

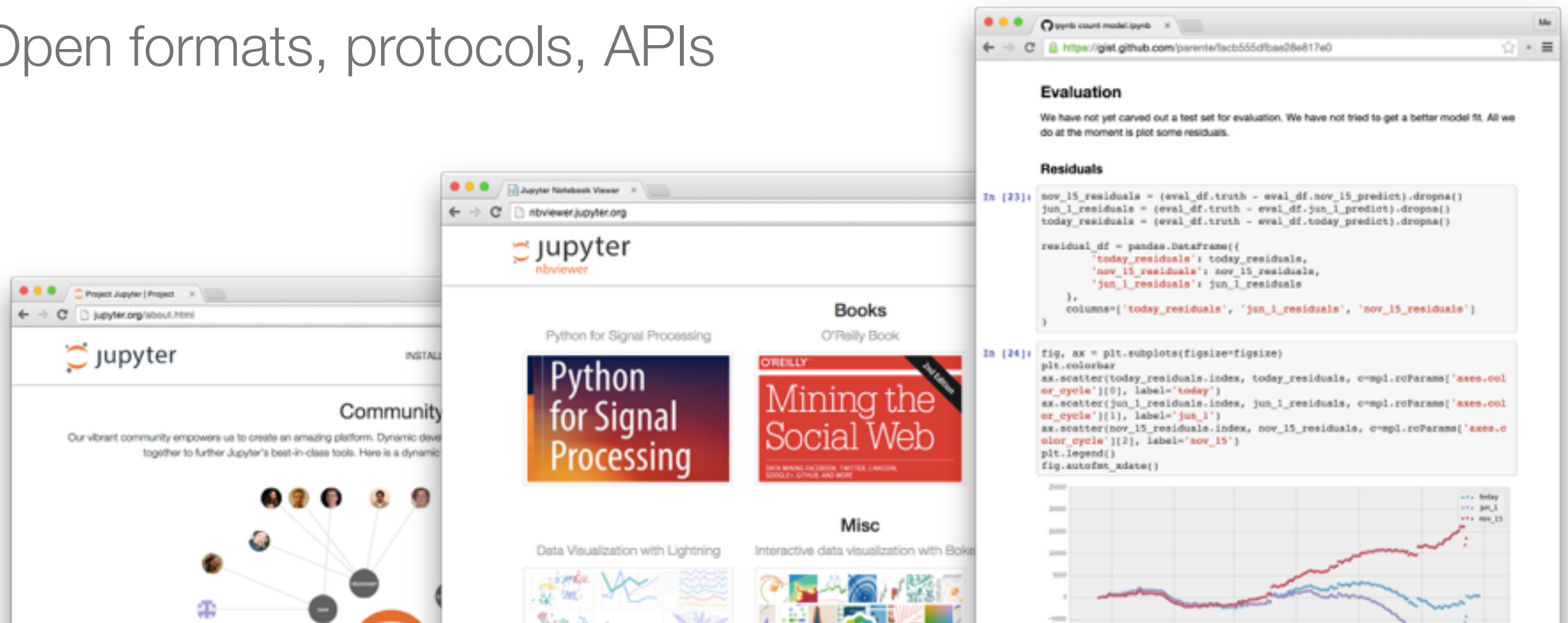
A Brief Introduction to Jupyter Notebook



