Ouray County

Community Wildfire Protection Plan | 2025

Prepared By

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List of Acronyms

BLM – Bureau of Land Management
CDC – Centers for Disease Control and Prevention
CSFS – Colorado State Forest Service
CWPP – Community Wildfire Protection Plan
FPD – Fire Protection District
GPM – Gallons Per Minute
PCL – Potential Control Location Suitability
PODs – Potential Operational Delineations
PPE – Personal Protection Equipment
SWPP – Source Water Protection Plan
USFS – U.S. Forest Service
WRAP – Wildfire Ready Action Plan
WRWC – West Region Wildfire Council
WUI – Wildland-Urban Interface

Executive Summary

The Need & Purpose

Wildfires are an escalating threat across the U.S., especially in Colorado, putting lives, homes, critical infrastructure, tourism, recreation, and natural environments at risk. Driven by climate change and prolonged drought, these fires are becoming more frequent and intense, leaving communities increasingly exposed. Decades of well-meaning fire suppression and pests have disrupted natural fire cycles and allowed dangerous fuel buildup, compounding the danger. In Ouray County, it's no longer a question of *if* a large wildfire will occur but *when*. When a large wildfire does occur, the county and residents need to be prepared by hardening their homes, creating defensible space, preparing for evacuation, and supporting fuel reduction projects.

The Ouray County Community Wildfire Protection Plan (CWPP) is a proactive blueprint for reducing wildfire risk and strengthening community preparedness. Created with broad collaboration, the CWPP helps secure critical fuel reduction and mitigation funding. It defines the wildland-urban interface (WUI), prioritizes high-risk areas for treatment, and outlines concrete actions the county and other stakeholders can take to reduce wildfire risks.

The CWPP Stakeholder Group led the planning process and development of the CWPP. This group consisted of representatives from Ouray County, Town of Ridgway, City of Ouray, fire protection districts, power companies, Colorado State Forest Service (CSFS), U.S. Forest Service (USFS), Bureau of Land Management (BLM), and West Region Wildfire Council (WRWC).

CWPP Goals

Goals are a critical component of a CWPP. They help to guide the planning process and ensure that the actions identified meet the needs of the residents and visitors of the county. Below are the three goals for the Ouray County CWPP.

Goal 1: Fire-Resilient Landscapes
Develop and maintain landscapes across the county that are resilient to wildfire, mitigate undesirable fire outcomes, and protect highly valued resources and assets.

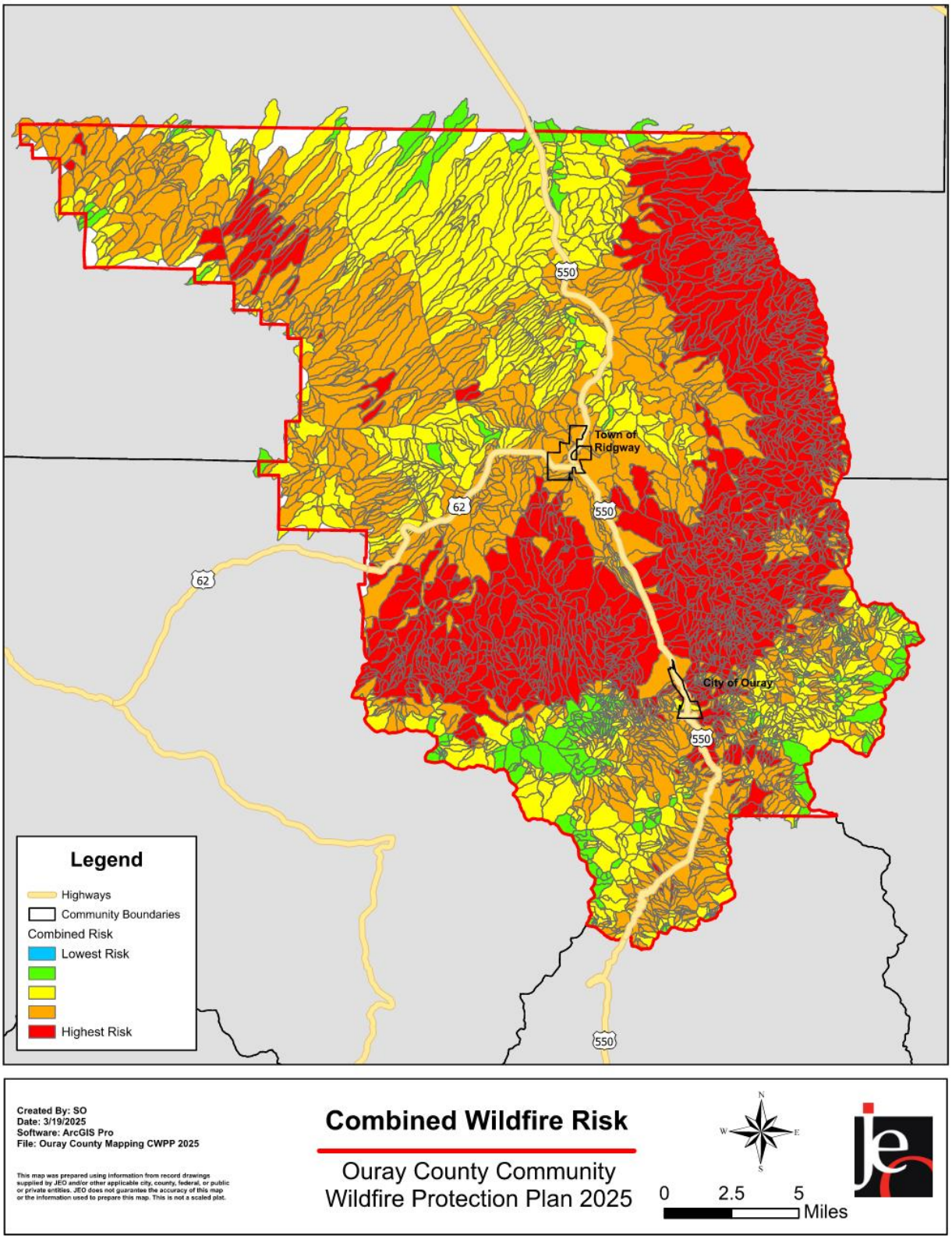
Goal 2: Fire-Adapted Communities
Empower the county and its residents to "live with wildfire," including being prepared to withstand, respond to, and recover from wildfires.

Goal 3: Safe and Effective Wildfire Response
Enable safe and efficient wildfire response through improved planning, coordination, and capacity building.

Wildfire Risk Assessment

The image below shows the wildfire risk map created during the CWPP process. The CWPP Stakeholder Group felt that none of the created risk maps accurately reflected wildfire risk in the county. A new wildfire risk map was created using the inputs of fire intensity, burn probability, potential control location suitability, and overall watershed risk. Additional information about the map and risk assessment can be found in the *3| Wildfire Risk Assessment* section of the plan.

Figure 1: Combined Wildfire Risk Map



Action Plan

The two maps below show the shorter-term fuel treatment locations and the longer-term fuel treatment project locations. The shorter-term projects have already started the planning process or are underway. The longer-term projects are areas where the CWPP Planning Team identified that projects should take place in the future. These projects have not started the planning process. Additional information about the projects can be found in the *4| Action Plan* section of the plan.

