MEMORANDUM REPORT

DATE: January 5, 2026

TO: Board of Commissioners of the Los Altos Hills County Fire District

FROM: Mora-Summerhill Project Team,

Harmon, Field Manager

Eugenia Woods, Programs, Planning and Grants Manager

SUBJECT: Mora-Summerhill Evacuation Route Project Final Reports

RECOMMENDATION:

Receive Mora-Summerhill Evacuation Route Project Final Reports

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BACKGROUND

The Los Altos Hills County Fire District (District or LAHCFD) 2023–2027 Strategic Plan Goals and Strategies identify Strategic Goal 1: Prevention, Protection, and Resiliency**,** which focuses on funding, developing, and maintaining programs that protect life and property while enhancing community safety and wildfire resilience. Evacuation Route Hardening is a core initiative under this goal and is implemented through the District's Integrated Hazardous Fuel Reduction (IHFR) programs**,** as outlined in the LAHCFD Chart of Services and supported by the Community Wildfire Protection Plan (CWPP)**,** including Annex 4**.**

Annex 4 of the CWPP identifies evacuation routes as critical life-safety infrastructure and prioritizes their maintenance to ensure safe ingress and egress for residents and first responders during wildfire and other emergency events. Evacuation route treatments are designed to address wildfire-specific risk factors, including roadside ignition potential, fuel continuity, reduced sight distance, and constrained roadway geometry common within the Wildland Urban Interface.

LAHCFD's evacuation route maintenance program is guided by established fire science principles, including the reduction of fine fuels and ladder fuels adjacent to roadways, the mitigation of radiant heat exposure, and the preservation of a shaded fuel break effect where appropriate. These principles are informed by wildfire research and post-

fire analyses demonstrating that reducing low and mid-level vegetation near evacuation corridors can slow fire spread, improve visibility, and increase survivability for evacuating residents and responding personnel.

The Mora–Summerhill Evacuation Route is a high-priority corridor within the southern portion of Los Altos Hills and serves as a critical evacuation route for residents, emergency responders, and recreational users accessing adjacent open space areas. Mora Drive and Summerhill Avenue provide essential ingress and egress for this area, including connectivity to trailheads associated with Rancho San Antonio County Park and Open Space Preserve. During a wildfire or other emergency incident, these routes may be relied upon not only by vehicular traffic but also by pedestrians evacuating on foot.

The project length is located entirely within District boundaries and received hazardous fuel reduction treatment consistent with IHFR program standards. Vegetation management along the corridor significantly improved roadway visibility, pedestrian clearance, and overall travel safety while maintaining an aesthetically appropriate roadside condition compatible with the surrounding community character.

Information about this project, as well as other District wildfire mitigation and evacuation route projects, is available on the District website at:
https://www.lahcfd.org/community-projects/

DISCUSSION

The Mora–Summerhill Evacuation Route Maintenance Project was implemented to maintain the effectiveness of prior hazardous fuel reduction treatments along a designated, high-priority evacuation corridor. As vegetation regrows over time, periodic maintenance is required to prevent the reestablishment of hazardous fuel continuity, preserve roadway and intersection visibility, and sustain safe ingress and egress for residents, emergency responders, and pedestrians during wildfire and other emergency events.

This District Final Report is provided to document project implementation, summarize outcomes, and present actual treatment extents and costs. The Santa Clara County FireSafe Council Final Report for the Mora–Summerhill Evacuation Route Maintenance Project is included as an attachment and provides contractor-managed project details and supporting documentation. A Post-Treatment Unmanned Aircraft Systems (UAS) Report is also included as an attachment and provides independent, data-driven verification of vegetation condition and treatment outcomes.

The UAS post-treatment analysis covers the maximum potential project area identified in the California Environmental Quality Act (CEQA) exemption, the Scope of Work, and the maximum projected area eligible for Right of Entry participation. As is typical for

evacuation route projects, the actual area treated may be less than the maximum projected area due to factors such as Right of Entry participation, slope constraints, fencing, utilities, and site-specific limitations. This District report reflects the actual areas treated and is intended to clarify the relationship between projected and implemented treatment extents.

The project represents a coordinated maintenance effort along a connected evacuation route network comprised of Mora Drive, Ravensbury Avenue, Magdalena Avenue, and Summerhill Avenue. These roadway segments function collectively as a single evacuation corridor, and untreated or inadequately maintained segments can reduce the effectiveness of adjacent treated areas during an emergency. Maintenance activities focused on vegetation regrowth, fine fuels, and sight-distance obstructions while retaining healthy overstory canopy where appropriate to support shaded fuel break conditions.

Project planning and implementation emphasized life-safety outcomes, including improved roadway and intersection visibility, pedestrian clearance, and reduced roadside ignition potential. Treatments were conducted consistent with applicable local codes governing sight distance and roadway safety, reinforcing both wildfire mitigation objectives and everyday traffic safety.

Strategic partnerships were integral to successful project implementation. Coordination occurred with the Town of Los Altos Hills, Santa Clara County Fire Department, Santa Clara County Roads and Airports, Caltrans, adjacent open space agencies, and other partners as applicable. The project was completed without injuries or traffic-related incidents, reflecting effective planning, interagency coordination, traffic control, and daily safety briefings.

QUANTITATIVE RESULTS and EXPENSES

Quantitative Results:

The Mora–Summerhill Evacuation Route Maintenance Project was successful in achieving the District's objective of reducing hazardous vegetation to support safer evacuation and emergency response conditions along a high-priority evacuation corridor.

The Santa Clara County FireSafe Council Final Report for the Mora–Summerhill Evacuation Route Maintenance Project is included as an attachment and provides contractor-managed project details and supporting documentation. A Post-Treatment Unmanned Aircraft Systems (UAS) Report is also included as an attachment and provides independent, data-driven verification of post-treatment vegetation conditions.

Post-treatment UAS analysis evaluated vegetation conditions across the maximum potential project area defined by the California Environmental Quality Act (CEQA)

exemption, Scope of Work, and maximum projected Right of Entry participation. This analysis area is larger than the actual treatment footprint and is used for condition assessment and verification purposes only. Actual treatment metrics reported by the District reflect field-verified work completed along the evacuation route corridor.

Based on operational tracking and field verification, the Mora–Summerhill Evacuation Route Maintenance Project achieved the following treatment results:

PROJECT WORK TRACKER

Mora - Summerhill

Total Weeks Worked	Total Days Worked	Treatment Dates
1	1	Monday, September 29, 2025
	2	Tuesday, September 30, 2025
	3	Wednesday, October 1, 2025
	Off	Thursday, October 2, 2025
	4	Friday, October 3, 2025
2	5	Monday, October 6, 2025

Due to the weather, work was canceled on Thursday October 2nd, 2025.

Totals for the Treated Area Per Day

Linear Milage Treated	Linear Footage Treated	Average Depth Treated	Total Square Footage Treated	Total Acreage Treated	Cubic Yards of Chipped Material
1.13	5962.09	5.39	32142.86	0.74	10.00
2.05	10809.83	4.76	51428.57	1.18	16.00
1.39	7328.35	8.77	64285.71	1.48	20.00
1.72	9090.09	8.84	80357.14	1.84	25.00
6.29	33190.36	<-- Weekly Totals -->	228214.29	5.24	71.00
1.23	6508.92	4.94	32142.86	0.74	10.00
1.23	6508.92	<-- Weekly Totals -->	32142.86	0.74	10.00

Acreage Information Totals

Total Linear Miles Treated	Total Linear Footage
7.52	39699.28

Average Linear Miles Treated Per Day	Average Linear Footage Treated Per Day
0.75	7939.86

Total Square Footage	Total Square Acerage	Total Cubic Yards
260357.14	5.98	81.00

Average Square Footage Treated Per Day	Average Square Acerage Treated Per Day	Avrage Cubic Yards Per Day
28928.57	0.60	16.20

- Total linear miles treated: 7.52 miles
- Total linear footage treated: 39,699.28 feet
- Total square footage treated: 260,357.14 square feet
- Total acreage treated: 5.98 acres
- Total cubic yards of chipped material: 81.00 cubic yards

Daily production averages included approximately 0.60 acres treated per day and 16.20 cubic yards of chipped material per day. Treatment activities focused on reducing fine fuels and ladder fuels adjacent to the roadway, improving roadway and intersection visibility, and maintaining pedestrian clearance while retaining healthy overstory canopy where appropriate.

