Final Project Design Document

Group Bulldogs - Sprint 4

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API Endpoint

http://23.20.185.39:5000/api/unstable

GitHub Repositories

https://github.com/TechnicFyre/augur-bulldogs
https://github.com/TechnicFyre/augur_view-bulldogs

Summary of Changes/Feature Developments

1. Convert visualization endpoints so they can return data
2. Create Google Charts using data returned by the API
3. Build well designed UI and UX experience

Final Project State

The webpage ended up including 8 Google chart redesigns of previous Augur-View charts, with a small number being unable to be redesigned. If the user hovers over information available in the charts it results in a tool tip, and one chart has corresponding caption.

Sprint 4 Final Issues

- We had trouble formatting all the charts to work well and be visually appealing for all screen sizes.
- We ran into the issue of not having enough data to create several of the graphs when certain repositories were evaluated.
- Several graphs including "Mean response times for pull requests" and "Average pull request duration" could not be implemented in the same format via google charts.

"Count of All Closed Pull Requests by Merged Status" could be implemented as a Google Material Chart, but being a Material Chart it couldn't be implemented into the webpage without conflicting with the other Classic Charts.

Requirements

Component	Priority	Requirement Name	Requirement Description
Usability	1	Text-Image Division	On the webpage, divide the text information generated from the graph images generated
Usability	3	Export Data	Allowing the user to export data to file formats (csv / pdf / docx)
Usability	4	Caching	Implement a better caching system to allow Augur-View to function faster
Interactivity	2	Details on Hover	Display details for different parts of the graph on hover, rather than displaying details in a fixed position on the graph (this causes the text to sometime overlap when there is small data)
Interactivity	3	Pagination	Alternatively (and more easily) paginate the results with hardcoded cutoffs and allow the user to click through
Interactivity	4	Alternate Formats	Offering alternate formats for certain charts, i.e., bar graph, pie chart
Interactivity	5	Sliders	Sliders to set limits on what data should be shown, for example a cutoff for repos with 95% completeness on pull requests
Readability	1	Page Layout	Ensuring the page is readable by the users and that the layout is sensible
Readability	1	Separate Graphs	Each graph is its own distinct element
Readability	3	Data Readability	Choose ideal graph type to display the data (or with alternate formats, the default format)

High Priority: 1   Low Priority: 5

Sprint 4 Final Screenshot