Figure 2: Shorter-Term Fuel Treatment Locations

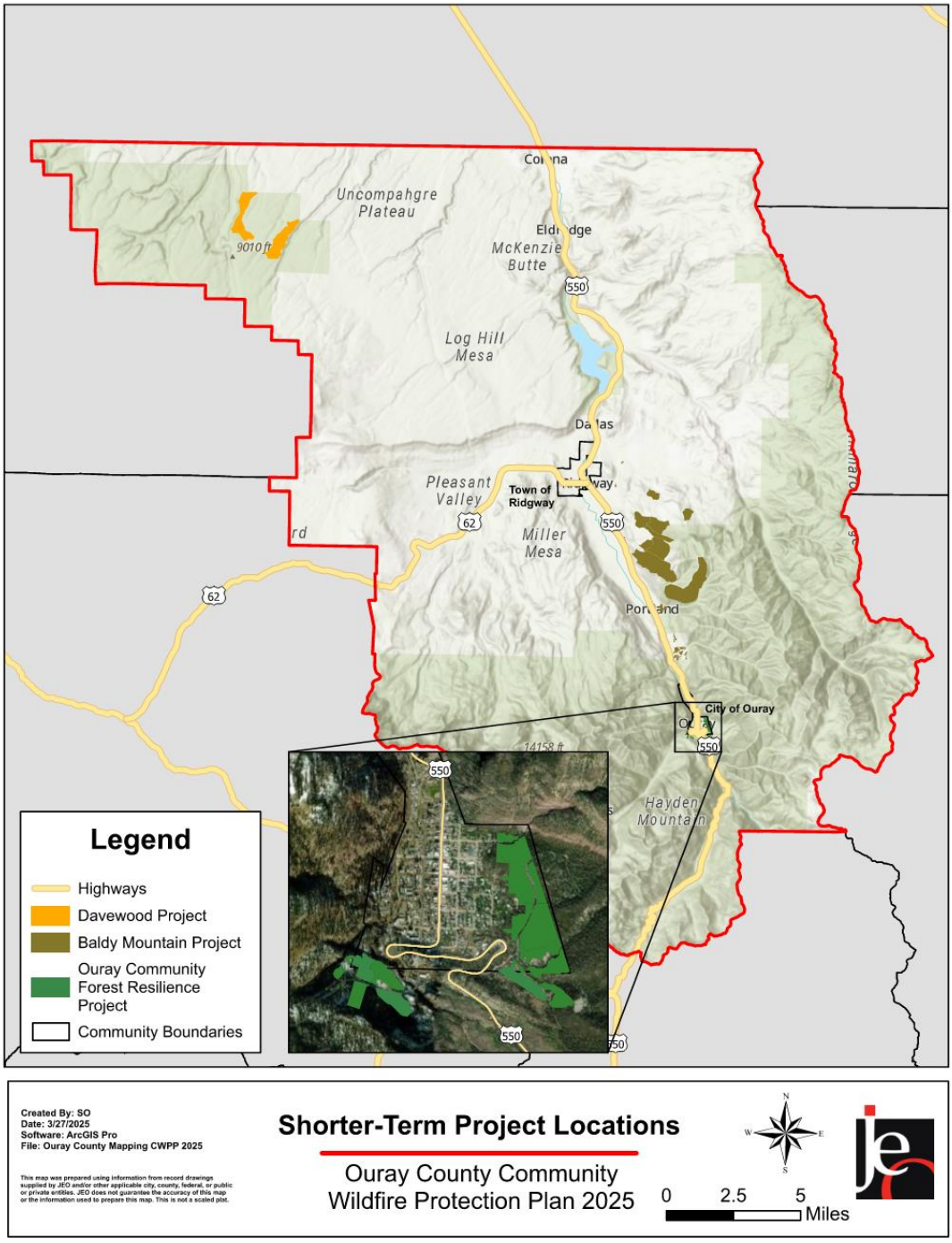
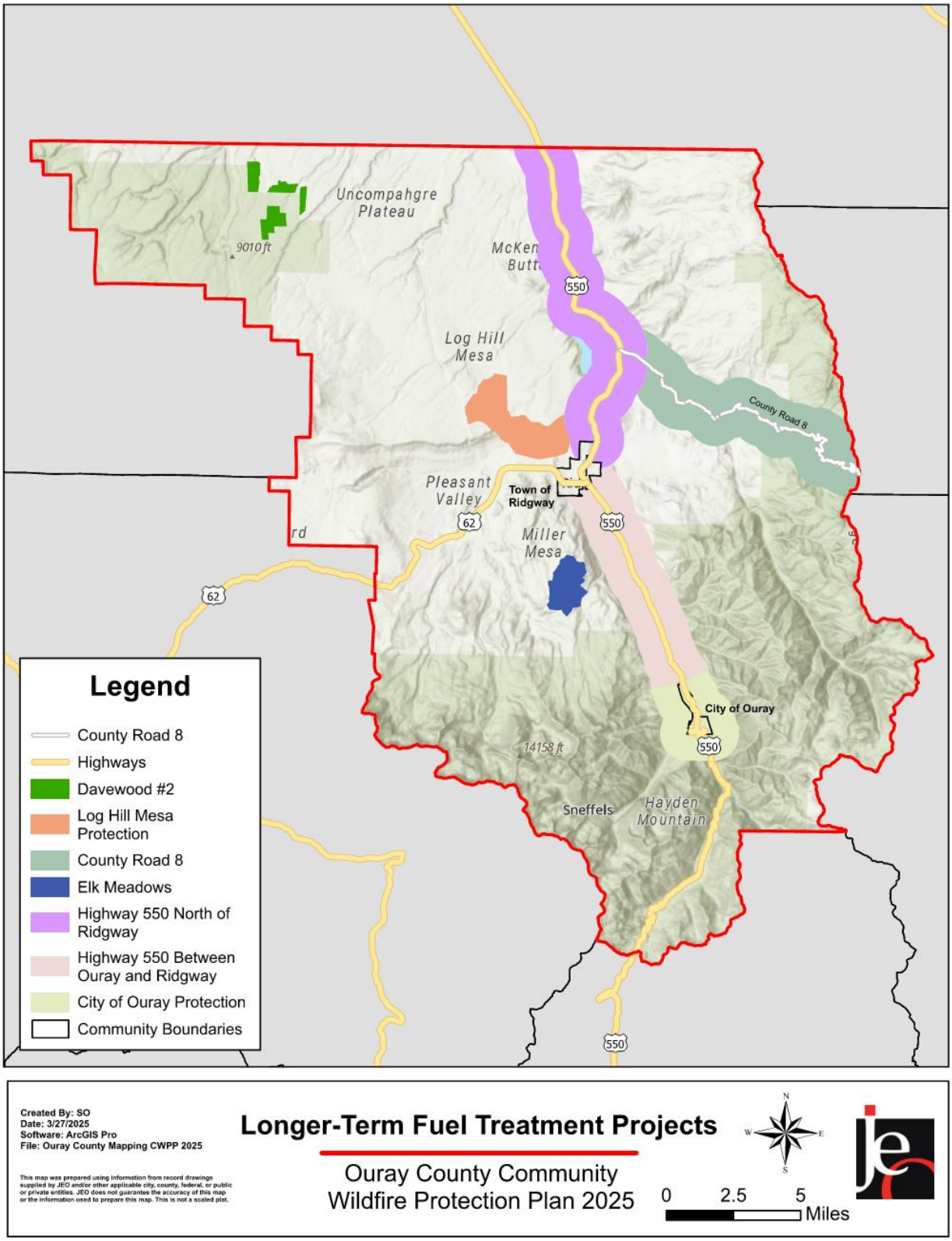


Figure 3: Longer-Term Fuel Treatment Locations



Fuel treatments are not the only type of project that can be implemented to reduce wildfire risk. Other wildfire mitigation actions identified by the CWPP Stakeholder Group can be broken down into three categories: Watershed Actions, Fire-Adapted Communities Actions, and Safe & Effective Wildfire Response Actions. Watershed actions are those projects that can help reduce wildfire risk to drinking water and natural waterways. The fire-adapted community actions are projects that empower residents to withstand, respond to, and recover from wildfires. Safe and effective wildfire response actions are those projects that support first responders through planning, coordination, and capacity building. Specific actions related to each of the categories can be found below.

Watershed Actions

- Implement Projects Identified in the Dallas Creek Water Company Source Water Protection Plan
- Implement Actions Identified in the Town of Ridgway Source Water Protection Plan
- Develop a Source Water Protection Plan for the City of Ouray
- Develop Wildfire Ready Action Plan
- Wet Meadows Creation

Fire-Adapted Communities Actions

- Joint Task Force on Wildfire Education
- Wildfire Code Updates and Enforcement
- Neighborhood-Level Evacuation Planning
- Protect County Structures and Infrastructure
- Insurance Company Collaboration
- Subdivision Wildfire Requirements
- Conduct Rapid Wildfire Risk Assessments
- Promote the West Region Wildfire Council's Wildfire Ready Home Program
- City of Ouray Forest Management Program

Safe & Effective Wildfire Response Actions

- Water Source Improvements
- Emergency Response Radio and Emergency Alert Training
- Fire District and Governmental Personnel

1| Living with Wildfire

The Need

Every year, destructive wildfires sweep across areas of the United States and Colorado, even as more people choose to settle where wildfires pose a real threat. These fires endanger lives and properties, disrupt ecosystems, damage vital infrastructure, and impair air and water quality. Furthermore, climate change and prolonged droughts are intensifying the frequency and severity of wildfires, making communities increasingly vulnerable. Without proper planning, recovery efforts become more expensive, and the long-term environmental and social consequences worsen.

Since the early 1900s, rangeland and forest management in the western United States has adhered to a simple strategy: “Prevent Wildfires.” Initially, this approach was meant to safeguard human settlements, forest, and rangeland resources. However, decades of fire suppression have led to unintended adverse effects. Many natural ecosystems rely on wildfires to maintain healthy growth and trigger reproduction. Overgrown forests, excessive shrub growth, and invasive species like cheatgrass have reached hazardous levels without regular fire cycles.