The UAS analysis further assessed vegetation condition and moisture using NDVI and GNDVI indices, confirming reduced fuel continuity and post-treatment conditions consistent with evacuation route maintenance objectives.

Expenses:

Costs associated with the Mora–Summerhill Evacuation Route Maintenance Project reflect expenditures incurred directly by the District to support project planning, implementation, traffic control, environmental review, outreach, and post-treatment verification.

District-incurred expenses included Integrated Hazardous Fuel Reduction (IHFR) project management, personnel mileage, project supplies and reimbursements, traffic control planning and implementation, vegetation treatment activities, biological surveying, public outreach materials, and pre- and post-treatment Unmanned Aircraft Systems (UAS) data collection and analysis.

The total project cost incurred by the District for the Mora–Summerhill Evacuation Route Maintenance Project was $104,388.46**.**

Detailed cost documentation and contractor expenditures are maintained as part of the project record and are summarized in the Santa Clara County FireSafe Council Final Report.

Mora - Summerhill Evacuation Route

Project Cost Breakdown

Service Description	Contractor	Completed	Amount	Notes
IHFR Project Management	SCCFSC	Jul-Oct 2025	15,016.57	
Personnel Mileage	SCCFSC	Sept 2025	123.38	Included 25% uplift
Project Supplies				
Project Supplies Reimbursement (LAHCFD)	Credit card purchases	Jul-25	120.23	Signage
Traffic Control Plan	City Rise	Jul-25	2,240.00	$2,000 + 12% uplift
Traffic Control Contractor	Statewide	Sept & Oct 2025	29,526.00	$26,362.50 + 12% uplift
Fuel Reduction	Huertas	Oct-25	39,032.00	$34,850 + 12% uplift
Biological Servey	Dudek	Sep-25	5,346.32	$4773.50 + 12% uplift
Postcard, Cover Letters, & ROE Mailers	Folger Graphics	Aug & Oct 2025	1,845.96	
Pre-Project UAS Flyover/Data	Jackson Ricketts	July & Sept 2025	5,575.00	
Post-Project UAS Flyover/Data	Jackson Ricketts	Nov & Dec 2025	5,563.00	
Total Project Cost			**104,388.46**	

SUCCESSESS

The Mora–Summerhill Evacuation Route Maintenance Project achieved several notable successes that reinforce the effectiveness of the District's evacuation route hardening and maintenance program.

Unmanned Aircraft Systems (UAS) were again successfully utilized to support project planning and post-treatment verification. Pre- and post-treatment aerial data provided valuable insight into vegetation conditions, treatment effectiveness, and corridor-wide fuel continuity. Imaging and analysis supported evaluation of low, medium, and high vegetation classes and confirmed reductions in hazardous fuels adjacent to the evacuation route. The use of UAS technology continues to strengthen the District's data-driven approach to wildfire mitigation and evacuation route maintenance.

The project was implemented efficiently and without injuries or traffic-related incidents. Daily safety briefings, clearly defined traffic control measures, and close coordination

among vegetation crews, traffic control providers, and District staff contributed to a safe and orderly operation within active roadways.

Operational coordination among project partners was another key success. The District worked closely with the Santa Clara County FireSafe Council, traffic control contractors, vegetation management crews, and other partner agencies to ensure consistent treatment standards, regulatory compliance, and effective field execution across all roadway segments.

Vegetation management efforts resulted in improved roadway and intersection visibility, enhanced pedestrian clearance, and reduced roadside ignition potential while maintaining appropriate overstory canopy. These outcomes directly support safer evacuation conditions and improved access for emergency responders during wildfire and other emergency events.

COMMUNITY OUTREACH

Community outreach was an integral component of the Mora–Summerhill Evacuation Route Maintenance Project and was conducted to inform residents of planned activities, minimize disruptions, and encourage participation where applicable.

As a standard practice for evacuation route maintenance projects, early notification postcards were mailed to property owners along the project corridor. These mailings coincided with the placement of A-frame message boards at strategic entry points along the route to provide advance notice of upcoming work and anticipated traffic control measures. Follow-up project letters and Right of Entry (ROE) requests were mailed to affected property owners to explain project objectives, scope, and opportunities for voluntary participation.

District staff conducted field outreach along the project route, including door-to-door engagement where appropriate, to answer questions, address concerns, and coordinate access for vegetation management activities. These interactions also provided opportunities to share information about other District wildfire mitigation programs and resources.

Post-project outreach was conducted to inform the community of completed work and reinforce awareness of evacuation route maintenance efforts. Project completion messaging and signage were used to highlight the improvements achieved and the ongoing commitment to life safety and wildfire resilience.

Overall, outreach efforts supported transparency, facilitated coordination with residents, and contributed to the successful implementation of the project.

INSIGHTS / LESSONS LEARNED

The Mora–Summerhill Evacuation Route Maintenance Project provided several insights that will inform future evacuation route maintenance and hazardous fuel reduction efforts.

Community engagement continues to be one of the most important and complex elements of evacuation route projects. Early, clear, and repeated communication remains essential for setting expectations, encouraging participation, and supporting efficient project implementation. Continued refinement of outreach timing and messaging will further enhance coordination with residents and improve overall project effectiveness.

Maintenance-level treatments along established evacuation routes require careful calibration to balance wildfire risk reduction objectives with roadway constraints and residential context. Periodic maintenance focused on vegetation regrowth and fine fuels has proven effective in sustaining treatment benefits while minimizing community disruption between treatment cycles.

The use of Unmanned Aircraft Systems (UAS) for pre- and post-treatment evaluation continues to demonstrate value as a planning and verification tool. UAS-supported analysis provides objective insight into vegetation conditions, supports data-driven decision-making, and strengthens documentation of treatment outcomes. Continued integration of UAS technology will enhance program consistency and transparency.

Operational coordination and safety planning remain critical to successful project delivery. Pre-project meetings, daily safety briefings, and clearly defined traffic control measures contributed to safe execution within active roadways and should remain standard practice for future projects.

These insights will be applied to future evacuation route maintenance efforts to further improve program efficiency, community engagement, and life-safety outcomes.

ACKNOWLEDGMENTS / APPRECIATION

The Los Altos Hills County Fire District expresses its appreciation to the many partners and individuals who contributed to the successful completion of the Mora–Summerhill Evacuation Route Maintenance Project.

The District acknowledges the continued support of the Board of Commissioners, whose leadership and commitment make evacuation route maintenance and wildfire mitigation efforts possible.

Appreciation is extended to the Santa Clara County FireSafe Council for project management support, coordination, and implementation assistance. The District also recognizes the efforts of vegetation management and traffic control contractors whose professionalism and adherence to safety protocols contributed to the efficient and incident-free completion of the project.

The District further appreciates the cooperation of partner agencies and jurisdictions that supported planning, permitting, and field operations, as well as the residents along the Mora–Summerhill corridor for their cooperation and engagement throughout the project.

ATTACHMENT(s):

Attachment 1
Los Altos Hills County Fire District 2023–2027 Strategic Plan, Strategic Goal 1: Prevention, Protection, and Resiliency

Attachment 2
Los Altos Hills County Fire District Chart of Services, Current Version (Integrated Hazardous Fuel Reduction Program)

Attachment 3
Santa Clara County FireSafe Council **Final Report**
Mora–Summerhill Evacuation Route Maintenance Project

Attachment 4
Post-Treatment Unmanned Aircraft Systems (UAS) Report
Mora–Summerhill Evacuation Route

Santa Clara County FireSafe Council
14380 Saratoga Ave. Saratoga CA, 95070
Phone (408) 975-9591 • www.SCCFireSafe.org

FINAL REPORT
Mora - Summerhill Evacuation Route

November 17th, 2025

Introduction:

The Mora and Summerhill Roads in Los Altos Hills, California, represents a significant thoroughfare for the Los Altos Hills Community. This road is a primary means of egress and ingress in case of an emergency evacuation. To secure this egress/ingress' integrity, Los Altos Hills County Fire District and Santa Clara County FireSafe Council proposed a roadside treatment of fuels.

Cooperators:

There were multiple agencies, contractors, property owners, and organizations that contributed to the project; Santa Clara County Fire Safe Council, Los Altos Hills County Fire District, Dudek, Huertas Tree Service, AWP Safety, the County of Santa Clara, and the Town of Los Altos Hills to name a few.

