DCS Tools

[Mapbox](#)/[Tilemill](#)

What it Does
Tilemill is a GIS (geographic information system) mapping software that allows users to design, customize, and add data to maps. Tilemill maps can be uploaded and hosted on the Mapbox website.

Why it's Cool
Unlike more complex GIS softwares like ArcGIS and QGIS, Tilemill is very accessible for beginners ([crash course here](#)). Its intuitive interface and focus on design makes mapping beautiful maps simple.
Using Tilemill in conjunction with Mapbox allows for easy, interactive web hosting of your maps.
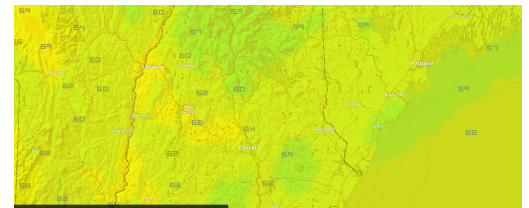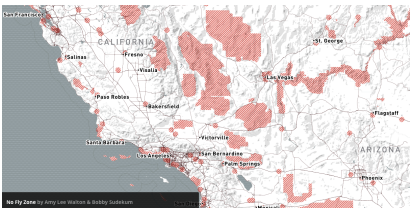
Type of Data
Input: CSV (with latitude and longitude columns), ESRI Shapefile, GeoJSON, KML, GeoTIFF, SQLite, PostGIS
Output: MBTiles, PNG, PDF, SVG, Mapnik XML

Examples
On campus: Tilemill and Mapbox are being used in Ann Kibbie's Imagining London in Eighteenth-Century Literature to map disparate experiences of the city.

(Left to right, Mapbox user sample maps): Drone-prohibited areas; "Pirate Map"; Temperature map:

[Gephi](#)

What it Does
Gephi is a data visualization tool that allows users to create and customize network graphs.

Why it's Cool
Often called the Photoshop of data, Gephi allows for detailed, meaningful customization and engaging design. It can process a very large number of data points. Functionality includes real-time visualization and a timeline component.
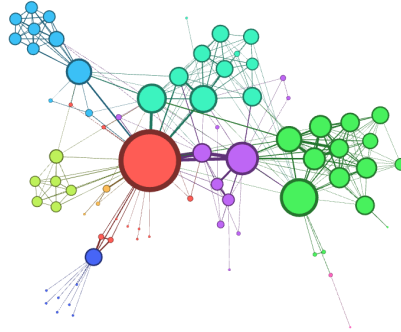
Type of Data
Input: CSV, GEXF, GDF, GML, GraphML, Pajek NET, GraphViz DOT, UCINET DL, Tulip TPL, Netdraw VNA, Spreadsheet
Output: SVG, PDF, CSV, GEXF, GraphML, Pajek NET, Spreadsheet

Examples
Gephi can be used to visualize networks of book characters, Facebook friends, Twitter data, and more
Sample Gephi graph of *Les Miserables* characters:

Voyant

What it Does
Voyant is a web-based text analysis program. Voyant processes large texts, or groups of texts, to be processed by a wide range of tools.
Why it's Cool
The breadth of tools available on Voyant allows for exciting and innovative exploration through text analysis.
Type of Data
Plain Text, HTML, XML, MS Word, RTF, PDF
You can copy and paste text into Voyant (Project Gutenberg has 46,000 free ebooks) or type in a URL linking to a text.
Voyant
Examples
Voyant tools include word frequency, word distribution, word clouds, term browsing, and more.
Word Cloud of *Hamlet*:

Omeka
Omeka is a web platform designed with scholars, museums, libraries, and archives in mind. Omeka is currently being used in Allison Cooper's Film Narrative course to build Bowdoin's Digital Clip Archive.

(Screenshot from BDCA)

Python Programming for the Humanities
Python Programming for the Humanities is an online interactive tutorial that teaches basic Python skills in the context of humanities projects. Students in Crystal Hall's Gateway to the Digital Humanities will learn text processing, programming, algorithms, archiving, clustering, and more.

RStudio
RStudio is a platform for the R programming language. Students in Crystal Hall's How to Read 1,000,000 Books are using RStudio to trace and visualize patterns in novels.