Windows Users:

1. Download Julia-v1.0 Windows Package (.exe) for 64-bit from <https://julialang.org/downloads/>
2. Run the downloaded .exe file and install the software to directory C:\julia
3. Open the Windows Command Prompt, and type: `setx PATH "%PATH%;C:\julia\bin"`



```
Microsoft Windows [Version 10.0.10240]
(c) 2015 Microsoft Corporation. All rights reserved.

C:\Users\chkwon>setx PATH "%PATH%;C:\julia\bin"

SUCCESS: Specified value was saved.

C:\Users\chkwon>
```

4. Open a **new** Windows Command Prompt, and type: `echo %PATH%`
You should see C:\julia\bin in the end. If not, you must have something wrong.
5. Run Julia-1.0 from your Windows start menu, you should see



```
yongjia — julia — 113x24
Last login: Wed Aug 21 09:34:31 on ttys000
155:~ yongjia$ exec '/Applications/Julia-1.0.app/Contents/Resources/julia/bin/julia'

Documentation: https://docs.julialang.org
Type "?" for help, "]?" for Pkg help.
Version 1.0.4 (2019-05-16)
Official https://julialang.org/ release

julia> 
```

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15. Whenever you want to use Jupyter notebook do the following:

- a. Type: using IJulia
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(copy and paste the codes into the command window)