Goals For This Project:

1. Trim woody vegetation and weed whip grasses and weeds adjacent to the road.
2. Remove dead or dying woody debris of less than 8 inches DBH.
3. Reduce ladder fuels around larger trees.
4. Remove dead, diseased, or damaged trees smaller than 8 inches DBH posing a hazard.
5. At street corners where vegetation is thick and blocks visibility, trim and remove to meet standards of shrubs less than 3 feet high and trees limbed up to at least 6 feet above ground. Per Los Altos Hills Municipal Code Title 10-Zoning , "shrubs and plants shall be pruned to a height not to exceed three (3') feet above the road level at its nearest point in an area bounded by the center line of intersecting roads or easements for vehicular access, public or private and a straight line joining points on such center lines eighty (80') feet distant from their intersection. All side limbs of trees in such an area shall be pruned to a height of not less than six (6') feet above the road surface."
6. Clear all vegetation for three (3) feet around the circumference and ten (10) feet above fire hydrants. Advise property owners and the fire department of any other obstruction that cannot be mitigated.

Project Site:

The Mora - Summerhill Evacuation Route Project provided hazardous fields reduction and defensible space treatments along four key evacuation corridors in Los Altos Hills: Ravensbury Avenue, Magdalena Avenue, Summerhill Avenue, and Mora Drive.

The project began at its northernmost point at the intersection of Summerhill Avenue and El Monte Avenue (37.36558, -122.11546) and proceeded south along Summerhill Avenue, treating approximately 1.0 linear mile (2.0 treated miles) until reaching its intersection with Magdalena Avenue at 37.35613, -122.10247.

From this intersection, work continued southwest along Magdalena Avenue, covering approximately 0.7 linear miles (1.4 treated mies) to the junction with Ravensbury Avenue at 37.34963, -122.11138. The project then proceeded south on Ravensbury Avenue, treating approximately 1.05 linear miles (2.0 treated miles) up to the upper section of Ravensbury near the LAHCFD jurisdiction boundary at 37.338808, -122.105459.

In addition, the project encompassed Mora Drive, beginning at Eastbrook Avenue (37.342471, -122.095435) and extending to the Rancho San Antonio Preserve boundary at 37.337841, -122.100975. This portion included approximately 0.54 linear miles (1.0 treated mile) of roadway.

Overall, the Mora - Summerhill project successfully treated over 3.3 linear miles of critical evacuation routes, improving the roadway defensibility and community wildfire safety.

Santa Clara County FireSafe Council

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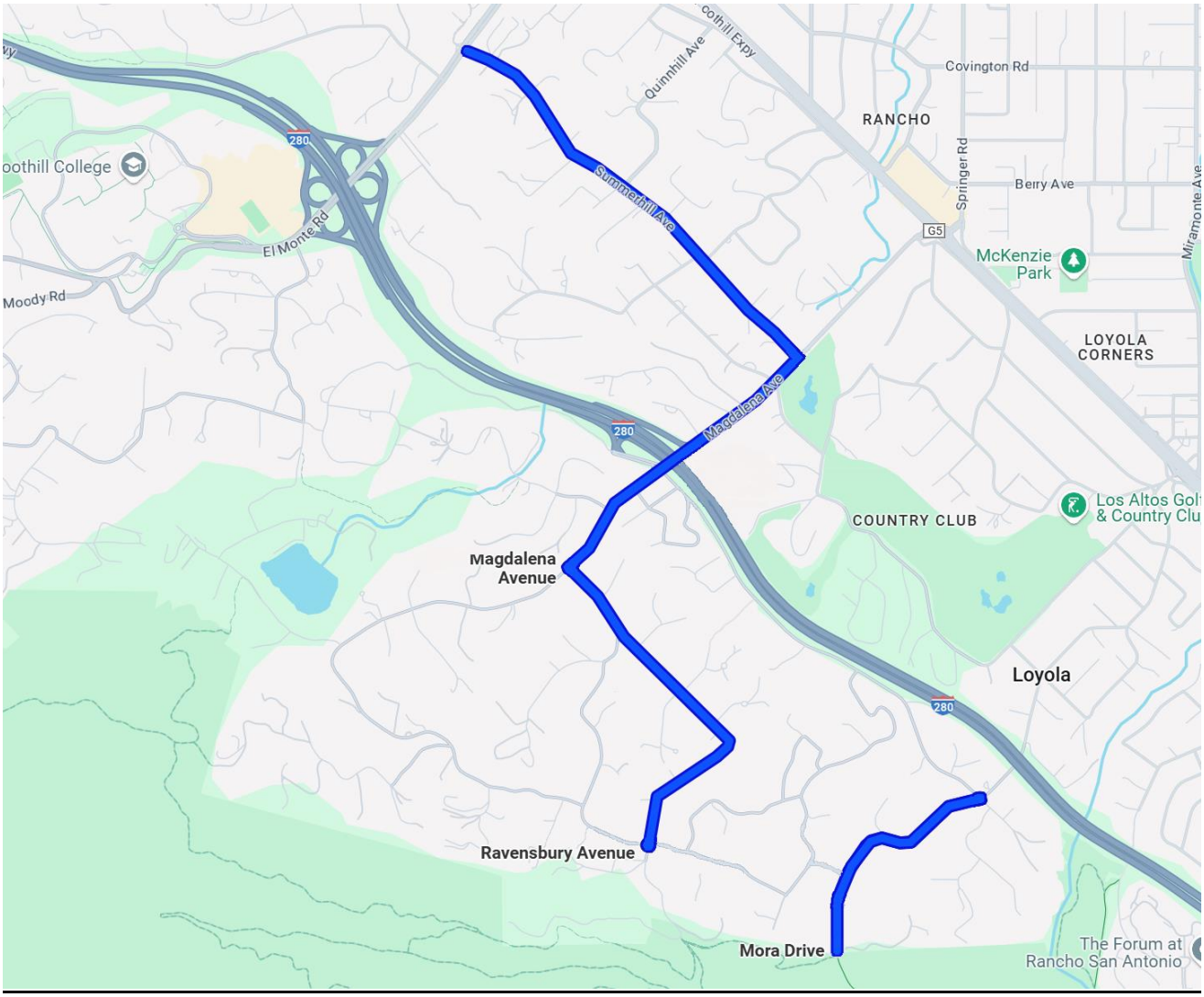
Mora - Summerhill Evacuation Route Project Map



Permissions:

One of the biggest challenges in these types of projects is getting permission to treat the properties. During planning of the project we conducted an extensive public outreach effort to get the permissions needed. It included mailers, newspaper articles, door-to-door visits, and a social media campaign. We were able to include 8 of the 162 parcels involved. Prior to the project, LAHCFD staff conducted a survey of the area to identify key parcels within the project scope. SCCFSC's timeframe for ROE forms to be returned was 14 days with a due date of September 18, 2025. LAHCFD and SCCFSC Staff went out to conduct door knocking 2 weeks prior to project start date.

Biological Precautions:

As with all of our projects, protecting the biodiversity of the area is a high priority. A Biological Survey was conducted on September 18, by Dudek, 10 days before the project started. The biologist identified and flagged wood rats nests, no active birds nests, drainages, and any habitats within the treatable area. The biological review was completed outside the nesting season. Heritage trees were not identified during the field verification stage and were not included in the work plan. Finally, a buffer of 25 feet was implemented along stream beds and seasonal waterways.

Project Duration:

The project started on Monday September 29, 2025 and was completed on Monday October 6, 2025. A total of 6 Days. We encountered 0 red flag days.

Jurisdictions And Funders Involved:

Santa Clara County Fire Safe Council, Los Altos Hills County Fire District, Santa Clara County, County Roads and Airports, and Town of Los Altos Hills.

Contractors Selected:

Dudek was selected for this project due to availability and competitiveness of the bid.

Huertas Tree Service was selected due to their availability, familiarity with evacuation route projects within SCCFSC, commitment to self and public safety, and ability to complete the project within the requested time frame.

