



Summary

Multi-Jurisdictional Hazard Mitigation Plan Survey

As part of Santa Clara County’s (County) Multi-Jurisdictional Hazard Mitigation Update, an online survey was provided to the community. The County received 575 responses to questions surrounding the community’s experiences, knowledge, and concerns with hazards in the region. The following summarizes the results of the survey.

Demographics

The following section describes the socio-demographic characteristics of the survey respondents. This information may be beneficial for the County to understand if they are reaching a representative sample of the County residents.

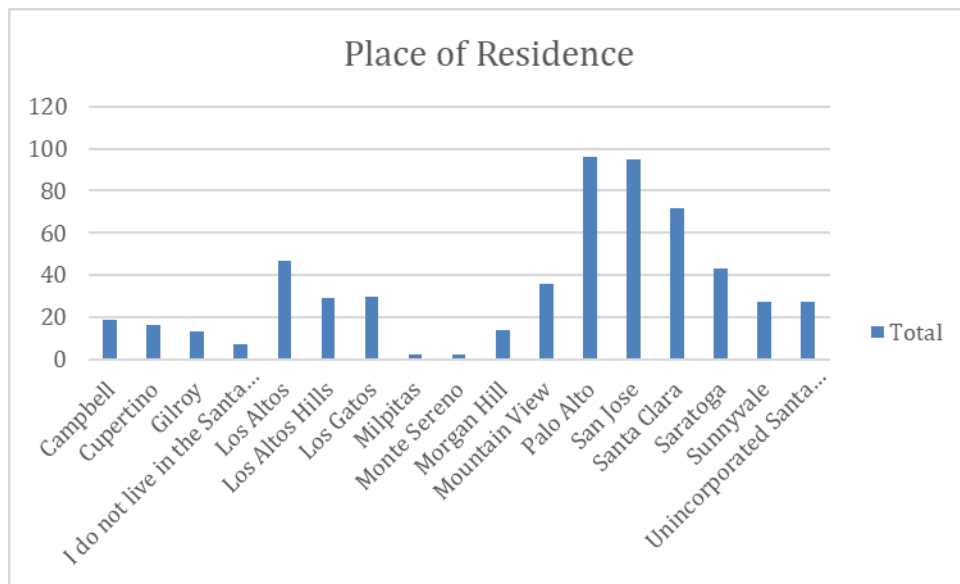


Figure 1. Place of residence

As illustrated in Figure 1, 46 percent of respondents were from the City of Palo Alto, San Jose, or Santa Clara.

