Neatline workshop notes

University of Strathclyde, Glasgow, November 8, 2012

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Start

Welcome to the workshop!

We'll start by getting to know who we all are, talk about what Neatline is, I'll show you how the backend works, then let you get stuck into it. We'll close by reflecting on what you learned in the exercises, what delighted or frustrated you, and what you might be able to do with it. [Intros: 25 mins; What is Neatline 35 mins; playing with Neatline 45 mins; reflection and close 15 mins]

Intros - who am I

PhD student in digital humanities, researching historians and scholarly crowdsourcing, focusing on participant digitisation - the concept of capturing the transcriptions, metadata creation, imaging, georeferencing and geolocation historians do as part of their research to see if it can be aggregated to create something greater than the sum of its parts. My background is in software engineering and human-computer interaction, most recently for the Science Museum in London but I've worked in museums and cultural heritage since my first museum job in Melbourne. I'd always been interested in mapping and the history of places, but five years working on the archaeology and history of London at the Museum of London really cemented it.

Intros - who are you and what do you want to learn?

Share your name, background and one sentence on what you hope to get out of the workshop.

What is Neatline?

Neatline is online software made by the Scholar's Lab in Virginia. In their words, it's 'a geotemporal exhibit-building framework that makes it possible to plot archival collections, narratives, texts, and concepts on interactive maps and timelines.'[1] Or more simply, it lets you 'plot archives, objects, and concepts in space and time.'

Neatline lets you create and manage records, plot them on interlinked maps and timelines, add complex vector drawings, points and spans. You can customise how the site and your items appear in lots of ways - colours, opacities, line thicknesses, point radii, and gradients. It's about handcrafting interpretation to represent your collection of things, not importing big sets of data into automatically-generated interfaces.

You can include short snippets of text, captions, long-form text and link them to sections of the timeline and map so they appear as you move through their time and place. You can group related elements together so they can be styled and displayed as a set.

More importantly for people working with messy humanities data, Neatline goes beyond plonking markers on Google Maps. It's designed to express ambiguity, complexity and nuance.

One word of warning before I show you a live demo - this software was only launched in July, so we're exploring new territory. The software is still an early release, and it does have some quirks. Version 2 is coming soon and will have new features.

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[1] http://neatline.org/2012/06/30/neatline-sneak-peek/

Any questions before we go on?

Demo - live site

Since the software is from Virginia, it might not be surprising that some of their material is from the American Civil War.

My dear little Nellie

Jedediah Hotchkiss was a Civil War cartographer, and some of his letters are held at the Small Special Collections Library at the University of Virginia. This interface shows an unusual document - a short letter he wrote to his daughter, Nelly. 'After a describing the journey to rejoin the Confederate army and the natural surroundings of his campsite on the banks of the Rappahannock, Hotchkiss provides Nelly with a terse, understated description of the battle. ... On the third page of the letter, Hotchkiss sketches out a rough drawing of the battlefield, penciling in the shape of the river around the Fredericksburg basin, positions of the armies, locations of artillery batteries, and the layout of the roads, railroads, and streams around the town. In this exhibit, we have cut away the section of the letter containing the map, georeferenced it against a stylized, modern-geography tileset, and layered the rest of the document around it.'[2] His letters have been transcribed and the text broken into sections that pop up over their section of the document, and linked with 'custom vector illustrations'.

'A collection of numbered waypoints unfold a long-format essay that describes the letter and its context in detail, and the sketch of the battle is spatially annotated and connected with content in the surrounding letter. Most interesting, though, is the relationship between Hotchkiss's sketch and formal battle maps that were made of the same events. Scroll the timeline back to the "Sketch of the Battle of Fredericksburg, December 13," and an official map of the battle with a whole new set of waypoints and prose narrative is layered on top of Hotchkiss's sketch. Zoom in and move the timeline back and forth to compare the two maps in detail."[3]

http://hotchkiss.scholarslab.org/neatline-exhibits/show/my-dear-little-nelly/fullscreen

"I am It, and It is I": Lovecraft in Providence

I've chosen this one so you can see the range of styles and design decisions you can make.