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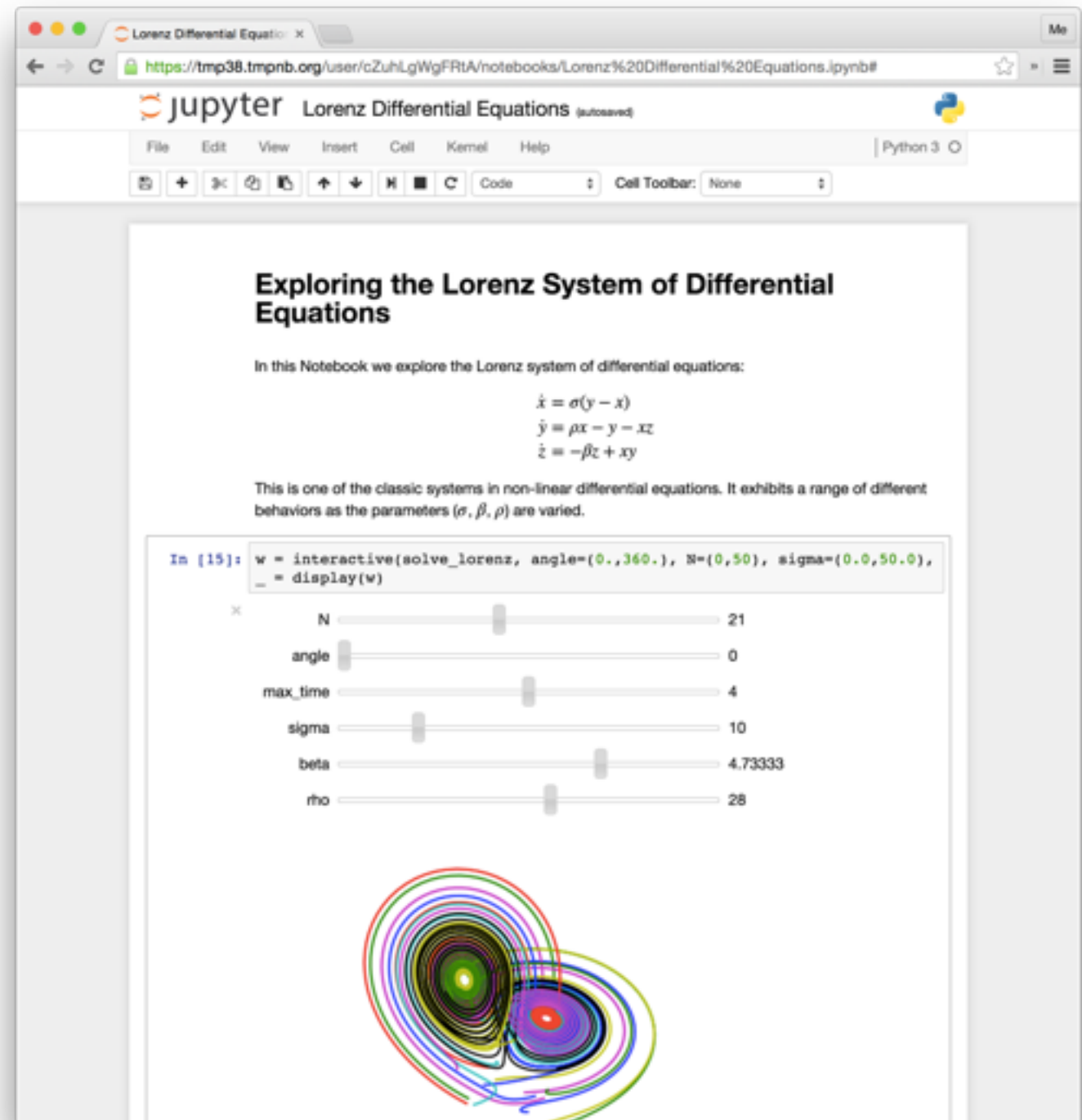
Project Jupyter

- Open source, interactive data science and scientific computing
- Language kernels, notebook documents, clients
- Large, growing community and ecosystem
- Open formats, protocols, APIs



Jupyter Notebooks

Text
+
Code
+
Visualizations
+
Widgets
+
Compute
+
Data



“An article about computational science in a scientific publication is not the scholarship itself, it is merely advertising of the scholarship. The actual scholarship is the complete software development environment and the complete set of instructions which generated the figures.”

– Buckheit and Donoho, WaveLab and Reproducible Research, 1995

Ecosystem

- Research: [LIGO](#), [Nature](#), [BuzzFeed](#), ...
- Education: [Berkeley Data-8](#), [UNC-CS COMP-116](#), and [many more](#)
- Industry: Microsoft, Google, IBM, Continuum, Domino, Kaggle, Quantopian, yhat, ...
- Languages: Python, R, Julia, Scala, ... [over 40](#)
- Infrastructure: [Jupyter Hub](#), [nbviewer](#), [nbconvert](#), [tmpnb](#), ...
- Extensions: [slideshows](#), [dashboards](#), [examples](#), [widgets](#), [grading](#), ...
- New clients: [Jupyter Lab](#), [nteract](#), [Hydrogen](#), ...

Demo

Text, code, visualization, widgets, libraries, languages, sharing