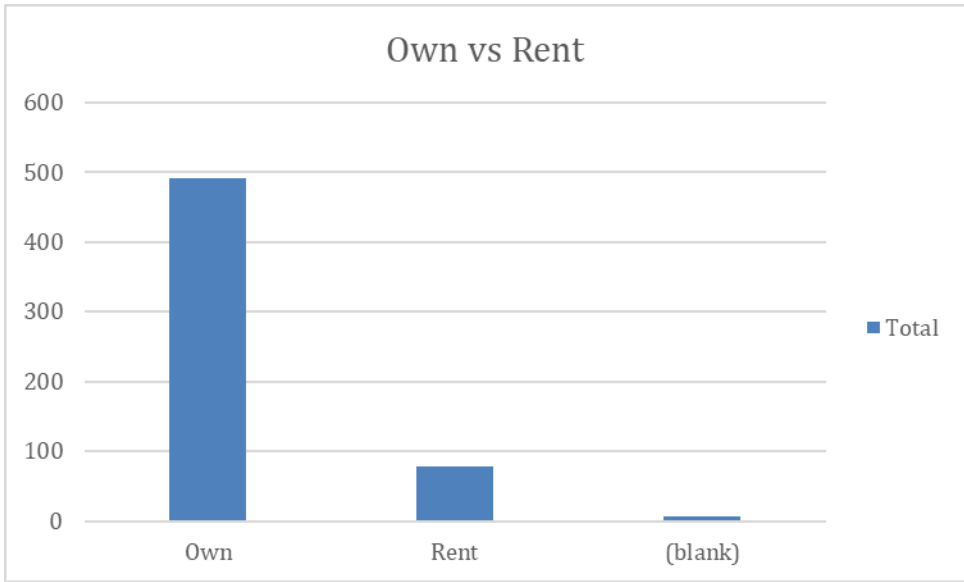


Figure 2. Owner vs rent

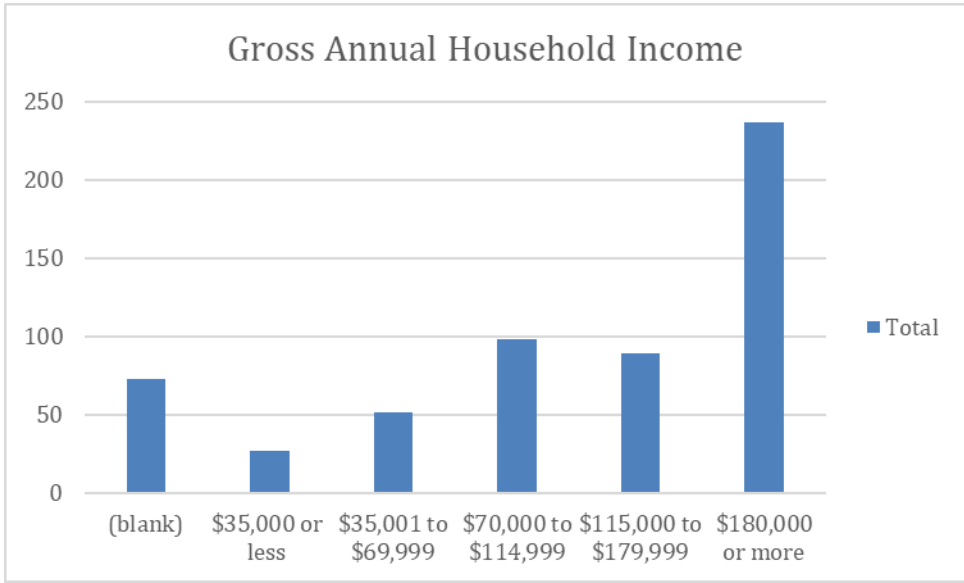


Figure 3. Gross annual household income

Over 85 percent of respondents own their own home (Figure 2) and 57 percent of respondents reported an annual household income of greater than \$115,000 (Figure 3). According to the U.S. Census, the median household income in Santa Clara County was \$153,792 in 2022. While the respondents appear to represent the median income for the region, Santa Clara County may explore further whether the survey fully represents the socio-demographics of the community.

The respondents were primarily English speakers, with Chinese, Tagalog, Vietnamese, Spanish, Korean, Khmer, Konkani, French, Gujarati, and Bengali also represented.

Natural Hazard Awareness

This section describes survey respondent awareness of the potential for hazards near where they live. The information may be used by the County to assist in targeting communication surrounding hazards relevant to the community.

