PyQtGraph - High Performance Visualization for All Platforms

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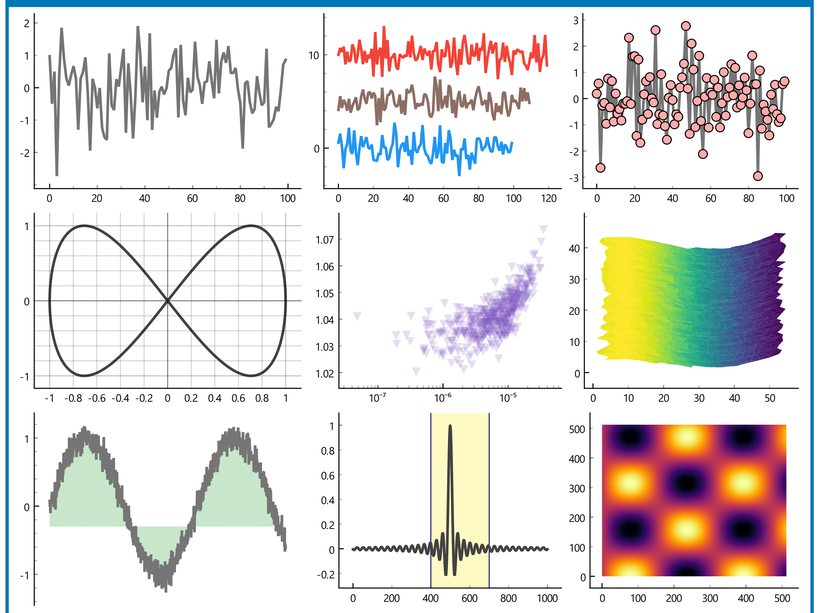
SciPy 2023

Summary



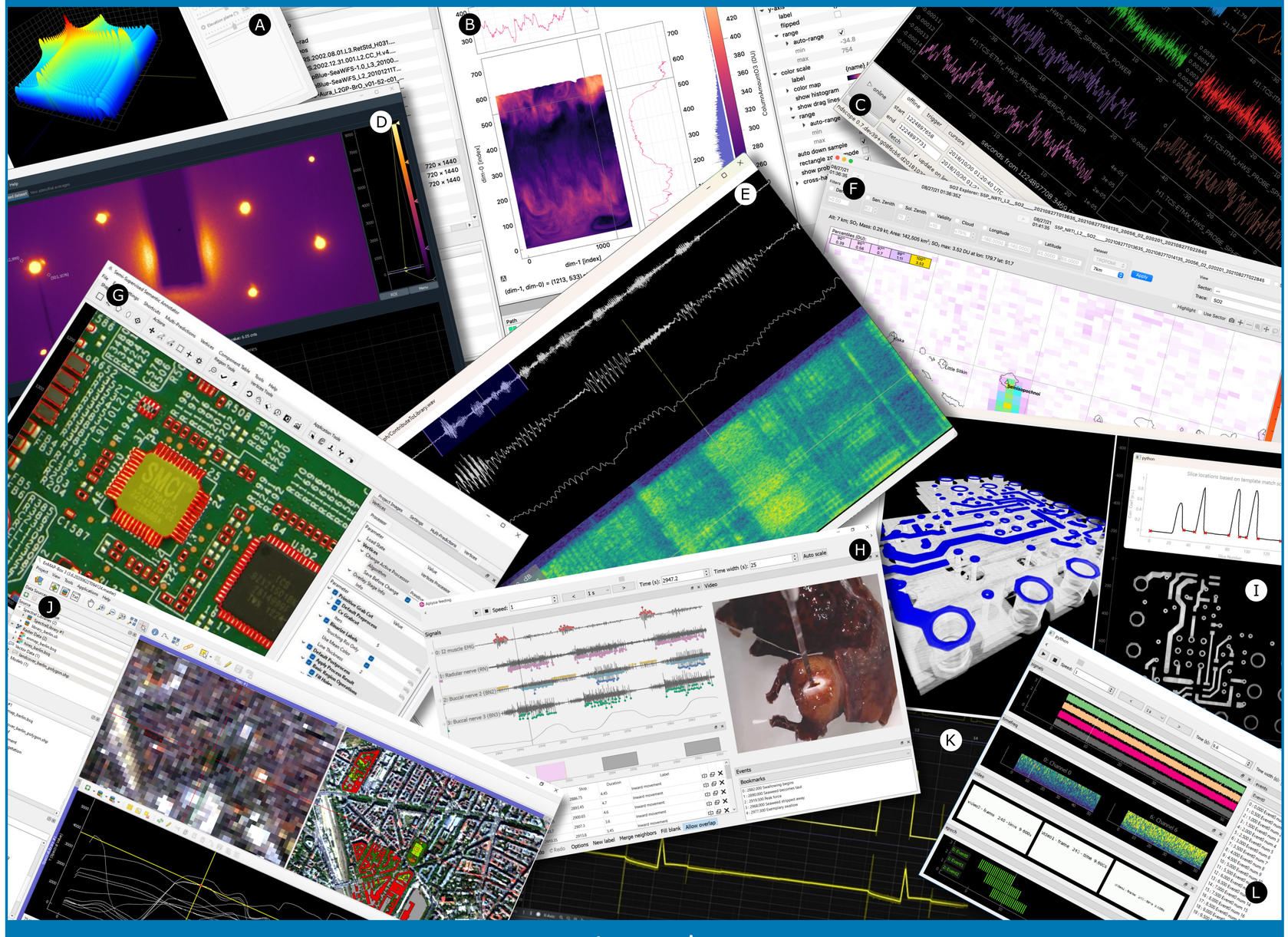
PyQtGraph is a plotting library that integrates NumPy and the Qt framework, allowing users to develop scientific applications where high **performance**, **interactivity**, and cross-platform **compatibility** are a given. *It is:*

- **Fast!!** Real-time plotting + interactivity
- **Pure python:** Native Python data structures & NumPy arrays, no C++ required
- **Extensive:** Supports images, scatterplots, lines, 3D graphs, meshes, colormaps, parameter configs, custom graphics, and more
- **Integratable:** Seamlessly fits into any PyQt/PySide application

Future Work

- Non-linear transformations
- Multiple vertical and horizontal scales/axes on the same plot
- More CuPy & Numba integration
- Support being a plot backend for Pandas

In the Wild



Legend

A – Antenna Array Analysis – https://github.com/rookiepeng/antenna-array-analysis
B – argos – https://github.com/titusjan/argos
C – ndscope – https://git.ligo.org/cds/software/ndscope
D – iris – https://github.com/LaurentRDC/iris-ued
E – barney – https://github.com/j9ac9k/barney
F – SO2 – Alaska Volcano Observatory
G – S3A – https://gitlab.com/s3a/s3a
H – neurotic – https://neurotic.readthedocs.io
I – xrayrecon – https://gitlab.com/ficsresearch/xrayrecon
J – EnMAP-Box – https://enmap-box.readthedocs.io
K – joulescope – www.joulescope.com/
L – ephyviewer – https://ephyviewer.readthedocs.io

See more at https://github.com/pyqtgraph/pyqtgraph#used-by