Visualize data with QuickSight 📊
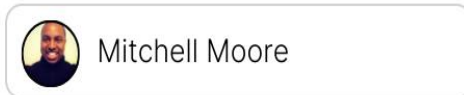
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Introducing Amazon QuickSight!

What it does & how it's useful

Amazon QuickSight is business intelligence tool at hyperscale. Developers and teams use Amazon QuickSight because it can meet varying analytic needs 😉 from the same source of truth through modern interactive dashboards, pixel-perfect reports, natural language queries and embedded analytics.

How I'm using it in today's project

I'm using Amazon QuickSight in this project to analyze the safest parts of Stockton to live in or to stay in 😊.

This project took me...

Overall from start to finish it took me about 15 days. Most of the time spent was on data collection, data modeling and data cleaning. Data modeling and data cleaning I had to optimize queries and formatting in python and sql. The technologies I used were python (pandas), Excel, SQL, and of course Amazon QuickSight.
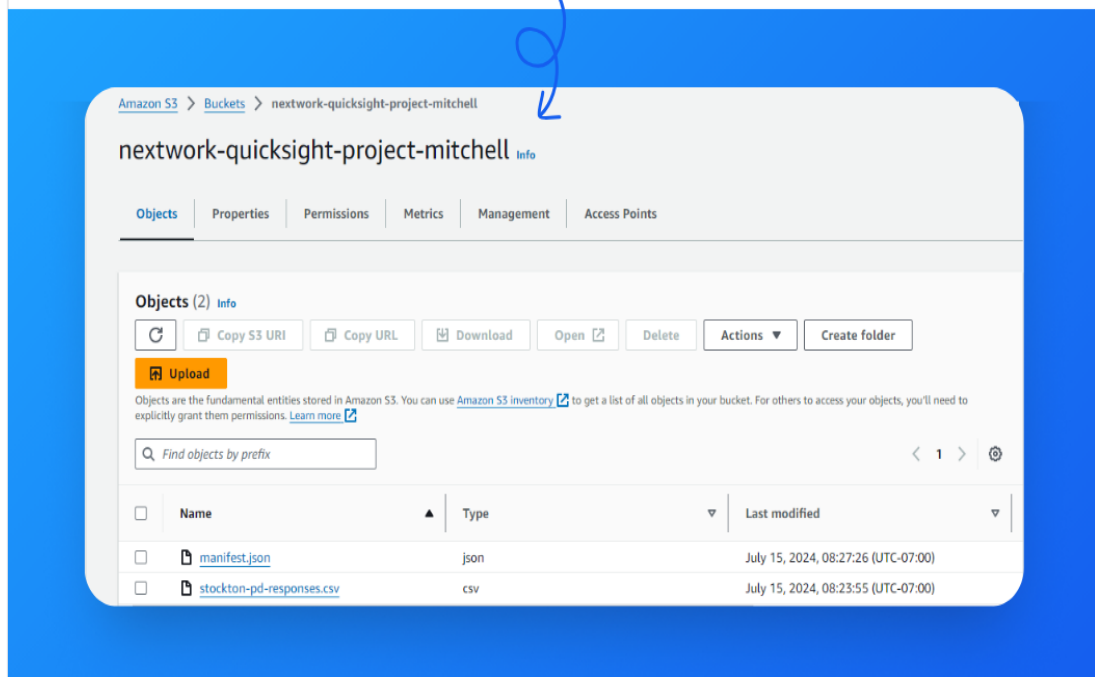
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Upload project files into S3

- S3 is used in this project to store my dataset and manifest.json file.

- I edited the manifest.json file by updating the s3 URI of my dataset. It is important to edit this file because keeping an outdated s3 URI means that manifest.json would be directing to the wrong address.

Here's my bucket with the CSV file and manifest.json!

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Connect S3 + QuickSight

- I connected the S3 bucket to QuickSight by uploading the manifest.json file.

- The manifest.json file was important in this step because it points to my dataset.

Entering the manifest.json URL.

New S3 data source   ×

Data source name

Stockton County

Upload a **manifest file**   ● URL ○ Upload

s3://nextwork-quicksight-project-mitchell/manifest.json

Connect

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Create QuickSight account

- It is free to make a QuickSight account (the free trial lasts for 30 days).

- Creating a QuickSight account took me about two minutes to setup and wait for account creation.

- I also had to enable QuickSight's access to S3 because my dataset is stored S3 buckets - and specific access to that bucket is required for QuickSight to process that data.