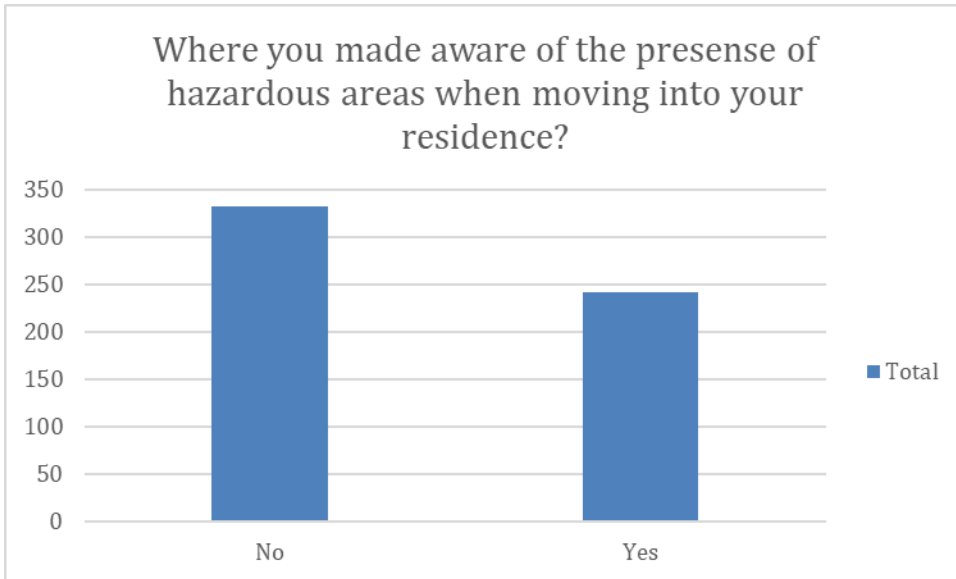


Figure 4. Awareness of hazard when moving into residence

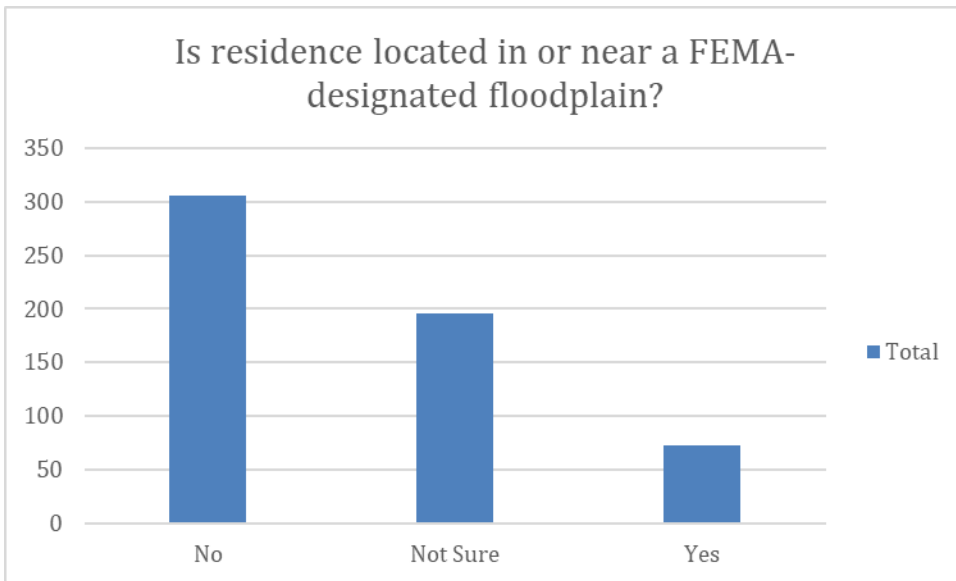


Figure 5. Awareness of FEMA floodplain

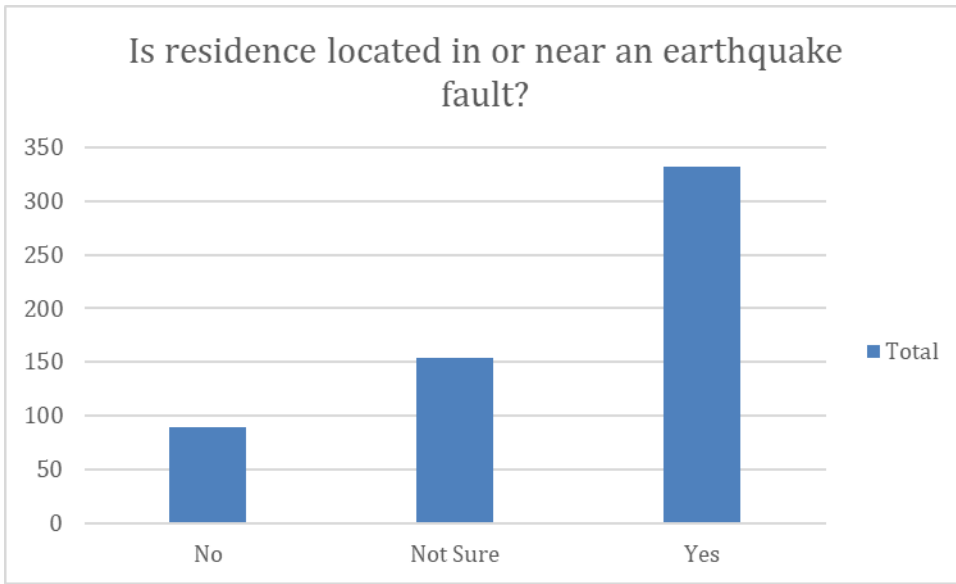


Figure 6. Awareness of earthquake fault

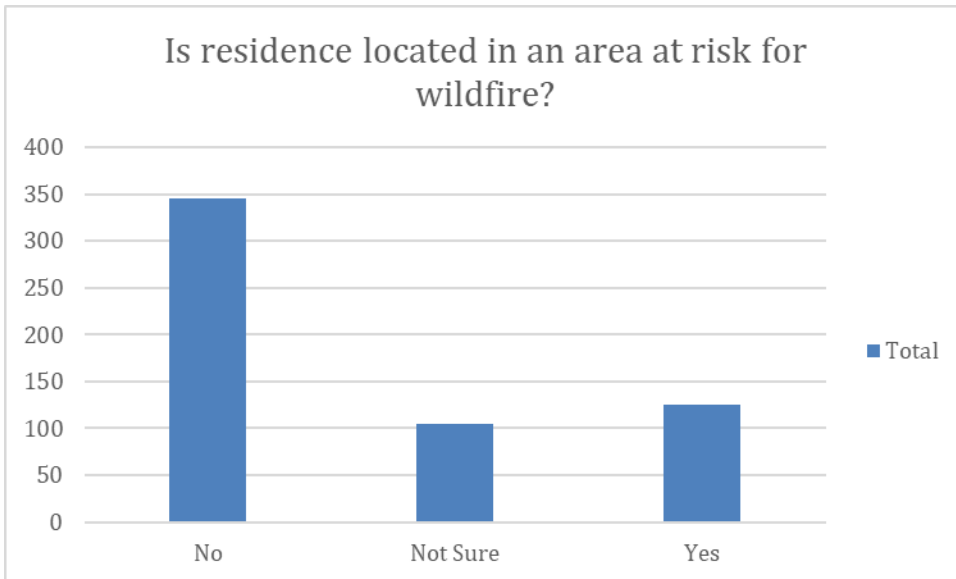


Figure 7. Awareness of wildfire

While approximately 2/3 of residents knew if they were located in or near a FEMA-designated floodplain, the remaining 1/3 responded as “Not Sure” (Figure 5). The same pattern exists for awareness of earthquake faults (Figure 6) and to a lesser extent for wildfire (Figure 7). As a large share of residences did not receive information regarding potential natural hazards near their residences at the time they move in (Figure 4), the community may benefit from communication educating them about location of natural hazards in Santa Clara County.

Respondents indicated that over the past 20 years, they have been impacted by a range of natural hazard events including extreme heat, flood, wildfire and poor air quality, atmospheric rivers, fog, ice and snowstorms, pandemic, earthquakes, and terrorism.

Natural Hazard Concerns

This section summarizes the level of concern survey respondents have for specific natural hazards.