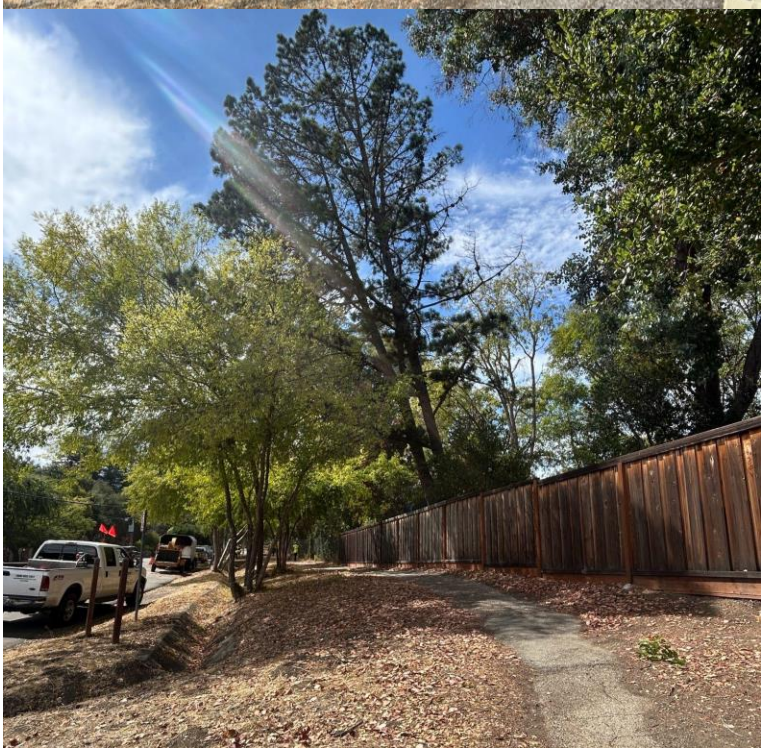
AWP Safety provided a traffic control plan and provided six flaggers and traffic control for project duration.

Project Photos


DO NOT
ENTER
WRONG
WAY


DO NOT
ENTER
WRONG
WAY


BE PREPARED TO STOP




HILLVIEW


HILLVIEW

By The Numbers:

- Area treated – 6.48 miles total area treated for both sides were treated during this project. Most of which was treated 15 to 30 feet from the edge of the road unless marked for riparian area. On ROE properties treatment extended 30-50 feet from the edge of the road if needed. The daily average was approximately 1 mile per day.
- Acres treated = approximately 5.62 acres
- No poison oak was treated during this project.
- 5 days of treatment on the project itself was carried out by Huertas Tree Service.

We overcame many challenges to complete this critical part of growing the evacuation route and vegetation treatment system in Santa Clara County. This project also supports goals in the LAHCFD CWPP annex as well as the overall Community Wildfire Protection Plan.

We would like to acknowledge the contribution made by Huertas Tree Service, Dudek, and AWP Safety. All entities were committed to assisting Santa Clara County FireSafe Council with the project from start to finish.

AWP Safety provided six traffic control personnel throughout the project to ensure that the work could be done in an efficient and safe manner. All roads worked on are commuter roads with multiple driveways, high bike and foot traffic routes; the traffic control personnel were necessary for the safety of the tree crews, SCCFSC staff, LAHCFD staff, general traffic, pedestrians and bicyclists in the Los Altos Hills area. I'm happy to report, with AWP Safety traffic control coverage and the safe working practices of Huertas Tree Service, we were able to finish the project with no reported injuries or incident reports. In addition to that, Los Altos Hills County Fire District granted permission for the project crew to use their parcel for a staging area.

Safety briefings were held by the safety officers, Andrew Harmon and Barbara Gonzalez each morning before start of work to discuss traffic control, personal protective equipment (PPE), local emergency services, environmental hazards, and weather conditions.

We would like to thank all the cooperators and property owners for all their support. If you have any questions or concerns please feel free to direct them to:

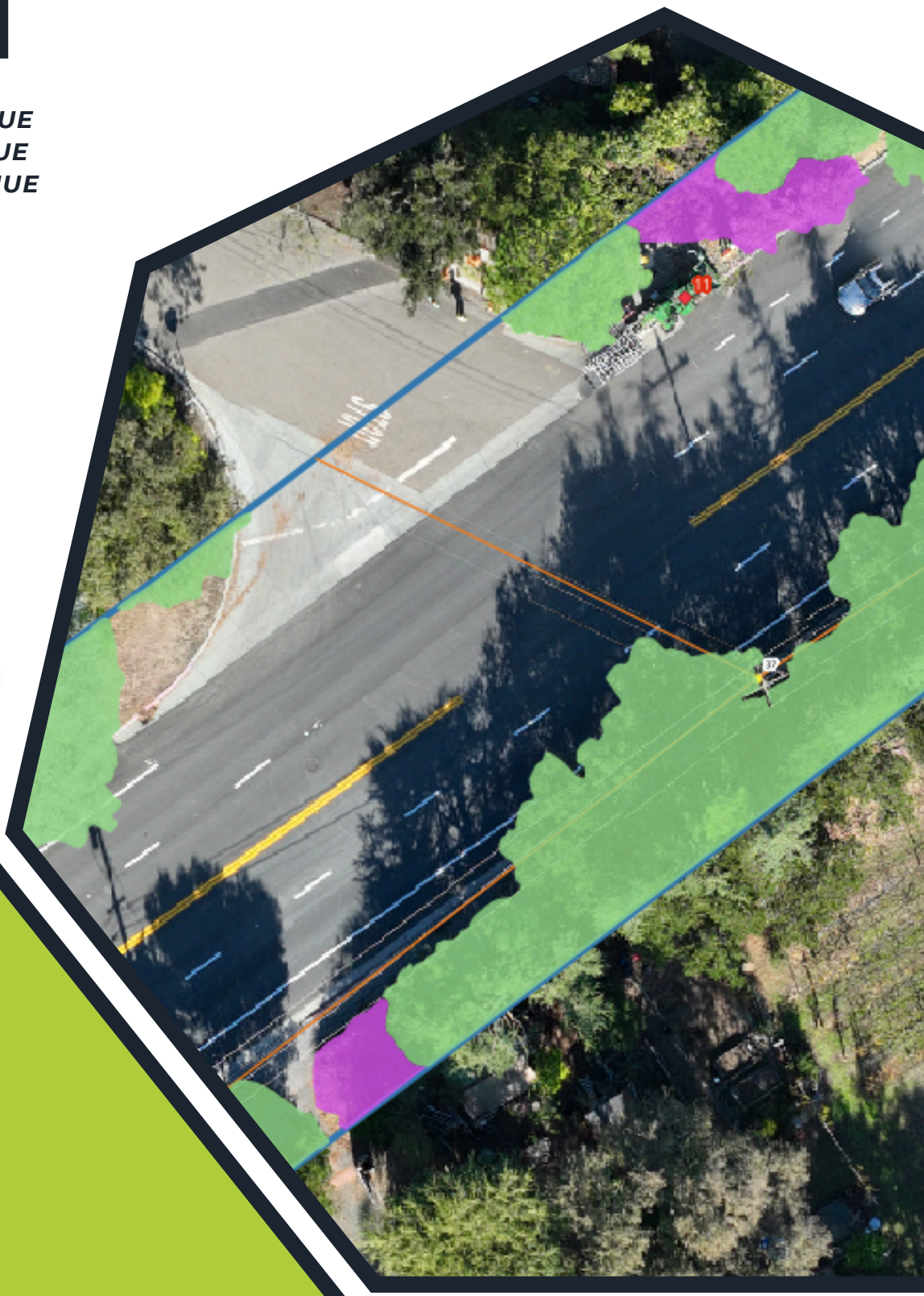
Barbara Gonzalez -
Project Manager
e-mail: bgonzalez@sccfiresafe.org
Phone: (408) 444-0711

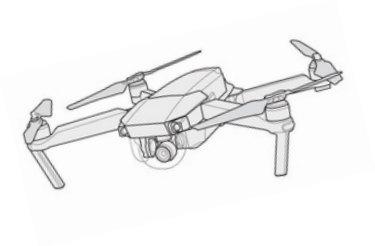
Amanda Brenner-Cannon –
Program Director
e-mail: abrennercannon@sccfiresafe.org

