Project Plan Presentations Today
September 23, Anthony 1279

- Team AppDynamics
- Team Auto-Owners
- Team Dow
- Team Herman Miller
- Team Bosch
Project Plan
BizIQ Flow Map Using Sequential Analytics Data
The Capstone Experience
Team AppDynamics
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Functional Specifications

• Allow users to create Flow Maps representing distinct transactions
• These flows come from various types of data
• Transactions visualized in a way that individuals with differing levels of technical knowledge can understand.
• The main purpose of the visualizations is to monitor impact on end users.
Screen Mockup: View Flow Map

Flow Maps
- Unlock Door
- Start Car
- Lock Door

Start Car Edit

Sub Service

App Server
80ms

Router
80ms

Logic Layer
80ms

Car Head Unit
4000ms

Average: 5.2 s
Screen Mockup: Create New Flow Map
Screen Mockup: Flow Map Creation
Screen Mockup: Search A Flow Map
Design Specifications

- Development of a user interface that is easy to navigate
- Provide a way for users to create and save a flow map
- Generalize the application to any number of customers
- Search functionality for certain processes within transactions
Technical Specifications

- D3.js - creating flow maps
- HTML/CSS
- React
- AppDynamics Controller
  - ADQL – Query Database
- Node.js - back end
System Architecture

Biz IQ Flow Map Visualizer

Biz IQ JavaScript Backend

Controller
System Components

• Hardware Platforms
  ▪ iMacs

• Software Platforms / Technologies
  ▪ Node.js
  ▪ D3.js
  ▪ React
  ▪ AppDynamics Query Language (ADQL)
  ▪ AppDynamics APM and Analytics
  ▪ Github.com
Risks

- Dynamic Flow Map -- Priority: **High**, Difficulty: **Low**
  - Unable to create dynamic flow map using D3.js
  - Mitigation: Contact Google's team from last year.

- API Integration -- Priority: **High**, Difficulty: **Low**
  - Unable to integrate AppDynamics API with Node.js
  - Mitigation: Research API documentation and communicate with client.

- D3/React Compatibility -- Priority: **Medium**, Difficulty: **Medium**
  - Both DOM manipulators
  - Mitigation: Disabling DOM manipulation in React
Questions?