Change in Precipitation and Temperature

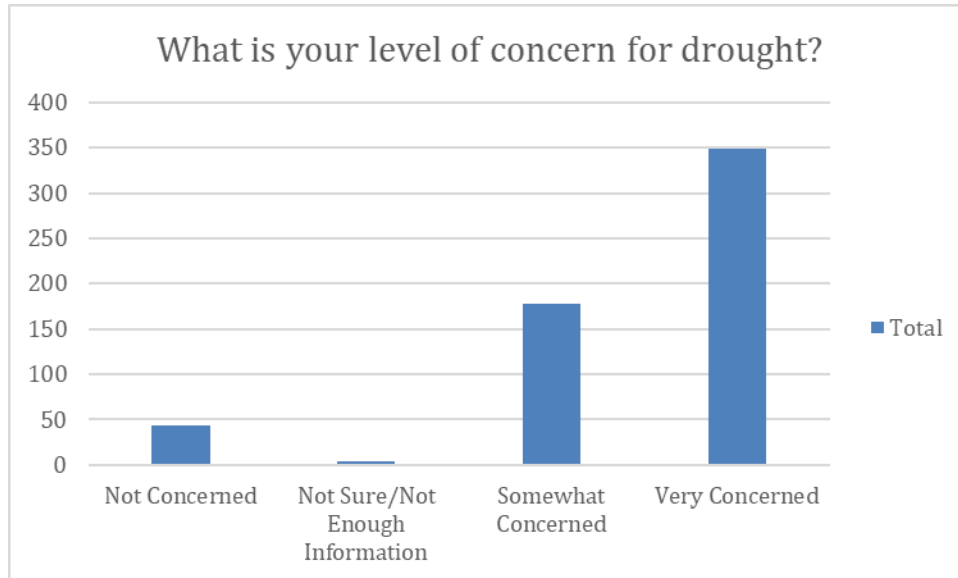


Figure 8. Level of concern for drought

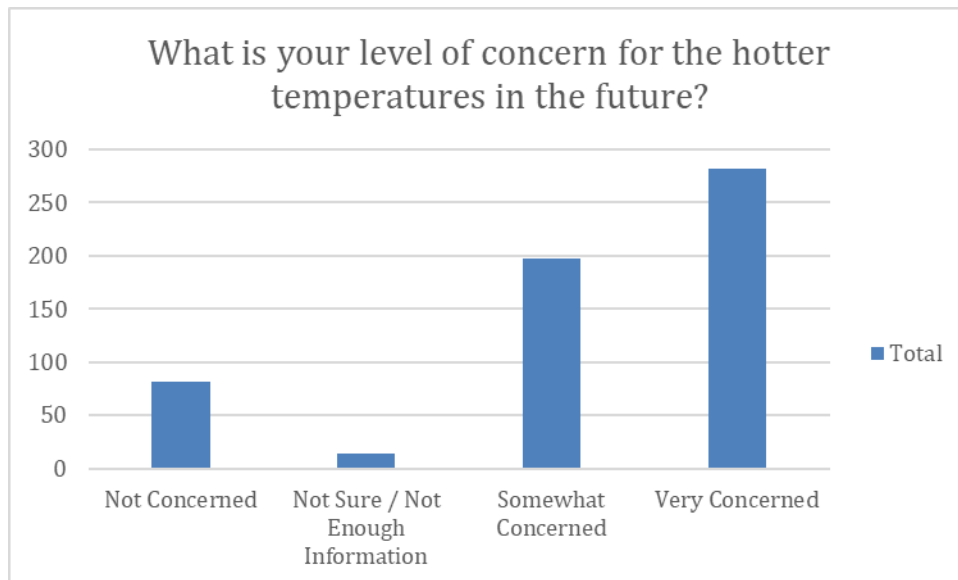


Figure 9. Level of concern for hotter temperatures

The respondents revealed a great level of concern for drought conditions and potentially hotter temperatures in the future. While drought conditions may have diminished as a result of rainier weather in late 2023 and early 2024, water conservation is still an important strategy to hedge against drought. The concern over hotter temperatures reflects the past decade of extreme heat events in the State and Santa Clara County.

Seismic Hazards

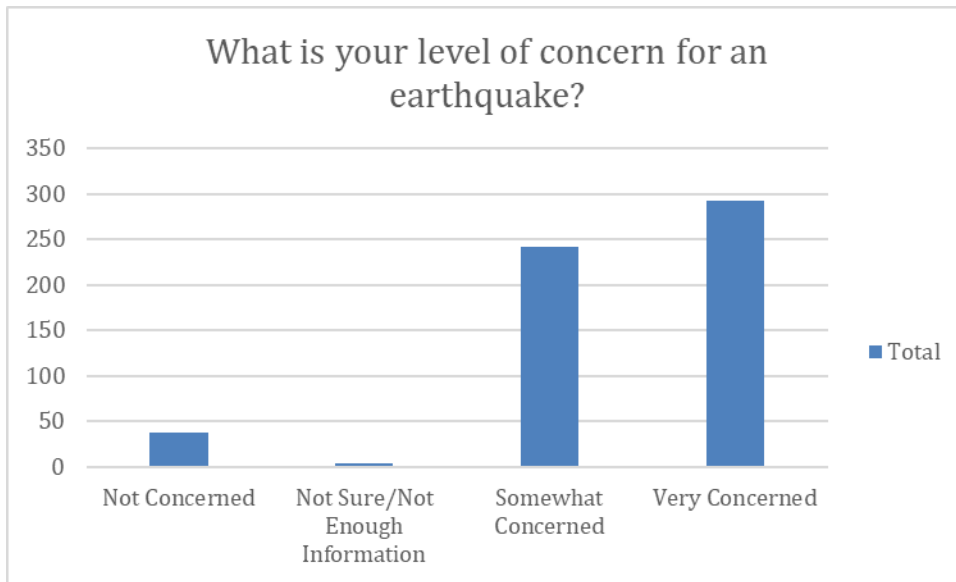


Figure 10. Level of concern for earthquake

As over 2/3 of respondents indicated they live near an earthquake fault (Figure 6), the level of concern over an earthquake event occurring corresponds to resident location as shown in Figure 10.