JACKSON'S DRONES

POST TREATMENT REPORT

SUMMERHILL AVENUE
MAGDALENA AVENUE
RAVENSBURY AVENUE
MORA DRIVE





LOS ALTOS HILLS COUNTY FIRE DISTRICT

NOVEMBER 2025

EXECUTIVE SUMMARY

38 acres

3.23 mi

November 2025

4,085 images

97x

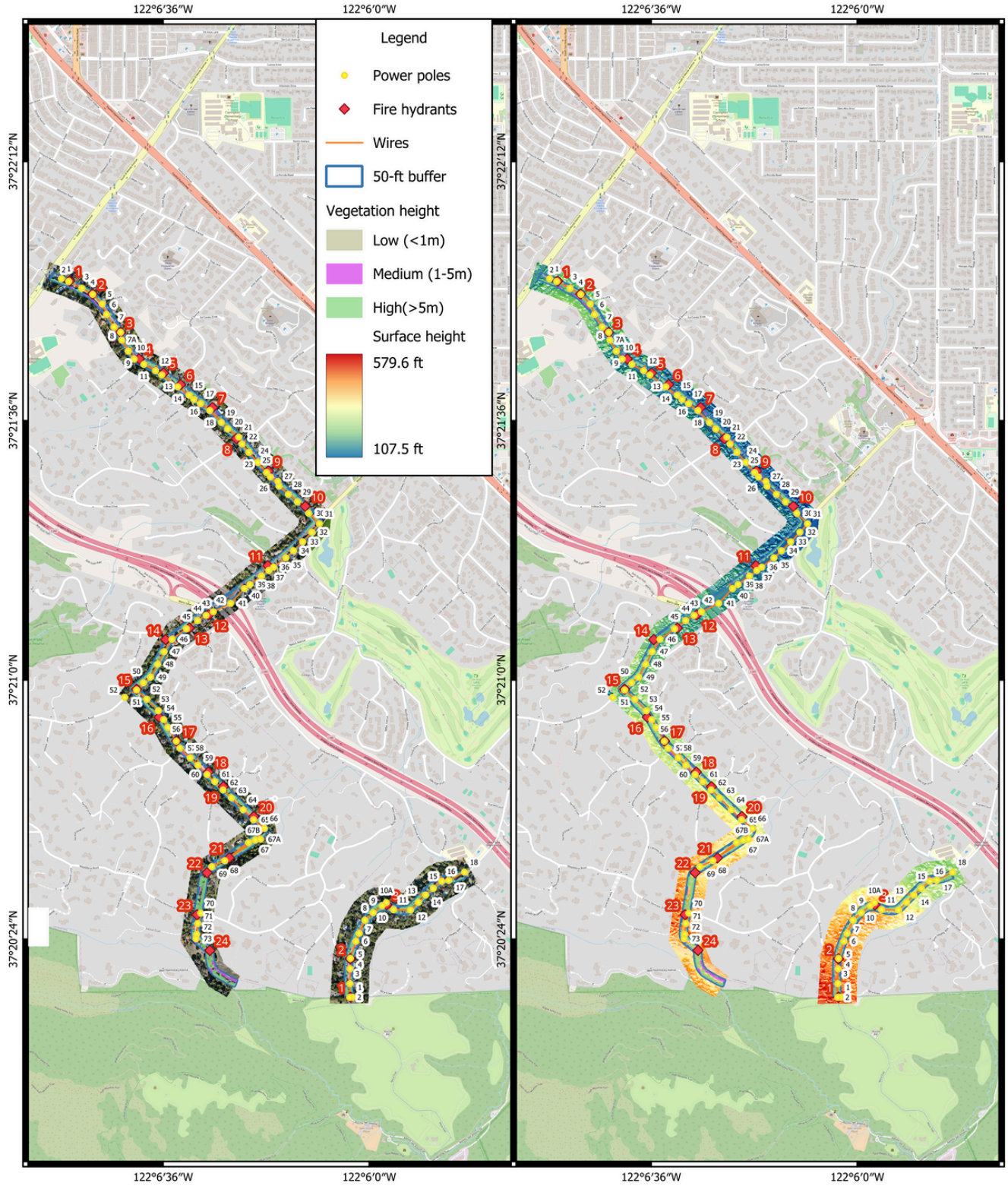
Moisture level analysed

Health status analysed

Vegetation height groups

JACKSON'S DRONES

OVERVIEW

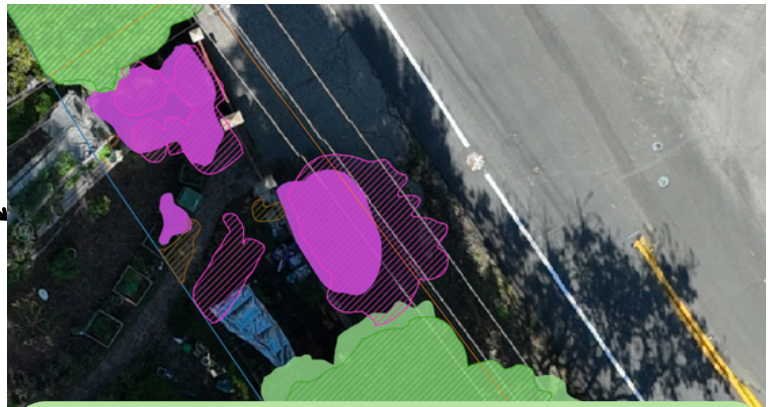


CHANGES: BEFORE (JUL) - AFTER (NOV) (1ST MILE)

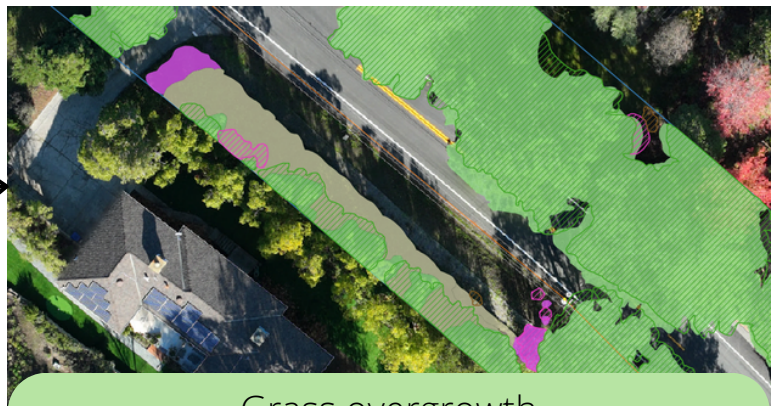
1st mile

Low vegetation before
Medium vegetation before
High vegetation before
Low vegetation after
Medium vegetation after
High vegetation after

Trees trimmed



Bushes trimmed

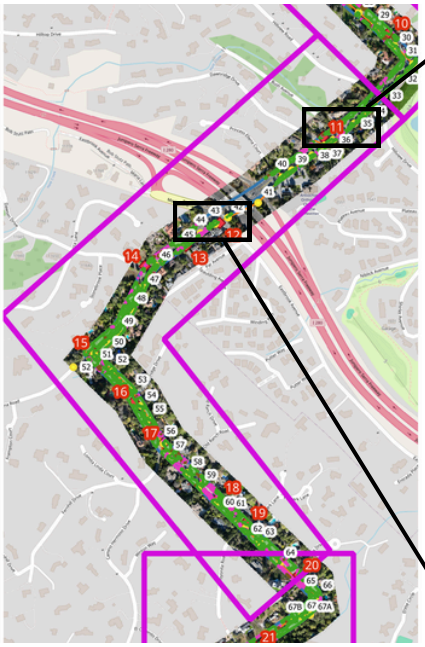


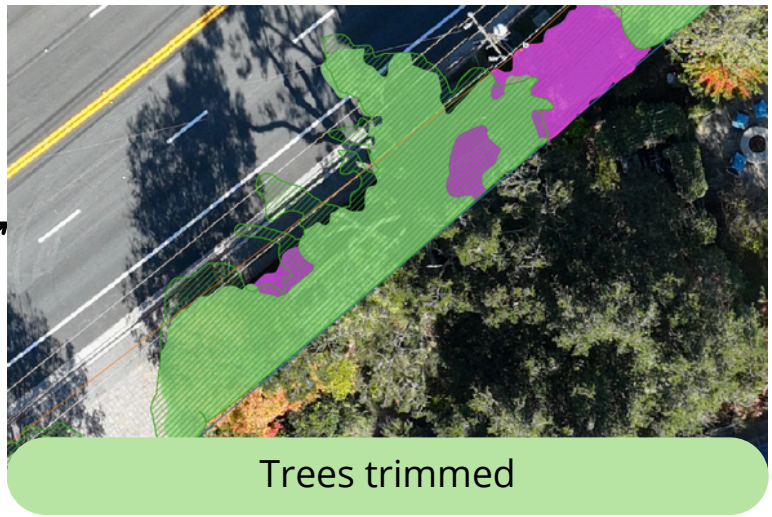
Grass overgrowth

CHANGES: BEFORE (JUL) - AFTER (NOV) (2ND MILE)

