Jdaviz Guide

Jdaviz is an interactive Python application for visualization of spectroscopic and imaging data. This guide will give you an overview of where you might encounter it, its key features, and some common use-cases.

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What is Jdaviz?



Jdaviz icon

Jdaviz (pronounced J-D-A-viz) is a new Jupyter-based Python application for spectroscopic visualization and analysis. Built on the glue and Voila frameworks, Jdaviz is uniquely designed to work

- embedded in an interactive website, such as the MAST Portal
- in a Jupyter notebook
- as a standalone desktop application

all while providing the same user interface and interactive user experience. Utilizing astropy and astropy-affiliated packages, Jdaviz also includes a suite of spectroscopic analysis plugins that can be used either via the user interface, or programmatically in Python.

Jdaviz is made up a series of customizable viewers and panels. Users can arrange these viewers into set “configurations”, tailored to their needs. There are a few pre-defined configurations for quick inspection of more common spectroscopic data products. See the table of Jdaviz Configurations for more details.

MAST has incorporated Jdaviz into its web framework. When searching for JWST data products in the MAST Portal, a new option appears for relevant search results allowing users to quickly inspect and analyze data on the web. See Searching for Compatible Data and Viewing Spectra and Images for more details on navigating the quicklook pages.

For Further Reading...

- Jdaviz Package Docs (ReadTheDocs)
- MAST Portal Guide
- MAST JWST Archive Manual

Citations and Acknowledgements

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User Support

For MAST user support, contact the HelpDesk: archive@stsci.edu. See the Archive Support page for details and other resources.