Flood Hazards

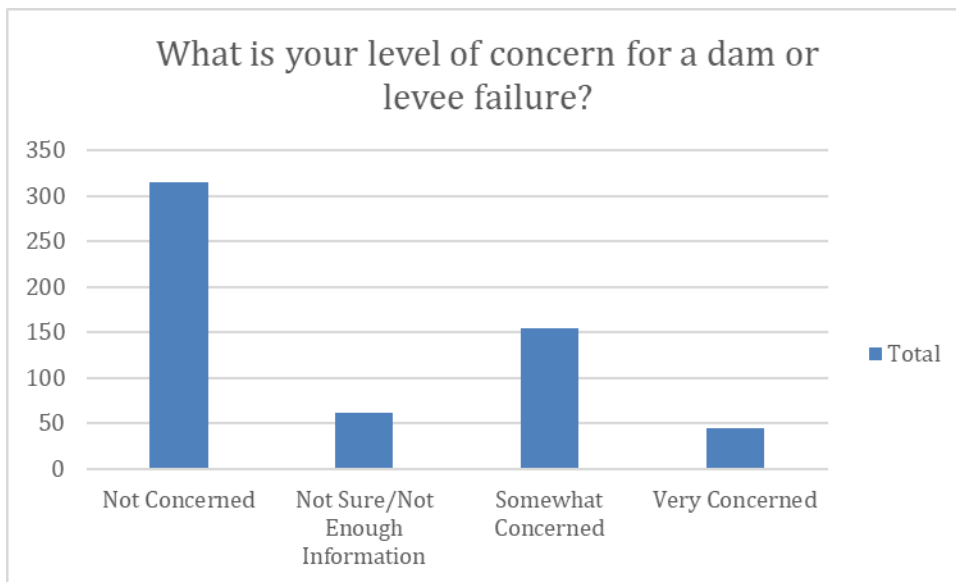


Figure 11. Level of concern for dam or levee failure

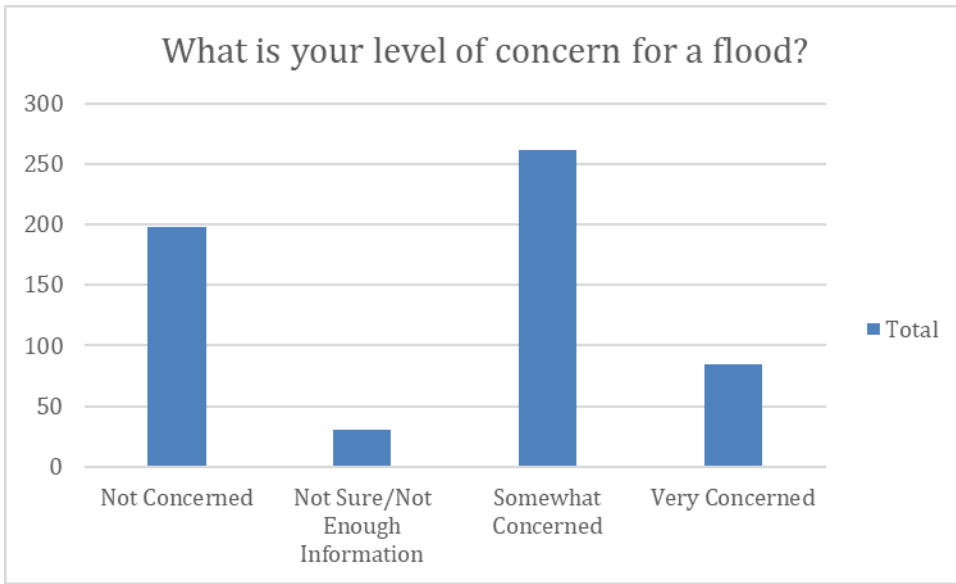


Figure 12. Level of concern for flood

Respondents were generally less concerned about a dam or levee failure. Those that were “Very Concerned” about flooding lived throughout the County. As the areas in and south of the City of Gilroy are within the FEMA 100-year and 500-year flood zones, the County may emphasize communication and education with residents and businesses in this area.