For fire and forest management agencies at both county and state levels, it’s no longer a matter of whether a wildfire will occur but when and what impact it will have. Identifying the areas most at risk and where fires could have the most significant consequences allows for implementing targeted mitigation measures before disaster strikes. As Ouray County continues to grow, developing a CWPP becomes essential for ensuring that residents can live safely alongside the risk of wildfire.

The Purpose

The Ouray County CWPP is a strategic plan identifying specific wildland fire risks facing communities and fire districts within Ouray County, Colorado. It provides prioritized mitigation projects and activities designed to reduce those risks. The CWPP brings together diverse local interests to discuss their mutual concerns for public safety, community sustainability, and natural resources. The plan provides prioritized access to state and federal grant funding to support identified vegetation-fuel management projects and other mitigation activities to reduce wildfire risks throughout the county. It also allows the county to establish a localized definition and boundary for the WUI. The planning area for the CWPP is the entire county.

Effective wildfire mitigation is an evolving process as forests and communities continually change. The CWPP implementation process is designed with built-in flexibility to adapt to this shifting landscape. Regular updates and annual plan reviews capture these changes and document progress.

CWPP Goals

Goals are a critical component of a CWPP, providing clear direction and focus for the plan and the planning process. By clearly outlining what the county strives to accomplish, these goals ensure that all efforts align with local priorities, resources, and capabilities. The Ouray County CWPP goals are detailed below, with corresponding actions outlined in the *Action Plan* section of this document.

Goal 1: Fire-Resilient Landscapes
Develop and maintain landscapes across the county that are resilient to wildfire, mitigate undesirable fire outcomes, and protect highly valued resources and assets.

Goal 2: Fire-Adapted Communities
Empower the county and its residents to "live with wildfire," including being prepared to withstand, respond to, and recover from wildfires.

Goal 3: Safe and Effective Wildfire Response
Enable safe and efficient wildfire response through improved planning, coordination, and capacity building.

County Overview

Ouray County, Colorado, has a striking and diverse landscape, earning it the nickname "Switzerland of America." The county is dominated by the rugged San Juan Mountains, which feature dramatic peaks, deep canyons, and alpine meadows. Elevations range from 6,257 feet in the lower valleys to 14,150 feet at the highest summits. Steep, forested mountains, jagged ridgelines, and cascading waterfalls characterize the southern part of the county. The northern region transitions into the fertile Uncompahgre River Valley and rolling foothills, eventually giving way to mesa lands. The area is rich in natural beauty, with towering rock formations, lush aspen and pine forests, and pristine high-altitude lakes. The Uncompahgre River flows northwesterly through the center part of the county and feeds into the Ridgway Reservoir.

Major transportation routes include U.S. Highway 550, which travels north-south through the center part of the county, and State Highway 62, which travels west-southwest from the Town of Ridgway. There are no rail lines or public airports in the county.

Population

There are two incorporated communities, the City of Ouray and the Town of Ridgway. The City of Ouray is in the southern portion, and the Town of Ridgway is in the county's central portion. According to the U.S. Census Bureau, Ouray County has an estimated population of 4,936 in 2022. Population growth has been significant, with a 24% growth from 2000 to 2022. Population in the unincorporated areas of Ouray County has been increasing, but at a slightly slower pace than the two communities. These homes and individuals may be at higher risk of wildfire due to additional nearby vegetation.

Table 1: Population in Ouray County (1970-2022)

Jurisdiction	1970	1980	1990	2000	2010	2020	2022*
City of Ouray	741	684	644	813	1,000	898	1,007
Town of Ridgway	262	369	423	713	924	1,183	1,093
Unincorporated Areas of Ouray County	543	872	1,228	2,216	2,512	2,793	2,836
Total	**1,546**	**1,925**	**2,295**	**3,742**	**4,436**	**4,874**	**4,936**

Source: U.S. Census Bureau[1,2]
**ACS Estimate*

[1] U.S. Census Bureau. "2022 Census Bureau American Community Survey: S0101: Age and Sex." https://data.census.gov/.
[2] "2020 Census Bureau Decennial Census: P1: Race." https://data.census.gov/.

Social Vulnerability

Social vulnerability is crucial in wildfire risk analysis because it helps identify populations struggling to prepare for, respond to, and recover from wildfires. Social vulnerability encompasses demographic and socioeconomic factors that put populations at greater risk when facing hazards and other stressors.[3] Specific social vulnerability factors for wildfire include the following.

1. **Evacuation Challenges** – Older populations, people with disabilities, and those without reliable transportation may have difficulty evacuating quickly during a wildfire.

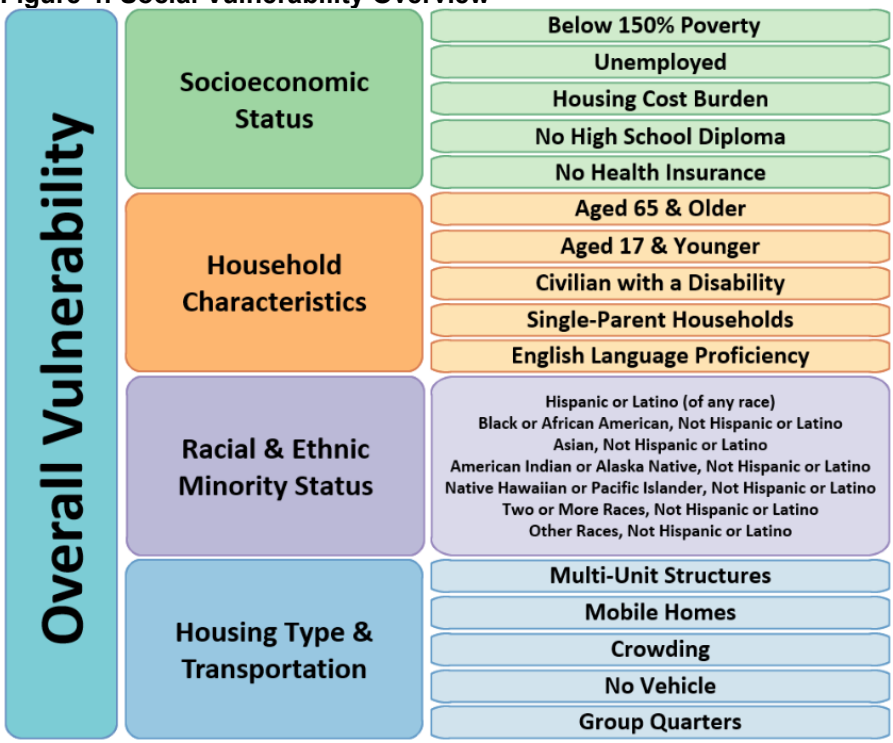
2. **Access to Resources** – Some populations may lack the financial resources to implement fire-resistant home improvements or purchase insurance.

3. **Health and Safety Risks** – Those with pre-existing respiratory conditions can be disproportionately impacted by smoke exposure and air quality issues

4. **Recovery Disparities** – Wealthier communities typically recover more quickly after a wildfire, while socially vulnerable groups may face prolonged displacement, job loss, and difficulty securing assistance.

By being aware of where socially vulnerable populations are, decision-makers can prioritize resources, enhance emergency planning, and develop equitable strategies to protect at-risk populations. The diagram below shows variables that make up the Centers for Disease Control and Prevention's (CDC) Social Vulnerability Index.