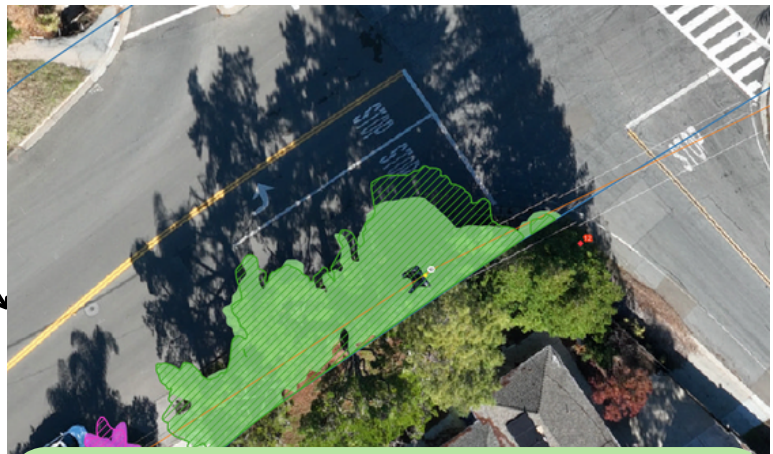
Low vegetation before
Medium vegetation before
High vegetation before
Low vegetation after
Medium vegetation after
High vegetation after

2nd mile





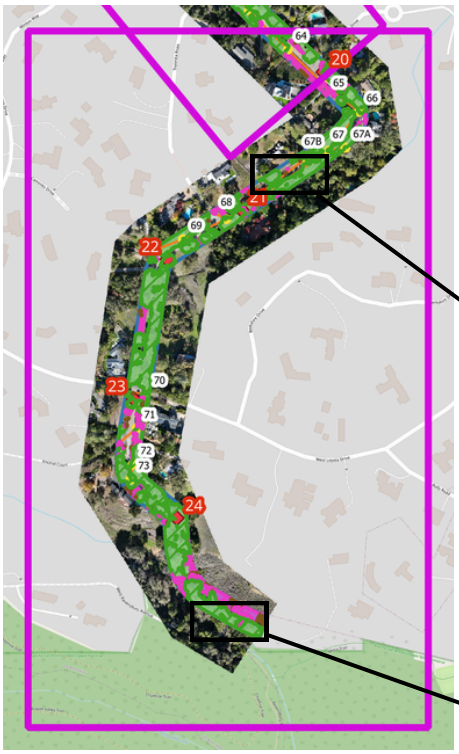
Trees trimmed

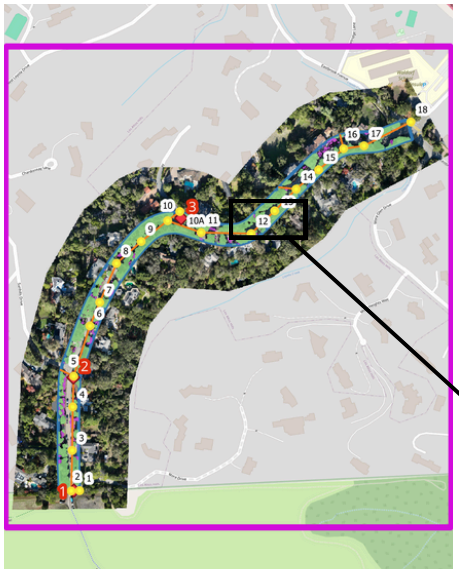


Trees trimmed

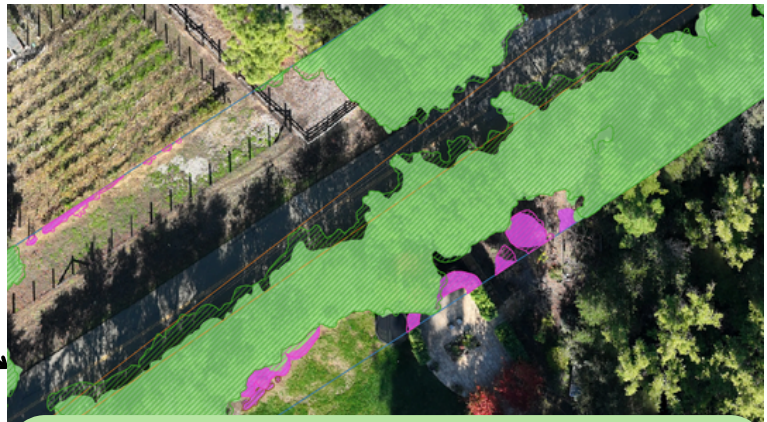
CHANGES: BEFORE (JUL) - AFTER (NOV) (3RD MILE)

3rd mile



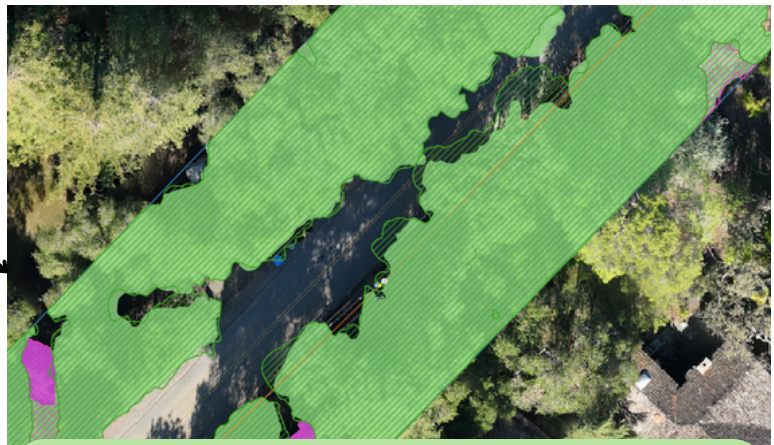


Low vegetation before
Medium vegetation before
High vegetation before
Low vegetation after
Medium vegetation after
High vegetation after



Trees trimmed

Trees and bushes trimmed

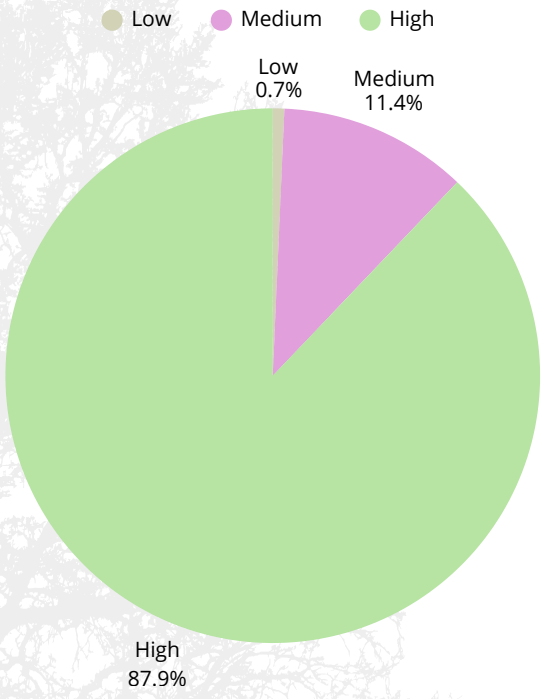


Trees trimmed

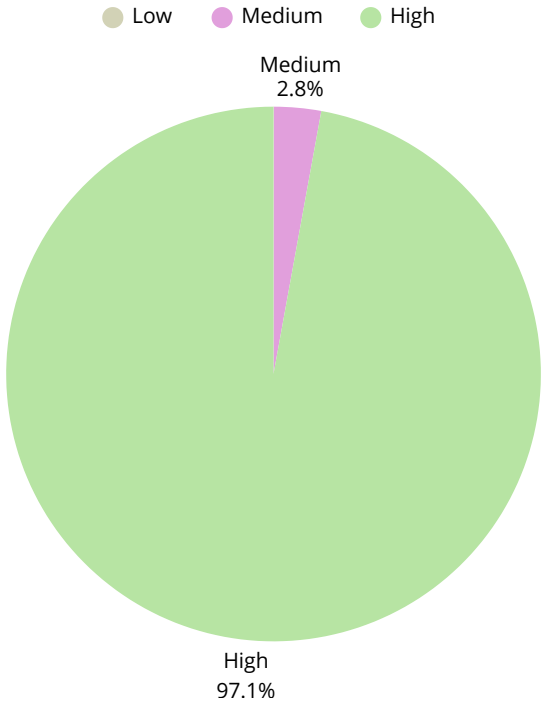
SHAPSHOT OF VEGETATION PROFILE

A primary goal of an evacuation route treatment is to reduce low height vegetation such as grasses and medium height vegetation such as shrubs and saplings that are ladder fuels. Finally the retention of a healthy tree canopy in the high height provides shade and cooler temperatures.