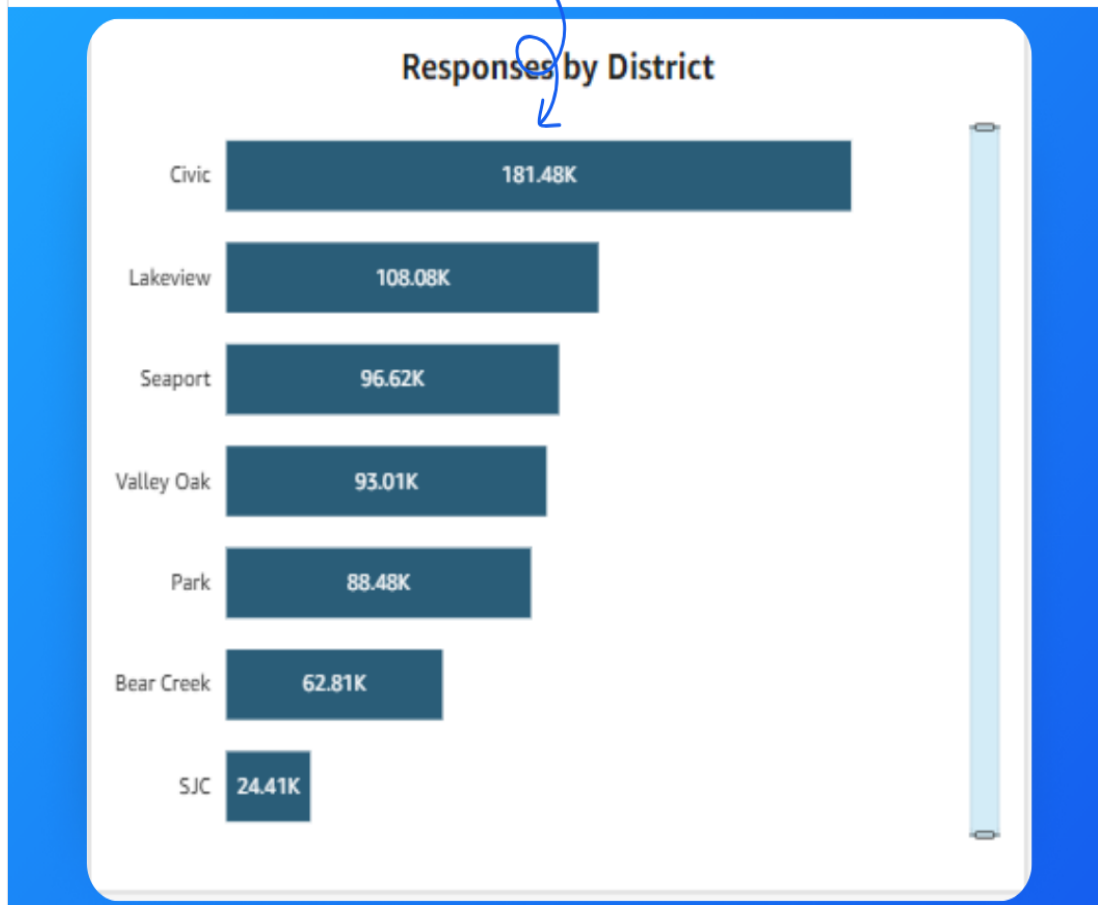Voila! I created my QuickSight account successfully.
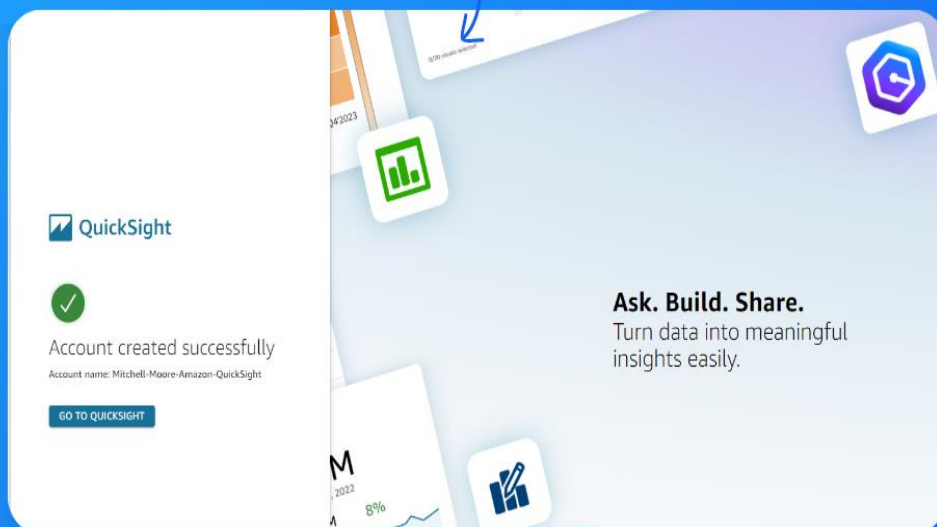
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Let's make visualisations!