Wildfire and Associated Smoke Hazards

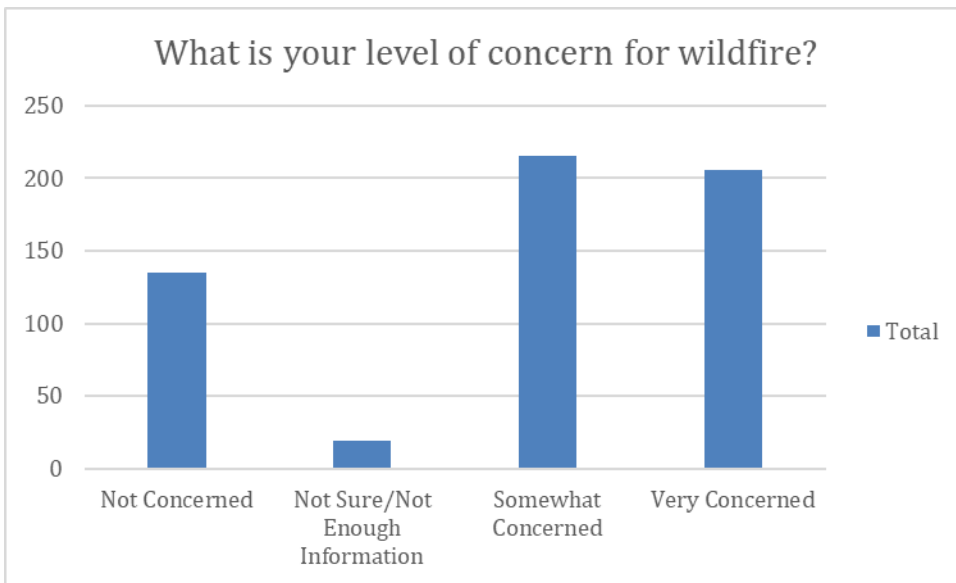


Figure 13. Level of concern for wildfire

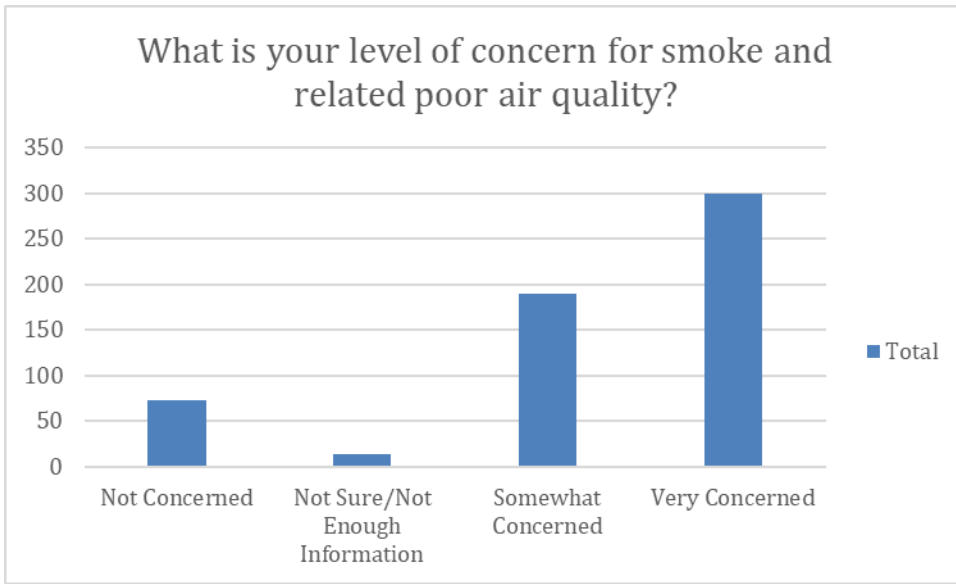


Figure 14. Level of concern for smoke and poor air quality

Respondents provided a range of concerns regarding wildfire (Figure 13). This is consistent with the awareness of the risk of wildfire on their residences (Figure 7). The concern over poor air quality related to wildfire smoke was high regardless of the respondent’s location in the county (Figure 14). As wildfire smoke is less constrained by geography, the level of concern is consistent with the threat.