'This exhibit, by a University of Virginia undergraduate, connects short passages from the private letters of 20th-century horror writer H. P. Lovecraft with the geography of his home city, Providence, Rhode Island. Paul Mawyer uses Neatline to explore the ways in which Providence appears in and influences the writing of a man whose tombstone reads, "I am Providence."'
http://lovecraft.scholarslab.org/neatline-exhibits/show/lovecraft-in-providence/fullscreen

What is Neatline (the backend view)

The software platform is built on top of another bit of web software called Omeka from the Roy Rosenzweig Center for History and New Media, George Mason University, also in Virginia. (Omeka is designed to be like blogging software for exhibits and collections). The Neatline software is built as plugin, so first you create an installation of Omeka then you install Neatline. A plugin is like an

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[2] http://neatline.org/neatline-in-action/
[3] http://neatline.org/neatline-in-action/

extension - you can build a conservatory on your house, and you get all the good things about your house plus a room for sunny breakfasts. Likewise, the decision to use a plugin architecture for Neatline meant they got all the functionality of Omeka for free and that like Omeka, it would be extensible - other people can built themes to change the look and feel and design, or enhance the functionality for their specific requirements.

It's designed to work either as an interpretive view onto an existing Omeka archive or as a standalone application on top of Omeka. You can create items directly in Neatline or create them in Omeka and pull them into Neatline. You can also combine Neatline interfaces with Omeka exhibits for items in Omeka.

Since you probably want to get stuck straight into Neatline, in this work shop I'm going to focus on the second method - using the Neatline interface to create content and not worrying too much about what Omeka's doing underneath.

What is Omeka?

"Omeka is a free, flexible, and open source web-publishing platform for the display of library, museum, archives, and scholarly collections and exhibitions"[4]. It's part Web Content Management, Collections Management, and Archival Digital Collections Systems. Or in other words, it's like the blogging software "WordPress for your exhibits and collections."[5] It's designed to be quick to set up, but as you'll see, getting your head around its data structures is harder than guessing how to make a blog post in WordPress. It uses a widely-used data standard called Dublin Core so it's fairly interoperable (i.e. it can exchange data with other systems) but if you've not used Dublin Core before it can take a while to get used to.

If you're a database person like me, you might expect separate first name, last name etc fields so you've got more flexibility, but it's designed as a pretty generic container for all sorts of things, so it doesn't work like that. Their assumption might be that there's another collections system behind it or that you might create an extension or data type to allow that.

It's extensible, so you can add plugins to help you manage your vocabularies and include Library of Congress subject headings (for example).

What can you do with Neatline?

As software designed for a specific purpose built on top of other software designed for a specific purpose, you need to test your ideas about things to do with space and time against the reality of what the software was designed to do. Just as conservatories come with certain benefits but also make other things less easy (like insulation and or privacy), there are trade-offs with all software.

I've been playing with Neatline to see how it would work for publishing content about the lives of early scientific women. I was interested in two possible roles for the software: to create interfaces for fairly traditional biographic narratives but with the ability to discover unexpected lives and achievements in places and times you thought you knew; and as a more analytic tool for exploring how different factors played in different womens' lives, including when, where and how they lived

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[4] http://omeka.org/about/
[5] http://www.dancohen.org/2008/02/20/introducing-omeka/

and worked. I wanted to understand what difficulties they'd had to overcome to conduct research and be recognised for it. What could I learn about their lives by viewing them on maps with timelines? Would I be able to compare and contrast, to highlight similarities and differences? What information would be lost in the process, and what would be gained?

How do you load data and content into Neatline?

[Live demo of backend] Here's the backend view of Neatline. As you can see, you can have more than one Neatline exhibit on the same server.

You can edit the description of an exhibit http://www.digitalhistories.org.uk/admin/neatline-exhibits/edit/1 ; the query that pulls in items from Omeka http://www.digitalhistories.org.uk/admin/neatline-exhibits/query/1 or just go straight to editing items in your Neatline exhibit http://www.digitalhistories.org.uk/admin/neatline-exhibits/editor/1.

Navigating the backend of Neatline

Things in Neatline are called 'items'.

Item list view

An overview of items in your Neatline collection, including any you've pulled in from the underlying Omeka collection.

This screen gives you access to the Layout Editor, where you can turn on or off the overall display of the map, timeline and items. You can move them around on the screen and change their sizes. You can also change the basemap – some defaults are provided but if you had a mapping server you could add your own.

Individual item view.

This is where you do most of your work. Tip: it can be slow to load so don't click 'add item' a million times, just let the screen refresh.

[Play with existing items]

You can set whether they're displayed in the item, map and timeline views with the checkboxes.

The title appears in the Item list and when you put your mouse over it on the timeline or map.

Items are generally text-based, but you can add images to the bubbles. Images that you want to appear in the pop-up bubbles must be online already. To add images to the bubbles: copy their URL and paste via image button. It doesn't seem to pull in the related image record from Omeka except when you tick 'Use default item metadata', and then you get everything from the underlying record in Omeka. It seems to work better when you put together the material specifically for Neatline - hand-tailoring a version of the text and image from your original item record.