Figure 4: Social Vulnerability Overview

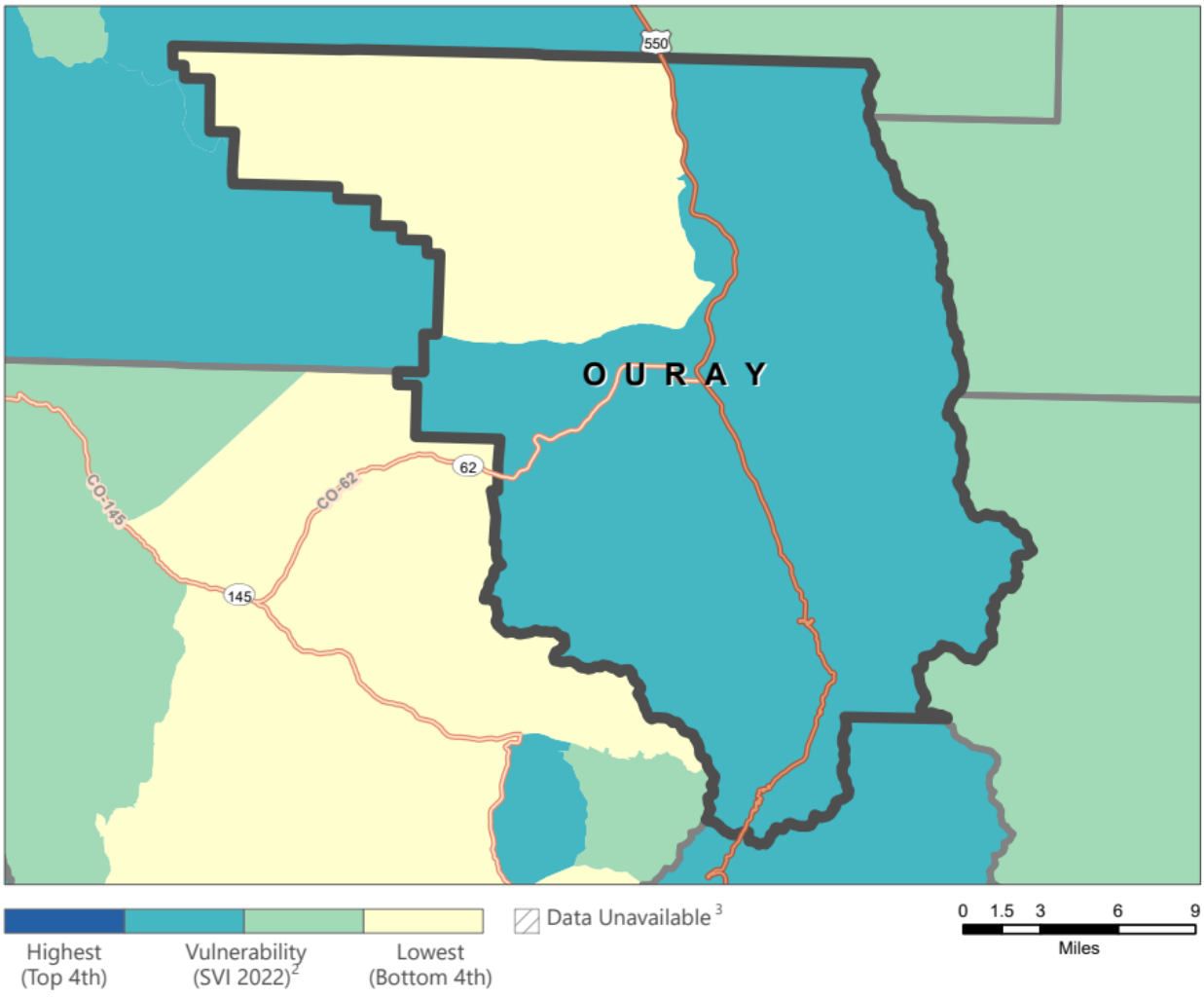


Source: CDC[4]

[3] CDC. 2022. "Social vulnerability Index." https://www.atsdr.cdc.gov/place-health/php/svi/index.html.
[4] CDC. 2022. "Social vulnerability Index." https://www.atsdr.cdc.gov/place-health/php/svi/index.html.

The figures below show Ouray County's overall socially vulnerable population information and the four social vulnerability factors. Overall, the eastern and southern portions of the county have higher overall social vulnerability. When looking at the four main areas, the eastern and southern portions have high vulnerability in the Social Economic, and Housing Type/Transportation areas. Additional evacuation planning and economic support might be necessary in those areas of the county.

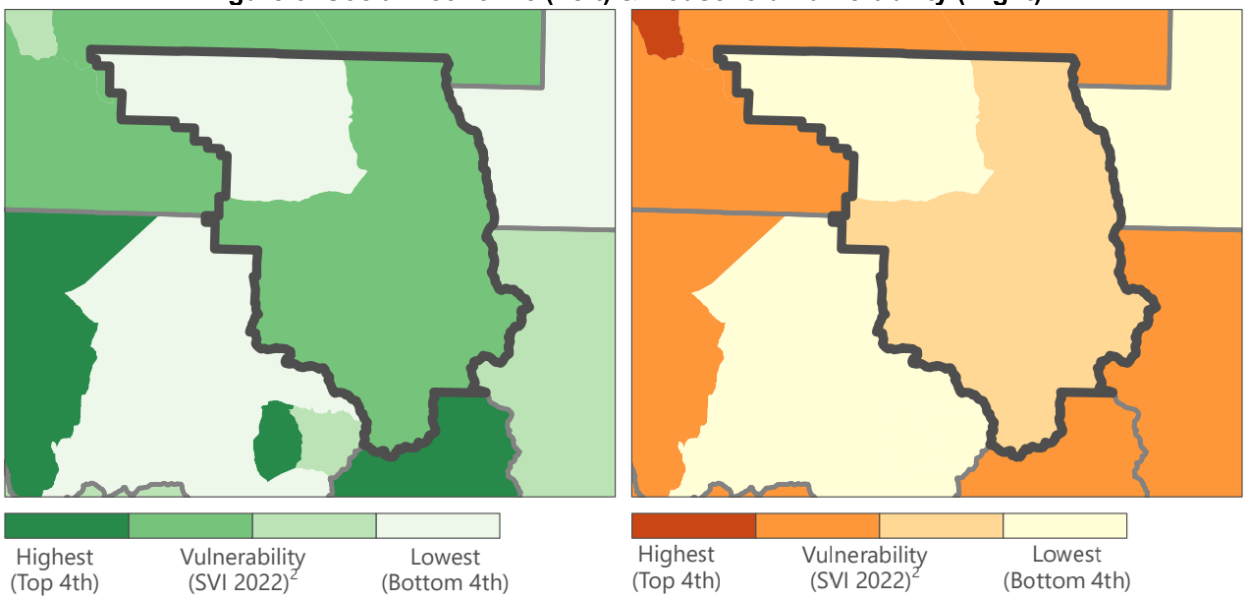
Figure 5: Overall Social Vulnerability



Source: CDC[5]

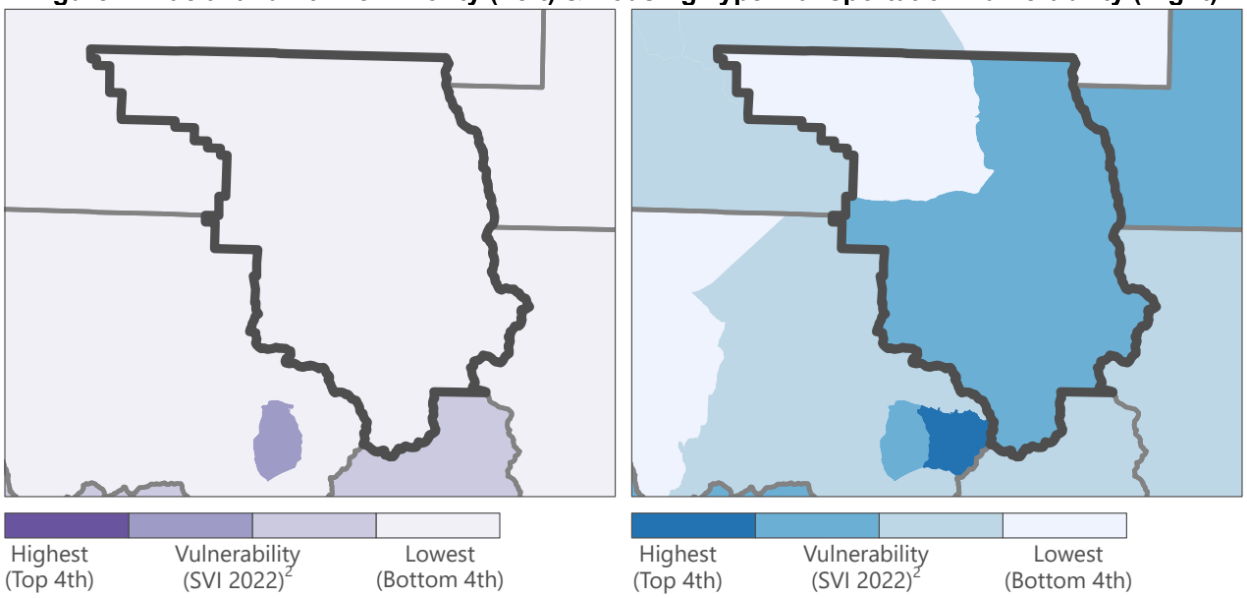
[5] CDC. 2022. "Social vulnerability Index." https://www.atsdr.cdc.gov/place-health/php/svi/index.html.

