Digital Mapping Guide: When To Use What

A rough guide to figuring out what tool you need for whatever type of map you want to make.

Needs	Tools	Notes	Examples
• Preserve underlying geometry • Global and/or street-level viewing • Accessible on web • Zooming and panning support • Maximum/granular base-level customizability	Load basemap from **Stamen**, **CartoDB**, or **OSM**, use **Leaflet.js** or **mapbox.js**, manipulate with javascript	Want customized base tiles? Make your own using **TileMill** or **MapBox** (need an account/subscription)	Tor Map LAFD
All of the above PLUS: • Don't want to mess with programming • Working with super large datasets • Fine with limited customization • Prioritizing speed over detail and distinction	Use **CartoDB web interface** or Mapbox for loading in data on top of existing tiles		Buzzfeed spy planes Note: for this example they are also using Juxtapose.js
• High level of support for viewing, projections, maps, vector/raster layers, adding data, analysis • Don't mind slightly clunky software • Good for easily working with shapefiles • Interested in manipulating both the map and the	**QGIS** desktop program	There's a command line version of QGIS as well	

underlying data			
• High level of customization/freedom with projections • Okay with steep learning curve • Javascript-savvy • Work with SVG (mainly) • No need for street-level or extensive zooming/panning	Use **d3.js**		Chloropleth
• Create your own styles, tiles • Want ability to export images of maps, work on design • Easily layer data on top of maps	If you want maximum control, open-source, and don't mind old software: **Tilemill** desktop	For more polished/powerful interface, use **Mapbox Studio Classic** (will need an account to use the things you create in web apps, but not for exporting images)	Note the tiles, these are custom made
• Working with satellite/aerial imagery	**USGS Earth Explorer** for finding and accessing data using web interface (need to register to get the data) **Landsat on AWS** for just accessing data easily **landsat-util** for	People often use photoshop or other tools for stitching images together	LandSat Bot Glittering Blue

	downloading and working with the data on the command line		