The only date you need is the start date e.g. a year, but you can be more precise if you have the data. You can also set items to start or end their display on a different date if that fits the story you're telling. If your dates are fuzzy or unknown, you can use the slider to set that too.

Places are added via the map.   You can pan the map (hand icon), plot individual points with the pencil icon, draw lines by clicking (hold shift to draw freehand, double-click to finish), or draw polygons (hold shift to draw freehand, lift shift to double-click to close)

Relations lets you set one item as the parent for another[6]. This mostly lets you set the style and visibility settings in groups.

Adding items to Neatline

I'll take you through the process of adding an item – pay attention, because you'll be doing it next!

Dates need to be added in ISO 8601 format.

You link items with locations by navigating to the location in the map view. The streets in Montreal have changed, so if you can't immediately find it on Google Maps, then try a general Google search to get the modern name. Then it's a matter of eyeballing the two maps to find the same location, and plonking a marker on that location in the Neatline map. You can't yet search within a map or enter geocoordinates directly. The software automatically puts some code in the spatial tab. If your location is more of an area than a point, you can draw polygons etc.

Structuring data and media for Omeka

If you want to go beyond simple but flexible items in Neatline, you can create items in Omeka then pull in all their related fields by the 'Use default item metadata' checkbox. However, it doesn't look as good. But adding a document item to Omeka and uploading the related image of the letter is one way to get the image online to show in the Neatline item.

Create new item. Add 'item type metadata' for the specific type of item it is e.g. person, document (text or image of text), image etc. Choose whether you're creating data or metadata. That means are the data fields you're filling in about the data item itself - when was it created, who by, etc, or when the actual object (or doc or person) itself was created.

Check the Item Types page for a guide to what kind of Item your thing should be. http://www.digitalhistories.org.uk/admin/item-types

Loading maps into Neatline

You can load historic maps into Neatline, georeference them and use them as basemaps, but that requires extra software so we're not going to cover that. (A shame, as the streets of Montreal have been renamed since the modernist correspondence took place)

Exercise: adding items to Neatline

Anouk has prepared some images of modernist correspondence for you, along with associated metadata. She can explain a bit about it now...

The basic process is:

- add the item - record metadata about it
- transcribe the text
- plot it on the map and timeline

[6] http://neatline.org/2012/07/19/parent-child-relationships-in-neatline/

- tweak its appearance to suit
- optionally include an image

[Slide:

- Log in with details from email http://www.digitalhistories.org.uk/admin/
- Follow steps at http://neatline.org/plugins/neatline/ after 'To add a new record to the exhibit' to create a new item in Neatline. Decide whether you want to transcribe or describe the letter; type the text into the description field.
- Place it on the timeline and map
- Save and view on the public interface]

Exercise: exploring the options

Looking at the content of your letters, do they contain any references to places or journeys - how might you include them? What kinds of mapping could you do?

Are other dates mentioned in your letter? How might you include them on your timeline?

Can you link your letter to others to start to construct a narrative?

Are there any related entities - people, places, concepts, things, events - you could try including? If you include other types of things, do they work better as specific Omeka items or as general Neatline items?

Exercise: enhancing your entry

How can you use the options for changing the display of markers etc to make the presentation more nuanced? Play with the timeline and map markers, set the map focus or test a point graphic or experiment with text within the title and description. •Try creating an Omeka 'document' item and uploading the image of your letter. Neatline is all about hand-crafting an interface to be more expressively interpretive, so have a go.

[Break - optional]

[If you need to pop out for a comfort break or just stretch your legs, now is a good time]

What did you learn from the exercise?

What kinds of interpretive decisions did you find yourself making?

What delighted you? What frustrated you?

How might you use it in your work? What kinds of uses does it work best for? What mightn't it work for? Can you see ways of using it to explore research questions? What kinds of audiences could you create sites for?

Where to find out more

Basic documentation

http://neatline.org/plugins/neatline/

Neatline in action

http://neatline.org/neatline-in-action/

About georeferencing with Neatline

http://neatline.org/2012/08/20/using-neatline-with-historical-maps-part-1-georeferencing/

http://neatline.org/2012/08/23/using-neatline-with-historical-maps-part-2-transparency/

http://neatline.org/2012/08/29/using-neatline-with-historical-maps-part-3-geoserver/

Omeka data types

http://omeka.org/codex/Item_Types