Figure 6: Social Economic (Left) & Household Vulnerability (Right)



Source: CDC[6]

Figure 7: Racial and Ethnic Minority (Left) & Housing Type/Transportation Vulnerability (Right)



Source: CDC[7]

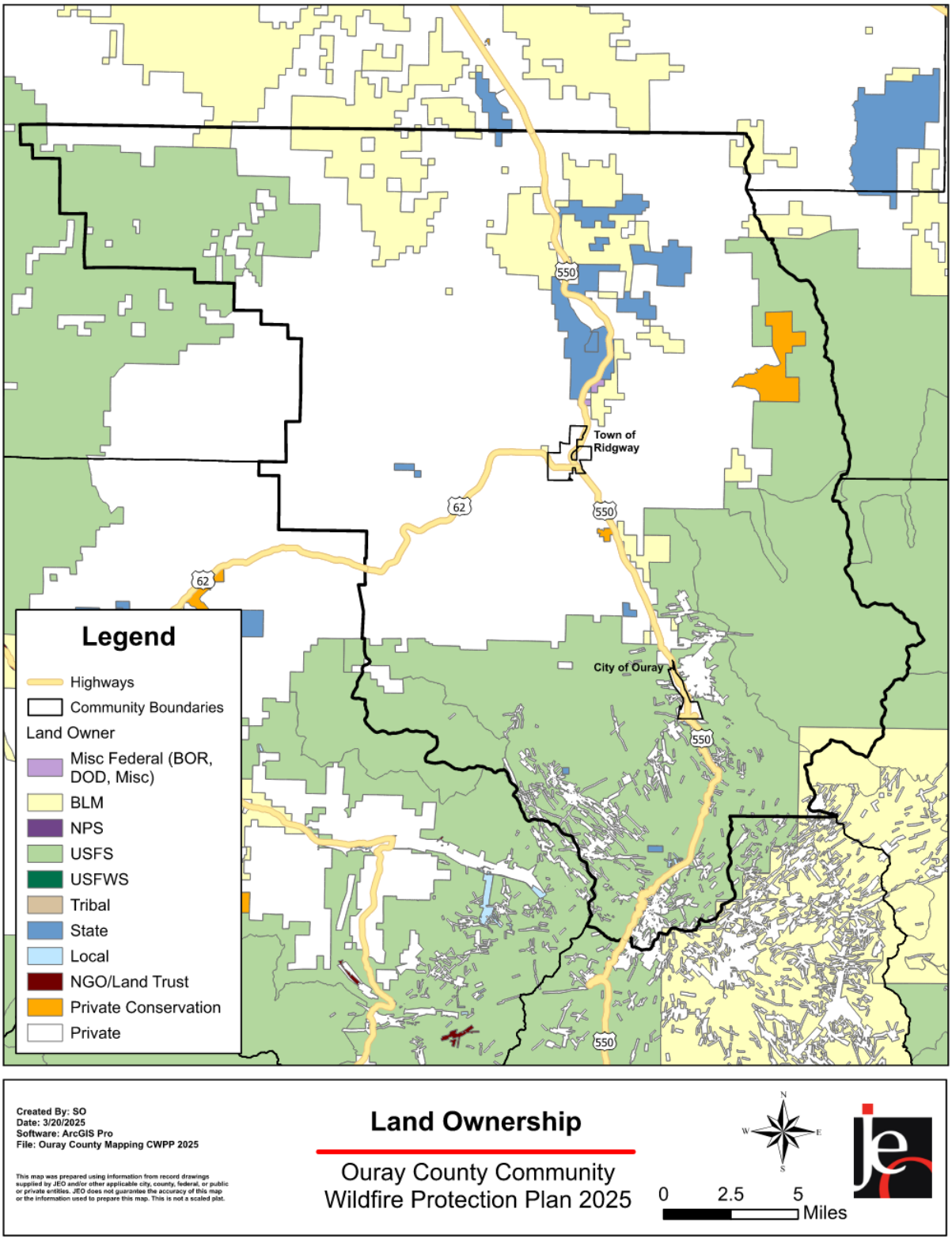
Land Ownership

Ouray County shares borders with Montrose County to the north and northwest, San Miguel County to the west, San Juan County to the south, Hinsdale County to the southeast, and Gunnison County to the northeast. There is a substantial amount of federally owned land in the county. Notably, the Uncompahgre National Forest covers large portions of southern, northwestern, and northeastern Ouray and is owned by the USFS. The state and BLM own land in the north-central portion of the county. Figure 8 shows the landownership in and surrounding

[6] CDC. 2022. "Social vulnerability Index." https://www.atsdr.cdc.gov/place-health/php/svi/index.html.
[7] CDC. 2022. "Social vulnerability Index." https://www.atsdr.cdc.gov/place-health/php/svi/index.html.

the county. Adjacent landowners include the USFS, BLM, State of Colorado, and private landowners.

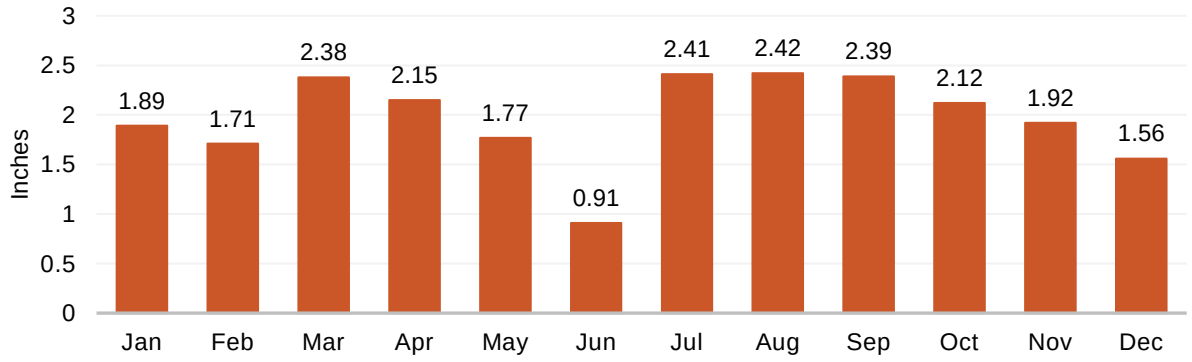
Figure 8: Land Ownership



Climate

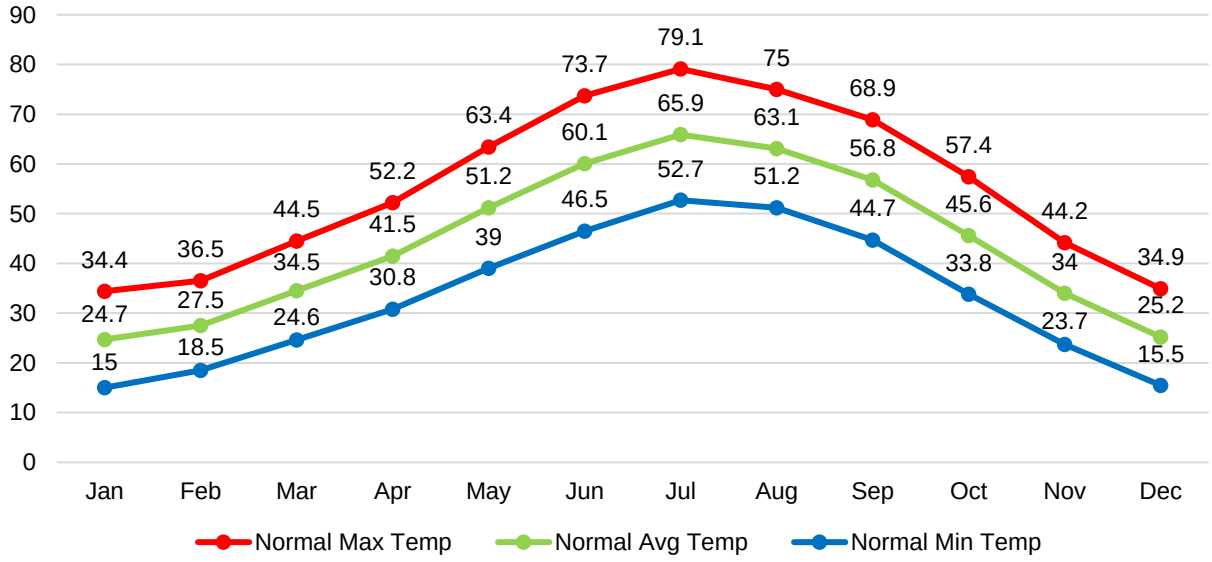
Ouray County has low humidity with annual precipitation and temperature that varies widely due to high peaks and low valleys. Rainfall in the county can be as much as 40 inches in the high-elevation areas to as little as 13 inches in the Ridgway area. Afternoon thunderstorms are common in summer, and lightning causes many wildfires. Precipitation is highest in March, July, August, and September (Figure 9). The temperature in Ouray County ranges from an average high of 79°F in summer to an average low of 15°F in the winter (Figure 10).