Severity and Frequency of Hazardous Events

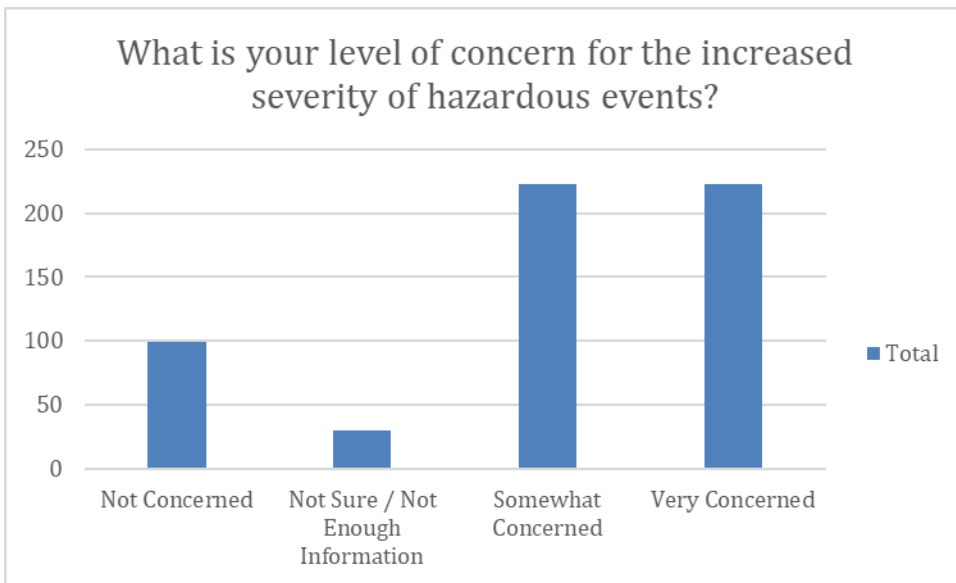


Figure 15. Level of concern for increased severity of hazardous events

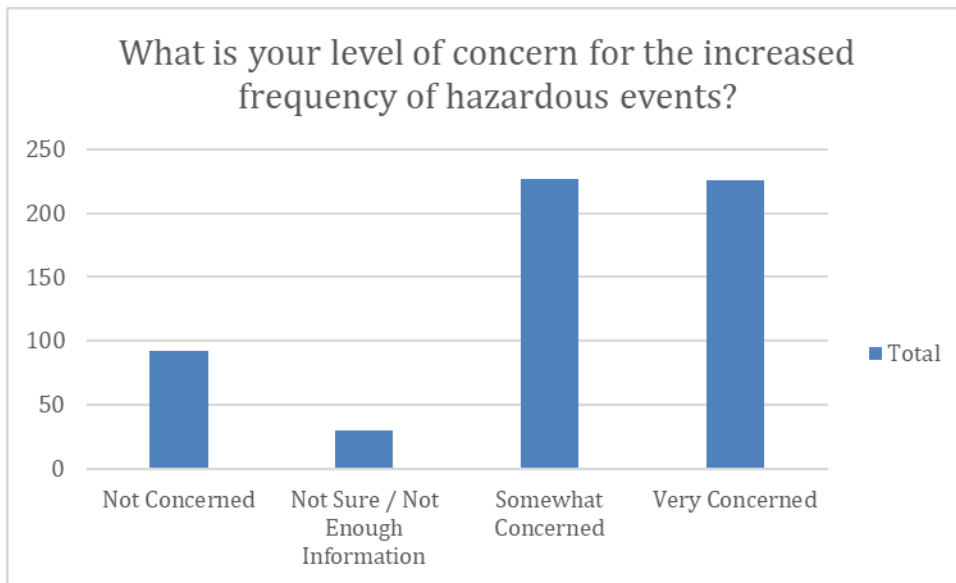


Figure 16. Level of concern for increased frequency of hazardous events

As illustrated in Figure 15 and Figure 16, the majority of respondents were concerned about the increase in the severity and frequency of hazardous events. Those respondents that are concerned about the increase in the severity were the same respondents concerned about the increase in frequency.

Hazard Planning (County)

While respondents were generally less aware of mitigation projects in their community (13 percent were aware), respondents support planning and implementation of hazard mitigation actions to reduce the loss of life and property from future disaster events, including:

Preparation and Planning

- Developing community groups to support vulnerable populations before, during, and after a disaster event
- Incorporating equity considerations into hazard mitigation project priorities
- Funding studies to understand risk and develop mitigation recommendations
- Holding public education/outreach events on mitigation
- Sharing the draft Hazard Mitigation Plan through social media for public comment
- Prioritizing repetitive loss structures when funding hazard mitigation projects including acquisition, relocation, and mitigation reconstruction
- Equipping critical facilities with emergency power sources

Drought

- Identifying alternative water supplies for times of drought
- Incorporating drought-tolerant plants into public landscaping
- Incorporating drought-tolerant plants into public landscaping

Seismic

- Conducting seismic retrofitting for critical public facilities most at risk to earthquakes 2
- Supporting financial incentives such as low interest loans for home or business owners who retrofit their structures to reduce risk
- Providing technical information and guidance to the public on building in areas with landslide risk
- Adopting higher regulatory standards for new development within unstable slope areas

Severe Weather

- Trimming trees back from power lines to reduce potential severe storm impact
- Engaging in green methods of reducing the heat island effect in urban areas

Wildfire + Smoke

- Becoming a Firewise community
- Creating and maintaining defensible space around structures and infrastructure to reduce wildfire risk

Flood

- Adopting and enforcing more stringent building codes, such as requiring additional elevation of properties in high-risk flood zones
- Retrofitting or relocating critical facilities in dam failure inundation areas
- Supporting open space land use as a way to reduce risk from hazards like flooding
- Utilizing tsunami mapping to guide development away from high-risk areas
- Considering the residual risk associated with dams in future land use decisions

Hazard Mitigation (Individual)

Additionally, 17 percent of respondents have taken action to mitigate hazards on their property. These actions were primarily intended to reduce wildlife hazards (e.g., brush and tree management), reduce water consumption (e.g., install drought tolerant plants, or seismic hazards (e.g., earthquake retrofits). Approximately 15 percent of respondents indicated an interest in learning more about potential hazard mitigation actions.