Nicole Rosengurt
INFO-664
Prof. Rik Vanmechelen
Spring 2023

Visualizing the Mail Art Network

Final Code: https://github.com/nicole-rose/mail-art.git
Final Visualization: https://nicole-rose.github.io/mail-art-vis/#/

For my final project, I analyzed digitized collections of Mail Art in order to discover connections between the artists who sent and received this art. Mail Art can include items like one-of-a-kind postcards sent from one person to another, or campaigns that circulated through an entire network of artists who each contributed an addition to the work. Since the Mail Art movement arose as a way to make art outside of "official" art distribution systems such as the art market, museums, and galleries, there has been a dearth of "official" cataloging or collections work done with the materials. I hope that with this project, I can begin to put together an overview of the Mail Art network.

The data I worked with contained both the sender and recipient of the work. The Mail Art Collection at the School of the Art Institute of Chicago Library & Special Collections (SAIC) is the most robust source available, as their metadata includes separate tags for sender and recipient. The Mail Art Collection at The University at Buffalo Libraries (UB) also includes some information on sender and recipient. The Smithsonian Archives of American Art (AAA) included this information in the title for each artwork.

The first part of my project was to create a unique web scraper for each source I would be using. For UB and SAIC, I first harvested all the page urls for individual works of mail art. I then wrote a code to visit each of the pages and web scrape the metadata I would need.

In the case of AAA's collection, I only needed the titles of the items, so I only collected those from the main page. The mail art in this collection did not have metadata for senders or recipients, only the title. There, I split the title on the words "mail art to" and assigned the two names on each side to a Sender and Recipient. For the University of Buffalo, the metadata for the recipients had additional names that I did not need for my data, so I used Regex to first find the substring that contained the word "Recipient", then extracted the name from that substring.

I had more work to do for SAIC than for any other collection, because they had the most examples of mail art for me to work with, and because their metadata was so rich. I wrote a

code that would report errors as it went through each mail art item, since some records contained either no addressees, no primary creators, or even multiple addresses. After gathering all of the urls for the pages with errors, I tweaked my code to extract the proper metadata.

The next step was to clean my data. I first cleaned out all extraneous symbols like quotes and commas, in addition to placing names in the correct first name last name order. Then I sorted the data alphabetically and manually inspected it for possible typos or shared names that would indicate duplicates.

My ultimate goal was to create a network visualization. In order to accomplish this I need a list of edges and nodes. To get all of the nodes regardless of which online collection I got them from, I iterated through my data to get a list of unique names. I also wrote a code that would identify names that appeared in more than one repository, so I could indicate their prevalence in the mail art community. To get a list of edges, I needed every instance of a mail artwork being sent to be its own line. To do this, I separated instances where one artwork was sent to multiple people into multiple individual entries. Then I combined all of these edges from the three digital collections I scraped into one master CSV.

I first attempted to use Gephi to create my visualization, which was useful for organizing my edges and for performing statistical analysis. I then migrated my network into Cytoscape so that I could manually adjust colors, sizes, and positions based on the connections I was seeing. Larger nodes indicated persons that had sent and received more artworks. Thicker edges indicated a larger amount of interactions between two particular nodes.

I worked with the understanding that I only had data from what mail-art is digitized and online. Mail Art that has made its way into institutions has come as donations from only a handful of people, so they will of course be at the center of many of the communities. Nevertheless, I made some interesting discoveries that came to light once the data was in visual form. In the future, I hope to cross-reference the network with information from other sources in order to add location data, gain more information on specific artists, track the evolution by date, and hopefully link to images of the art as well.