Figure 9: Average Monthly Precipitation



Source: NOAA, 1991-2020[8]

Figure 10: Monthly Climate Normals Temperature (°F)



Source: NOAA, 1991-2020[9]

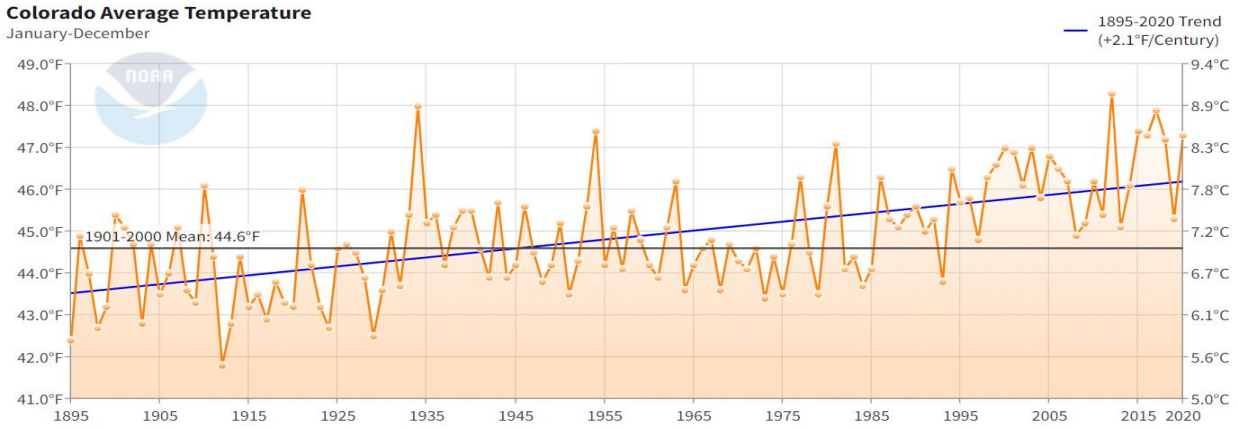
[8] National Oceanic and Atmospheric Administration National Centers for Environmental Information. November 2024. "Data Tools: 1991-2020 Normals". https://www.ncei.noaa.gov/access/us-climate-normals/.

[9] National Oceanic and Atmospheric Administration National Centers for Environmental Information. November 2024. "Data Tools: 1991-2020 Normals". https://www.ncei.noaa.gov/access/us-climate-normals/.

Drought creates ideal conditions for wildfire to start, spread, and become more destructive. They can lead to increased dry vegetation, winds, and water shortages. Historically, drought has occurred in the county in 25% of months.[10] Climate change is anticipated to increase the likelihood, intensity, and duration of drought events, leading to increased wildfire risks.

Since 1895, Colorado's average temperature has increased by 2.1°F. While overall temperature shifts have not been consistent, the trend for rising temperatures is apparent. Climate modeling suggests warmer temperatures will continue in the coming decades and increase steadily into the mid-century. Additionally, the length of the frost-free season has increased nationally since the 1980s. These changes in temperature, water availability, pest pressures, and tree mortality may exacerbate wildfire event conditions.

Figure 11: Colorado Average Temperature (1895-2020)



Source: National Oceanic and Atmospheric Administration, 2020[11]

Vegetation

Ouray County is approximately 44% forested, with many remaining vegetation types dominated by pinyon/juniper, oak shrubland, shrubland, grasslands, and agriculture. The forested areas are primarily spruce-fir (15.6%), hardwood (12.9%), ponderosa pine (8.4%), and mixed conifer (5.4%).[12] Figure 12 shows the existing vegetation for the county. Spruce-fir dominates the southern portions of the county, while a mixture of pinyon-juniper, shrubland, and conifer can be found in the northern portions.

The impacts of insects on the health of trees in Ouray County have been an ongoing concern. In 2023, the Western Balsam Bark Beetle, Western Spruce Budworm, Spruce Beetle, Douglas-Fir Beetle, Fir Engraver, Ips Pinon, and Pine Bark Beetle were all detected in the county.[13] These insects can leave stands of dead trees that may increase fuel for wildfires throughout the county.

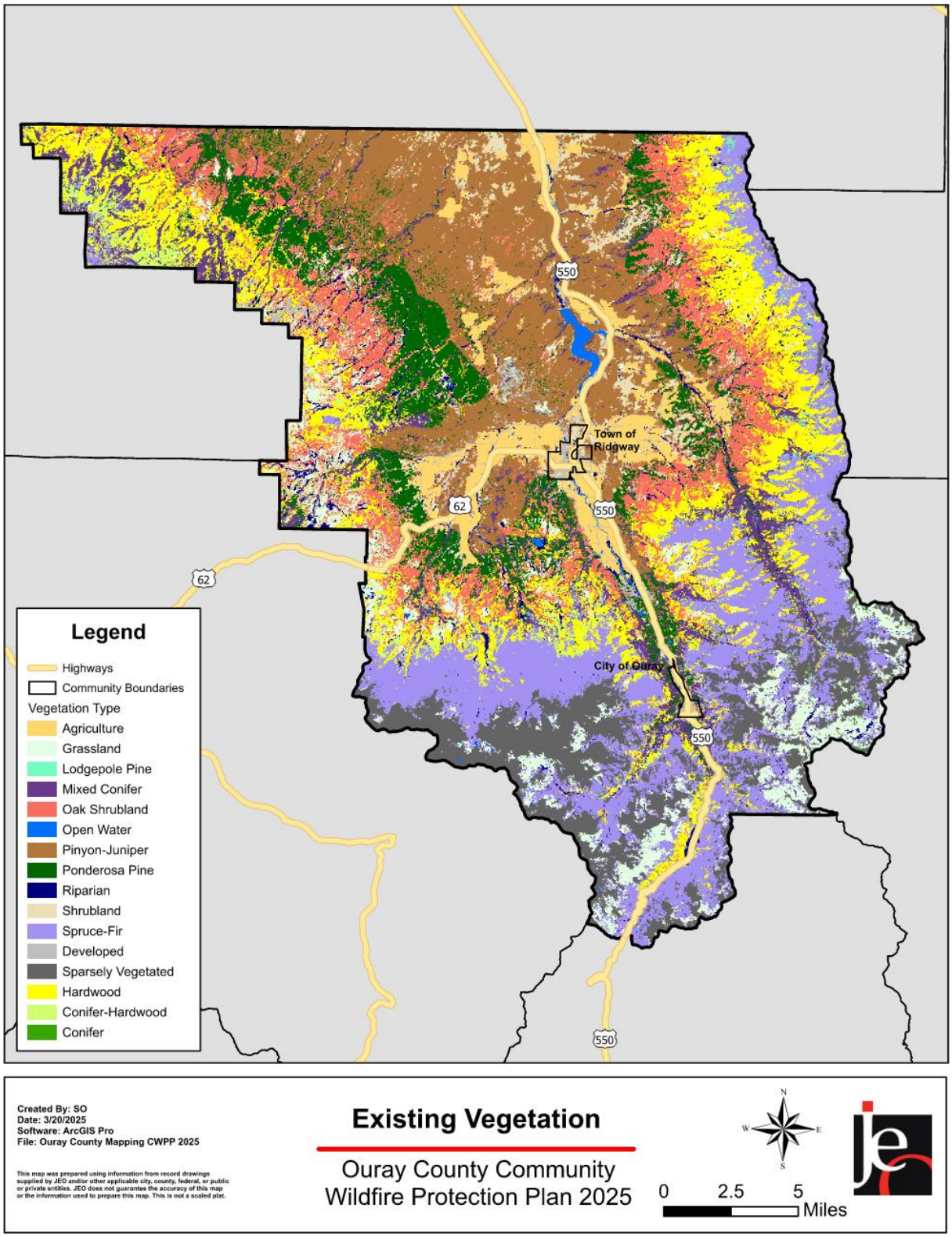
[10] National Centers for Environmental Information. 1895-Oct 2024. "County Time Series". https://www.ncei.noaa.gov/access/monitoring/climate-at-a-glance/county/time-series/CO-037/pdsi/all/9/1895-2023?base_prd=true&begbaseyear=1901&endbaseyear=2000.

[11] National Oceanic and Atmospheric Administration, 2020. "Climate at a Glance: Statewide Time Series". Accessed May 2023. https://www.ncei.noaa.gov/access/monitoring/climate-at-a-glance/statewide/time-series/5/tavg/12/12/1895-2020?base_prd=true&begbaseyear=1901&endbaseyear=2000&trend=true&trend_base=100&begtrendyear=1895&endtrendyear=2020

[12] Colorado State Forest Service. 2022. "2022 Colorado Wildfire Risk Assessment Summary Report."

[13] Colorado State Forest Service. 2023. "2023 Report on the Health of Colorado's Forests". https://csfs.colostate.edu/forest-management/forest-health-report-2023/insects-and-diseases/.