- To create visualisation on QuickSight, you'll have to drag relevant fields into the QuickSight dashboard's AutoGraph space.

- The chart shown here is a breakdown of Responses by District which tells us which district receive the most calls.

One of my first visualisations.

Responses by District

District	Responses
Civic	181.48K
Lakeview	108.08K
Seaport	96.62K
Valley Oak	93.01K
Park	88.48K
Bear Creek	62.81K
SJC	24.41K

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Using filters

- Filters are useful for specifying the exact subset of data that you are wanting to analyze - effectively excluding any irrelevant data.

- Here I added a filter by date. This helped me create a visualisation on date of district responses count based on the districts by name.

A visualisation set up after adding filters.
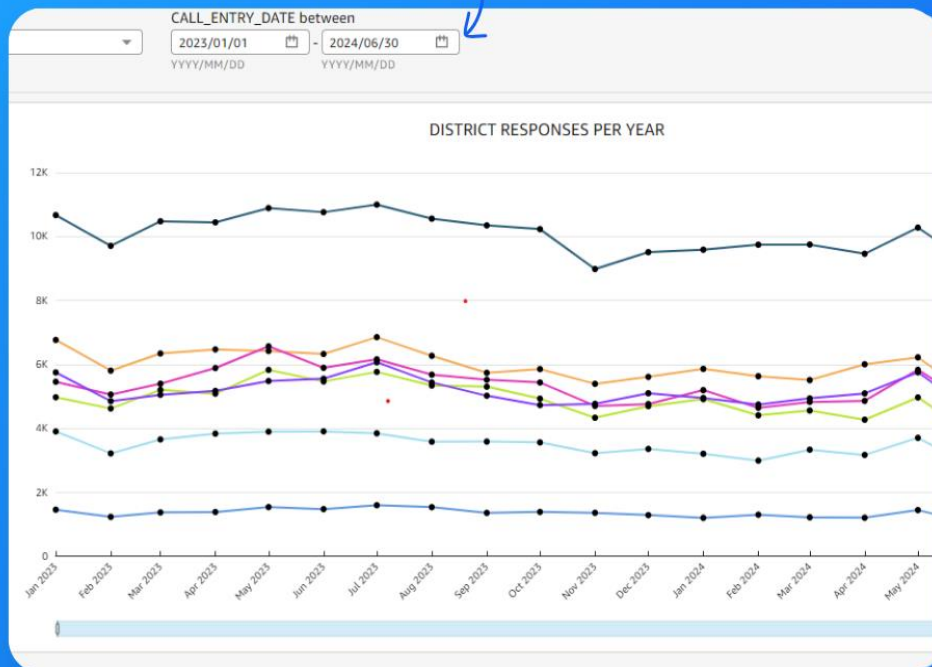
Your Name
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Set up your dashboard!

- As a finishing touch, I edited titles of my graphs so that the purpose of each chart is clear to the reader.

- Did you know you could export your dashboard as PDFs too? I did this by going file and export to PDF.

