California
GovOps
Agency App:

ReliefCal







**App Description:** It is a user-forward mobile app that easily directs
California residents to the nearest disaster relief resource!

### **Outline**

- . Problem Statement
- II. User Research
- III. Data Collection
- IV. Backend Cerebras and Google API
- V. User Interface Flutter











### **Problem Statement**

- Disaster relief resources are important in providing physical and mental care to those affected by the consequences of natural disasters
- However, finding these resources can be difficult for the general public
- Most of the time, a user doesn't even know where and what to start looking for
- We want to provide users a friendly and accessible way to search for disaster relief resources around them, which includes police stations, food banks, and homeless shelters, vendors with women products, etc.



# **User Data Collection**

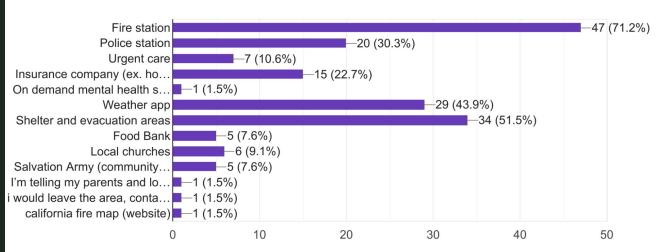
- We created a google form to gather user data within HackDavis and the UC Davis student community
- Gain a broader perspective of people's needs during a fire natural disaster to ensure culturally and demographically sensitive fire recovery response
- Total Responses: 64



## Pre fire disaster (warnings)

Scenario: a fire is coming near your area and you just received a warning. what resources would you contact?

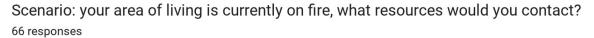
66 responses

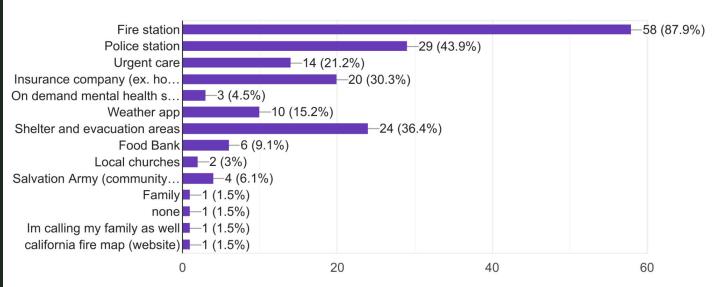


Top 3: Fire station, Police station, Shelter and evacuation areas



# **During Fire Disaster**

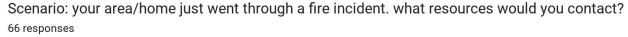


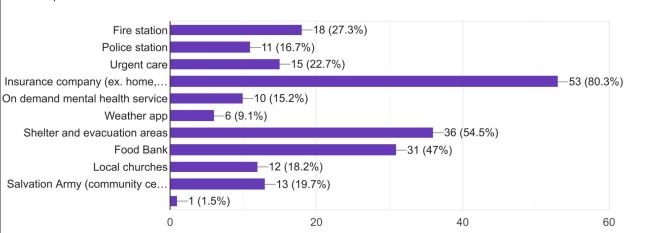


Top 3: Fire station, Police station, Shelter and evacuation areas



## **Post Fire Relief**



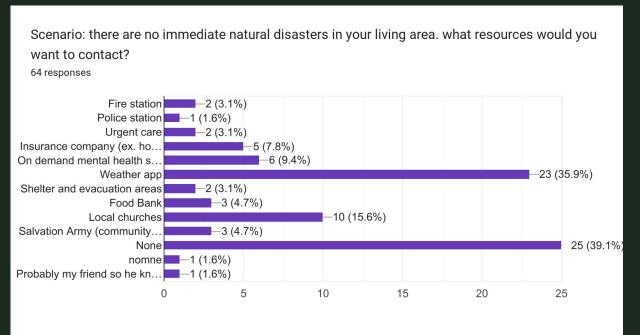


Top 3: Insurance Company, Shelter and evacuation, Food bank





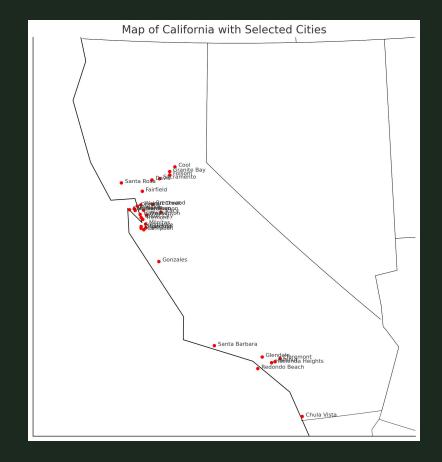
## No natural disaster



Top 3: None, Weather app, Local churches



#### **Survey Locations in California**





- 43 Unique cities
- 58 California cities





## **Data Collection**

- Since the app is to direct users to disaster relief resources, we needed to gather online resources
- Multiple data sources
  - Csv file from data.ca.gov
    - Women's resources
    - Hospital buildings
  - Google Maps API
    - Fire stations
    - Police stations
    - Salvation Army
    - Red Cross





# **Back End Design - Python**



**Data Sources** 

Data Ingestion and Processing using Cerebras Inference API

Cleaned output in JSON format

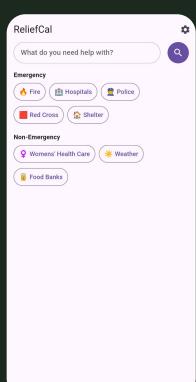


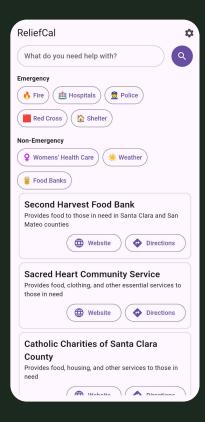


## Front End Design - Dart



- Location specific
- Lists nearby resources
- Sorts resources into easy to find buttons









# LIVE DEMO





# THANK YOU!