Figure 12: Existing Vegetation



Planning Process Summary

The Ouray County CWPP planning process involved several steps and included input from various governments, organizations, and individuals. This CWPP is tailored to follow the standardized steps (Table 2) for developing a CWPP as outlined in Preparing a Community Wildfire Protection Plan: A Handbook for Wildland-Urban Interface Communities[14] and the CSFS Minimum Standards for Community Wildfire Protection Plans.[15]

Table 2: CWPP Development Process

Step	Task	Explanation
One	Convene Decision Makers	Form an operating group of representatives from local governments, fire authorities, and CSFS.
Two	Involve Federal Agencies	Engage local representatives of the BLM, USFS, and other land management agencies as appropriate.
Three	Engage Interested Parties	Contact and encourage participation from a broad range of interested organizations and stakeholders.
Four	Establish a Base Map	Develop a county base map to understand better communities, critical infrastructure, and forest/open space at risk.
Five	Develop a Risk Assessment	Develop a risk assessment considering fuel hazards, community and commercial infrastructure, resources, and preparedness capability. Rate the level of risk and incorporate it into the base map as appropriate.
Six	Establish Priorities and Recommendations	Use the risk assessment and base map to facilitate a collaborative public discussion that prioritizes fuel treatments and non-fuel mitigation practices to reduce fire risk and structural ignitability.
Seven	Develop an Action Plan and Assessment Strategy	Develop a detailed implementation strategy and a monitoring plan to ensure long-term success.
Eight	Finalize the CWPP	Finalize the county CWPP and communicate the results to interested parties and stakeholders.

Source: Communities Committee et al., 2004

CWPP Stakeholder Group

The initial step in developing the CWPP was identifying a CWPP Stakeholder Group as the decision-making committee. The CWPP Stakeholder Group consisted of representatives from Ouray County, Town of Ridgway, City of Ouray, fire protection districts, power companies, Colorado State Forest Service (CSFS), U.S. Forest Service (USFS), Bureau of Land Management (BLM), and West Region Wildfire Council (WRWC). Members of the CWPP Stakeholder Group collaborated with residents and other stakeholder groups to help develop the plan, provide input on wildfire risk tools, and identify fuel reduction projects and other wildfire mitigation actions.

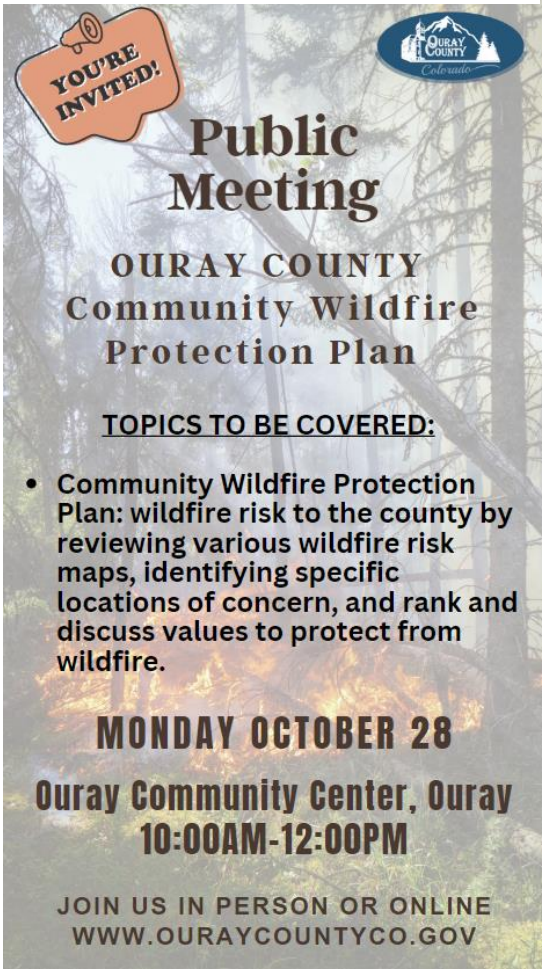
CWPP Meetings

As part of the planning process, four public CWPP meetings were held to discuss various key steps and pieces of the plan. Participants in the CWPP Stakeholder Group were directly invited through email to each meeting. These meetings were also open to the public, and meeting advertisements were made on the county's social media pages, county website, and the Ouray Plaindealer. Below are summaries for each of the CWPP meetings.

[14] Communities Committee et al. March 2004. "Preparing a Community Wildfire Protection Plan: A Handbook for Wildland-Urban Interface Communities." https://www.forestsandrangelands.gov/documents/resources/communities/cwpphandbook.pdf.

[15] Colorado State Forest Service. 2022. "Minimum Standards for Developing Community Wildfire Protection Plans." https://csfs.colostate.edu/wp-content/uploads/2022/03/2022-CSFS_CWPP_Min_Standards.pdf.

Figure 13: 2nd CWPP Meeting Invite



1st CWPP Meeting – August 19, 2024

The first CWPP meeting aimed to introduce the project, outline what a CWPP entails, discuss the benefits of developing a CWPP, and begin initial discussions on the wildfire risk assessment. A total of 32 individuals joined the meeting either in person or virtually.

2nd CWPP Meeting – October 28, 2024

During the second CWPP meeting, the 29 CWPP Stakeholder Group attendees participated in an activity to rank values to protect from wildfire, further discuss wildfire risk maps, and started to define the wildland-urban interface.

3rd CWPP Meeting – December 16, 2024

A total of 28 individuals attended the 3rd CWPP meeting. Attendees included members of the CWPP Stakeholder Group and residents in Ouray County. During the meeting, results of the public survey were shared, risk maps and wildland-urban interface definitions were finalized, and wildfire mitigation project examples were shared.

4th CWPP Meeting – February 18, 2025

The 4th CWPP meeting primarily identified fuel projects and discussed other wildfire mitigation actions. The 30 attendees participated in a fuel projects identification activity where each person could vote on locations in the county where they would like fuel reduction projects to occur. The group then discussed other non-fuel treatment actions and reviewed the final combined wildfire risk map.

Public Survey

A public survey was developed with the ongoing Hazard Mitigation Plan update to engage the public further and gather more local input on wildfire risks and concerns in the county. Postcards with QR Code links to the survey (Figure 15) were created and sent to every address in the county. Gunnison County also shared social media posts with links to the public survey. Hard copy versions were available at the Ouray County Courthouse and Land Use Office. There were 266 total responses to the public survey.

Of those who completed the survey, 77% said they had the highest or second highest level of concern that wildfire will impact them or the values they care about. Additionally, 70% felt that Ouray County would have a major wildfire in the next five years. Only 13% of respondents answered that they had not taken any measures to protect their homes from wildfire. Of those who had taken measures, 77% cleared litter, debris, and other combustible materials from around their property, and 45% used fire-resistant materials on their homes. The most commonly identified barriers to wildfire mitigation work on private property included cost, time, and knowledge of what to do. Cost and time can be challenging to overcome; however, public

education can help address the “knowledge of what to do” barrier. A complete summary report of the survey responses can be found in *Appendix A: Public Survey Summary*.

Figure 14: Measures Taken to Protect Home or Property

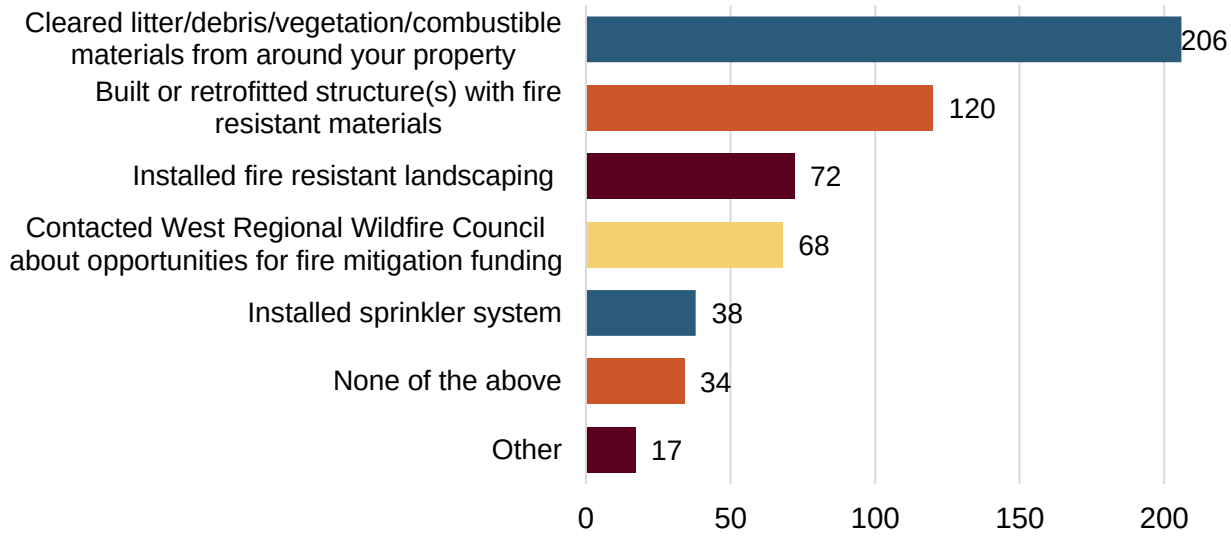


Figure 15: Ouray County Hazards Survey Postcard

CWPP StoryMap

To further connect the public with the CWPP and to provide additional public education, an online StoryMap was created. The online StoryMap includes an overview of the CWPP planning process, wildfire risk assessment, identified fuel treatment projects, identified mitigation actions, and steps that homeowners can take to protect their property. This StoryMap will continue to be updated by Ouray County as fuel treatment projects are completed and new information is gathered.