Voila! Here's the finished dashboard!
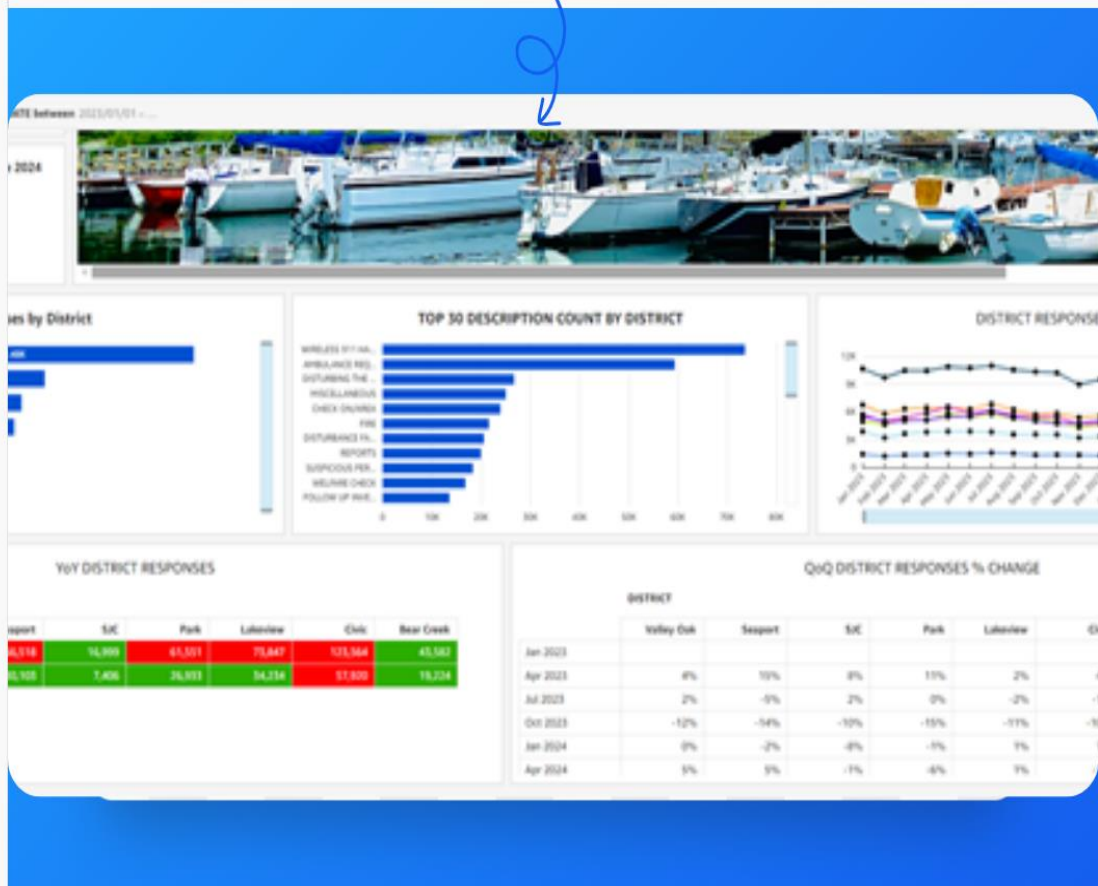
Your Name
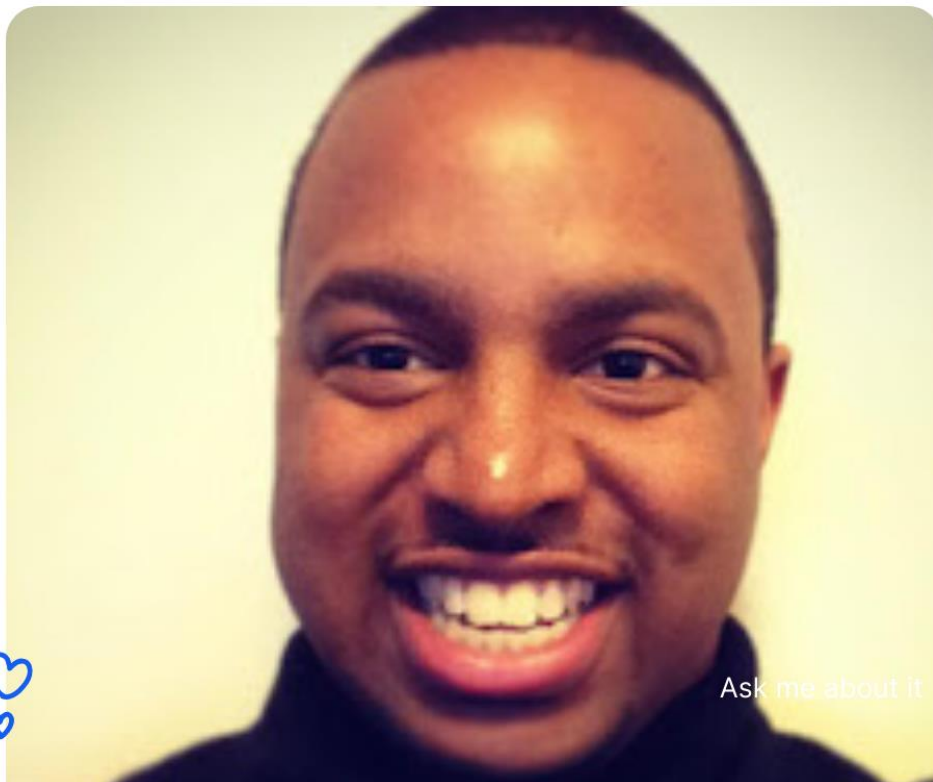https://www.linkedin.com/in/mitchellmoorejr   NextWork.org

My key learnings

1. An S3 bucket was used in this project to store my dataset which was in CSV format.

2. To connect the data stored in S3 with QuickSight, I had to create a manifest.json file to link to it.

3. [How did you find creating visualizations on QuickSight? Creating visuals on QuickSight was very straight forward. I have some experience with using Tableau and Power BI, so I felt productive right away 😁.

4. One thing I didn't expect was how little setup it was to get up and running. Although good documentation was key to clue it all together.

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Ask me about it