Vegetation area, %

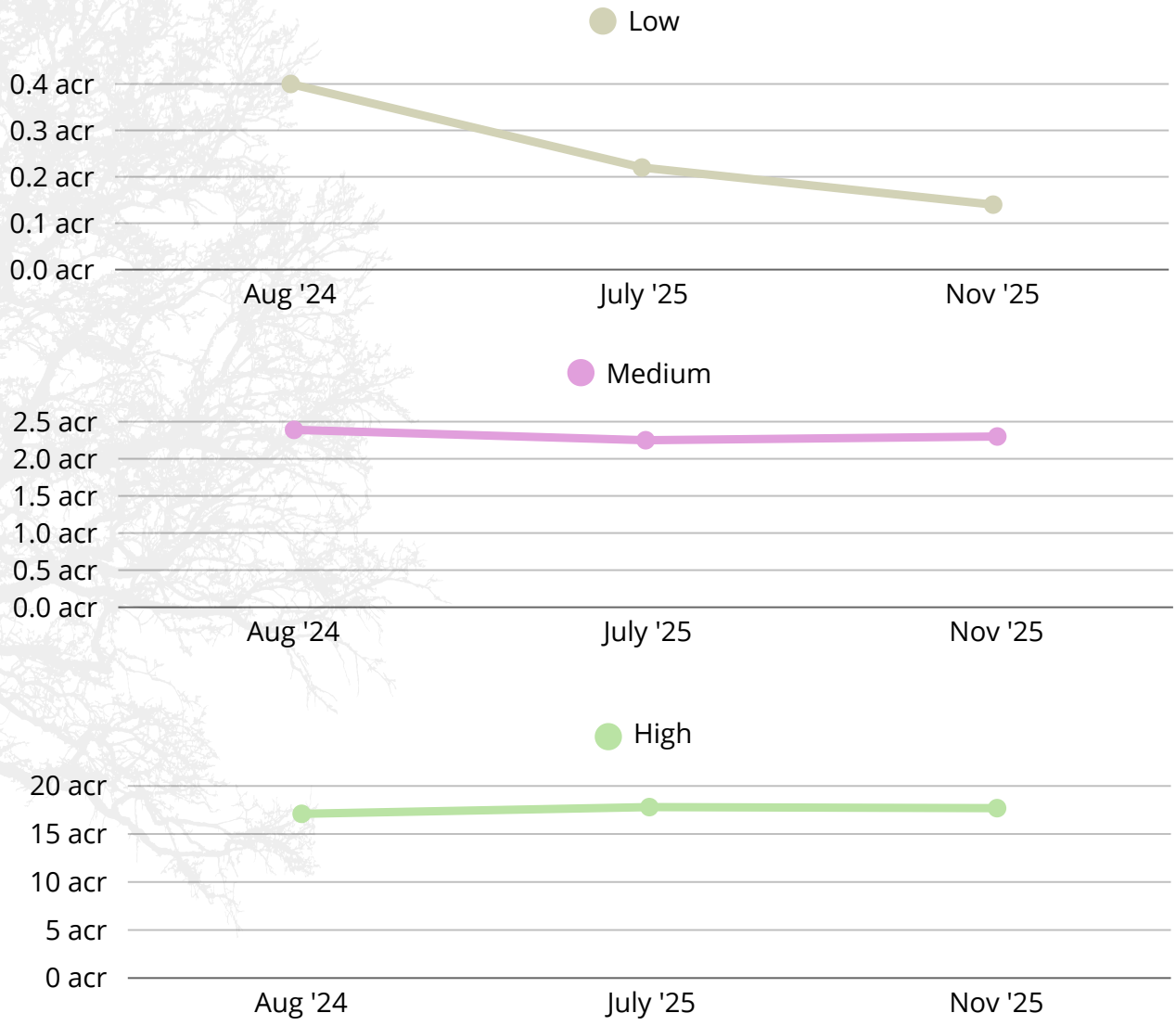


Vegetation volume, %



SHAPSHOT OF VEGETATION PROFILE

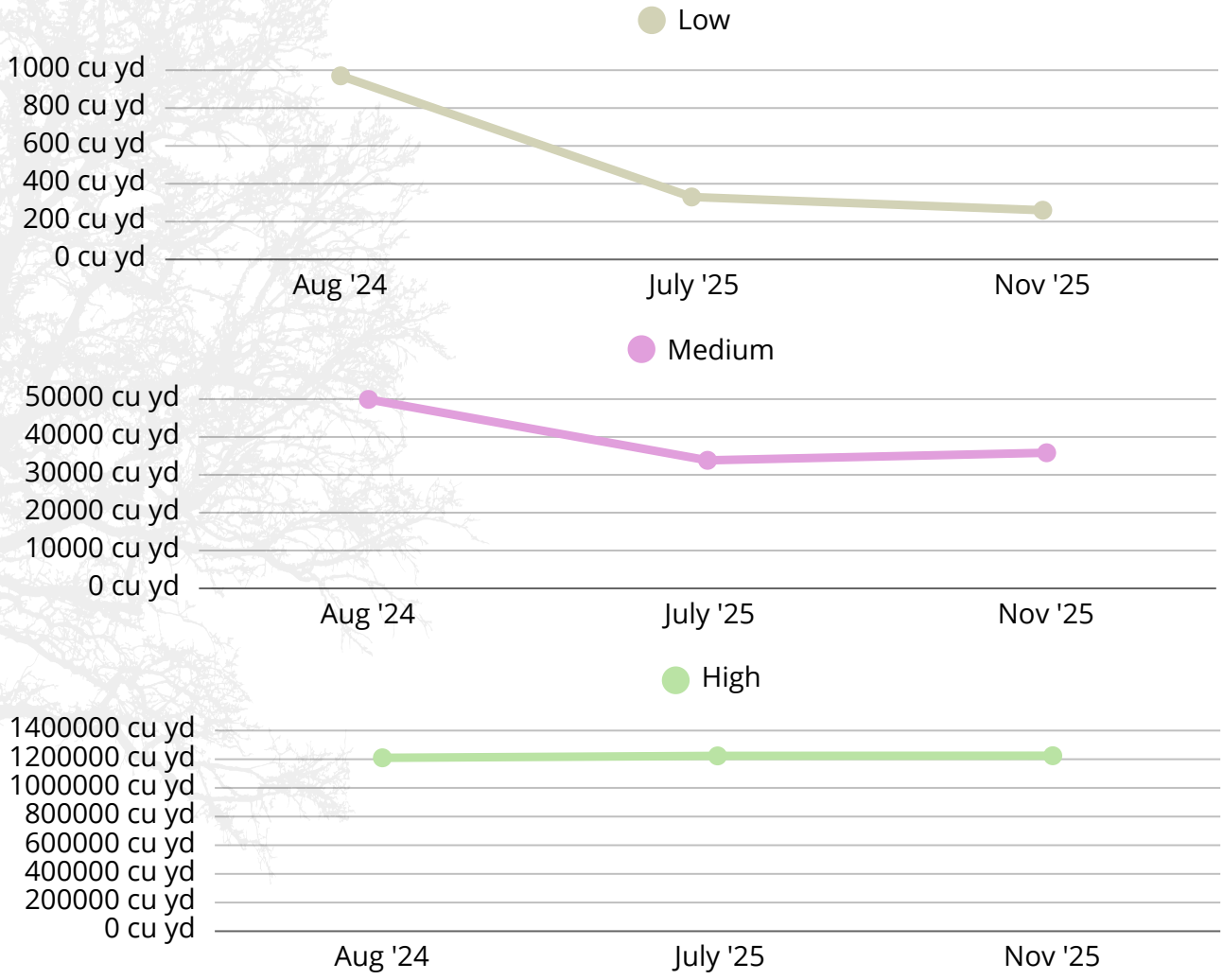
Vegetation height/ Areas (acres)	Aug '24	July '25	Nov' 2025	Acreage change
Low (up to 1 m)	0.4	0.22	0.14	-36%
Medium (1-5 m)	2.39	2.25	2.3	+2%
High (more than 5 m)	17.1	17.8	17.69	-0.6%



SHAPSHOT OF VEGETATION PROFILE

Volume is another way to measure a primary goal of an evacuation route treatment. Again the goal is to reduce low height vegetation and medium height vegetation. Retention of high height vegetation creates a shaded fuel break effect.

