

INLS 560
Programming for
Information Professionals

Assignment 4

Chart Creation from Web Data

Due Sunday, July 21, end of day
20 points



UNC
SCHOOL OF INFORMATION
AND LIBRARY SCIENCE

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Create a Google Chart from Web data

Objective: To demonstrate your understanding of how to access web resources using the Python `urllib` library, and how to parse JSON data to extract meaningful data for visualization with Google Charts.

Develop a Python program that

- Reads JSON data from a web resource
- Parses (extracts) data of interest
- Uses this data to generate a web page containing a Google Chart

Use `genre_piechart_url.py` as an example of how to

- Define the HTML and JavaScript template for the web page that contains the chart
- Define the `description` and `data` for the Google `DataTable` using the Python library, `gviz_api`
- Create the HTML file containing the Google Chart
- Use the `urllib` and `json` libraries to open, read, and parse the contents of a URL containing JSON data

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Additional requirements

- The chart must include at least 10 data points, e.g., the pie chart for the Wake County restaurant locations displays 13 data points – one for each city
- Customize your chart with a title, dimensions, and colors
- You may not use JSON data from the Apple RSS Feed Generator, or the Jeopardy Questions JSON data.
- Include comments, descriptive variable and function names, and appropriate exception handling
- You may use any of the Google Charts, i.e., you are not restricted to the Pie Chart or Column Chart

Submitting your assignment

- Name your program: *your_last_name_web_chart.py*
- Rename your program file to *your_last_name_web_chart.py.txt* and email to me at [**jpboone@email.unc.edu**](mailto:jpboone@email.unc.edu)

NOTE: If you find a JSON data set that you want to use, but there is no URL to access the data, then you can download the file and host it on a web server. If you do not have an account on a server, let me know, and I will upload for you.