Vegetation height/ Volume (cubic yards)	Aug '24	July '25	Nov '25	Volume change
Low (up to 1 m)	970	330	260	-21%
Medium (1-5 m)	49,929	33,828	35,827	+6%
High (more than 5 m)	1,209,953	1,223,392	1,224,404	≈0%



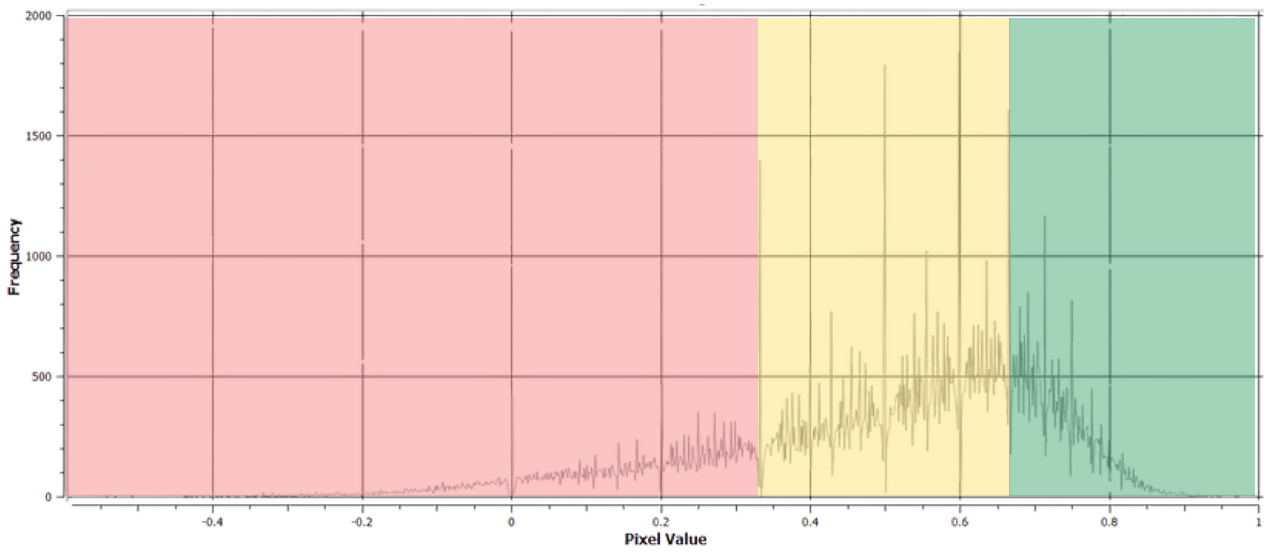
VEGETATION HEALTH STATUS (NDVI)

22%
Very stressed

53%
Moderately stressed

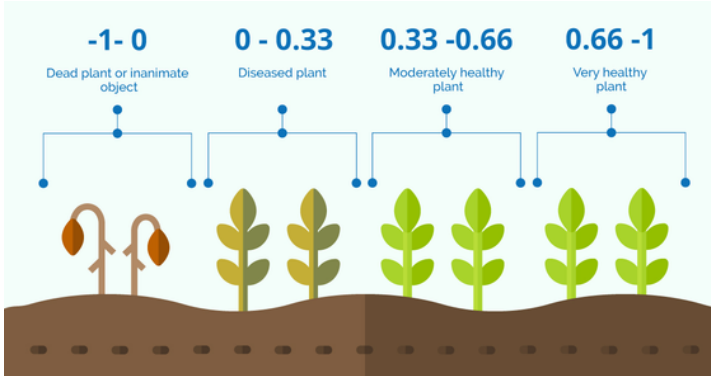
25%
Low stressed

NDVI Distribution Chart



NDVI, or Normalized Difference Vegetation Index, is a numerical indicator used to assess the presence and health of vegetation by analyzing how surfaces reflect light at specific wavelengths. It is calculated using the formula (NIR - Red) / (NIR + Red), where NIR stands for near-infrared reflectance and Red refers to red light reflectance.

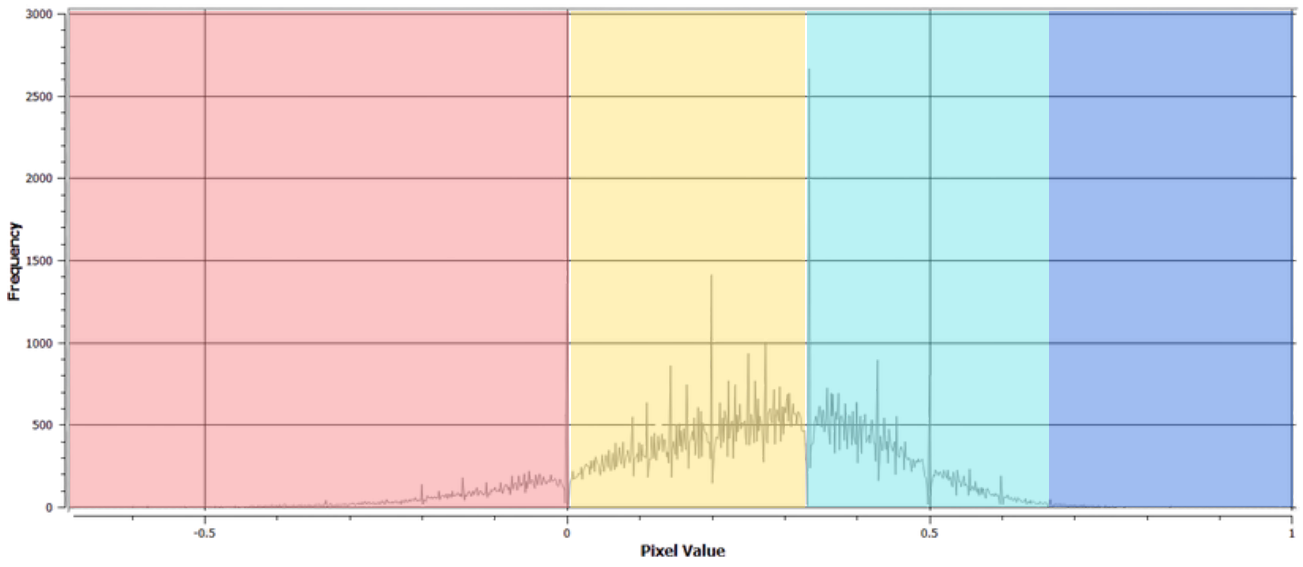
The NDVI values range between -1 and +1. Values closer to +1 indicate dense, healthy vegetation, such as a forest canopy or thriving crop field. Moderate values (around 0.3 to 0.66) suggest sparser or less healthy vegetation like grasslands or shrubs. Values near zero or negative values typically represent diseased or dead plants.



MOISTURE CONTENT (GNDVI)

Water stressed	Low level of water content	Medium level of water content	High level of water content

GNDVI Distribution Chart



GNDVI, or Green Normalized Difference Vegetation Index, is a vegetation index similar to NDVI but it uses the green band instead of the red band. It is particularly sensitive to chlorophyll content in leaves and is often used for assessing plant water stress, nitrogen content, or overall plant vigor, especially in crops with high chlorophyll concentrations.

The output values range from -1 to +1, just like NDVI. Higher values indicate high level of moisture in plants, while lower or negative values suggest sparse and water stressed vegetation. Compared to NDVI, GNDVI may be more sensitive to early signs of water or nitrogen deficiency, since green reflectance changes earlier in response to plant stress.