The online StoryMap can be viewed here: [StoryMap is Currently Under Development].

2| Wildfire Preparedness

Preparing for wildfires is crucial to reducing risk and ensuring safety before a fire starts. In Ouray County, diverse land ownership and jurisdictional boundaries necessitate strong interagency coordination, planning, and collaboration for effective wildfire management. This cooperation is essential for fire suppression and prevention, preparedness, mitigation, and financial sustainability. This section will highlight key local planning documents and wildfire-related programs, examine the wildfire-urban interface, explore potential operational delineations, and provide an overview of local fire district capabilities.

Planning Preparedness

Wildfire planning is a crucial process that helps communities, land managers, and emergency responders prepare for, mitigate, and respond to wildfire threats. The plans and programs below relate to wildfire mitigation, response, and recovery within Ouray County.

Existing CWPPs

The previous Ouray County CWPP was completed and approved in 2011. The Ouray County CWPP is a valuable resource that provides the foundation for understanding wildfire risk and presents attainable milestones designed to reduce potential losses from wildfire. Communities, home-owner associations, and individual fire protection districts can take further action by developing their area-specific CWPP, which would tier the countywide CWPP. The following area-specific CWPPs can be found in Ouray County.

- 4 Neighborhood CWPP (2007)
- Log Hill Mesa Fire Protection District (2012)

Firewise USA

The National Fire Protection Association administers the Firewise USA recognition program and provides a framework for neighborhoods and communities to increase ignition resistance of homes and reduce wildfire risks locally. Firewise participants in Ouray County include Log Hill Mesa and the Fisher Canyon South.[16]

Ouray County Hazard Mitigation Plan

The Ouray County Hazard Mitigation Plan identifies the natural and human-caused hazards that threaten the county and communities, the likely impacts, and the identified mitigation actions to reduce the effects of those hazards. The plan is being updated and is anticipated to be approved in the summer of 2025. Wildfire is directly discussed in the plan, and this CWPP's risk assessment has been integrated into it. Several wildland fire mitigation actions were identified in the plan and added to this CWPP as applicable. Once approved, the hazard mitigation plan will be found here: https://ouraycountyco.gov/272/Emergency-Management.

Ouray County Master Plan

The master plan is designed to guide the future actions and growth of the county. Wildfire is directly discussed in the plan, and a specific wildfire strategy is identified. The plan calls for the county to "continue to maintain strong wildfire mitigation regulations and encourage fire protection

[16] National Fire Protection Association. March 2025. "Firewise USA Sites." https://www.nfpa.org/education-and-research/wildfire/firewise-usa#firewise-usa-sites.

and water supply entities to work proactively to make further improvements for fire safety, including the possible creation of a unified fire protection district or entity that covers the entire county." Also discussed in the plan are natural environment, land use, emergency management, and infrastructure strategies. Strategies related to emergency management include supporting hazard mitigation and evacuation plans, integrating mitigation strategies into the Land Use Code, limiting development in areas where emergency services cannot be provided, and enhancing emergency services in Ouray County. To view the 2025 Ouray County Master Plan, visit: https://ouraycountyco.gov/DocumentCenter/View/21045/OC-2025-Master-Plan-Final-021225?bidId=.

Ouray County Multijurisdictional Emergency Operations Plan

The 2024 Ouray County Emergency Operation Plan outlines general guidelines on how the county manages operations related to the five phases of emergency management. It outlines the day-to-day management of incidents along with major emergencies and disasters. The plan covers emergency management operations, assignment of roles and responsibilities, emergency support functions, direction, control, and coordination, information collection and dissemination, communications, administration, finance, and logistics. During an emergency wildfire event, the emergency operations plan would help to guide the response approach. A copy of the plan can be found here: https://ouraycountyco.gov/DocumentCenter/View/20837/Ouray-County-Multijurisdictional-Emergency-Operations-Plan-EOP-1.

Ouray County Multijurisdictional Evacuation Plan

Ouray County completed its evacuation plan in 2024. Additional information about the plan can be found in the Evacuation Preparedness discussion later in this section.

Ouray County Wildfire Annual Operating Plan

The Ouray County Wildfire Annual Operating Plan establishes standard operating procedures and responsibilities to implement cooperative wildfire protection on all lands within the county. It contains information about interagency cooperation, preparedness, operations, state of emergency fire fund, and interagency fire resource use and reimbursement. During a wildfire event, the operating plan will help with interagency coordination. To view the plan, visit https://ouraycountyco.gov/DocumentCenter/View/18208/Ouray-County-Wildfire-Operating-Plan.

San Miguel and Ouray County Regional Climate Action Plan

Ouray County partnered with neighboring San Miguel County to create the 2021 San Miguel and Ouray County Regional Climate Action Plan. This climate action plan is a regional roadmap for reducing greenhouse gas emissions and creating a sustainable, thriving future. The plan establishes a timeline for high-priority, ongoing, mid- and long-term actions. While there are no specific wildfire actions, the overall goal will help to reduce the likelihood and impacts of wildfire. A copy of the plan can be found here: https://static1.squarespace.com/static/52a753f8e4b049b53e3f219b/t/6171bd130ecd9d0e3e2f9c5a/1634843945688/EAP_Regional+Cap.FINAL.pdf.

State of Colorado Wildfire Resiliency Code

The Colorado Wildfire Resiliency Code Board is creating a statewide wildfire resiliency code. Once approved and adopted, all counties and communities must comply with this code. However, local wildfire regulations can exceed the state code requirements. For updates on the planning process and to view draft versions of the wildfire resiliency code and map, visit https://dfpc.colorado.gov/WRCB.

Wildfire Mitigation Regulations

Ouray County's 2020 wildfire regulations apply to all newly constructed or improved dwelling units in the county. It requires that dwelling units meet standards for roofing, siding, a five-foot hardened zone, exterior doors, gutters, and emergency vehicle access. Wildfire mitigation requirements for planned unit developments are also included. The regulations do not apply to vacant land or commercial structures. A copy of the wildfire mitigation regulations can be found here: https://ouraycountyco.gov/DocumentCenter/View/12675/Section-16-Wildfire-Mitigation-Effective-May-1-2020pdf.

Wildland-Urban Interface

There are many definitions of the Wildland-Urban Interface (WUI). Most identify it as any area where improvements are built close to, or within, natural terrain and flammable vegetation and where potential for wildland fire exists. It was decided through discussions at the CWPP meetings that the entire county would be identified as the WUI.

While the entire county would be identified as the WUI, the CWPP Stakeholder Group felt it important to identify priority areas. These areas were defined as any location within a half mile of power lines, buildings, emergency response and governmental services, communication towers, highways, and water infrastructure. These would be the WUI priority areas where wildfire mitigation on private property would be focused. Figure 16 shows the WUI map for the Ouray County CWPP.

Wildfire mitigation on private property in WUI priority areas is essential because these are high-risk areas where property, infrastructure, and people come into direct contact with wildland vegetation. Without proper mitigation, wildfires in the WUI priority areas can spread rapidly, endangering lives, overwhelming emergency responders, and causing devastating economic losses. Strategies such as defensible space creation and reducing structural ignitability can significantly lower the risk of fire spreading to homes and critical infrastructure.

Defensible Space

The purpose of defensible space is to reduce the fuel near the home and provide a space for firefighters to protect the house. For a structure to survive a wildfire, radiated heat and fire intensity must be kept to a minimum. Defensible space is accomplished by a combination of clearing and thinning trees and other vegetation around the proposed or existing structures and along the driveway. Defensible space requirements are designed to minimize the impact on the property while providing safety for the structures, the inhabitants, and the firefighters.

The Home Ignition Zone Guide developed by CSFS provides guidelines for creating a defensible space. To develop the most effective defensible space plan possible, the property is evaluated and divided into 3 Zones (Figure 17).

Figure 16: Wildland-Urban Interface

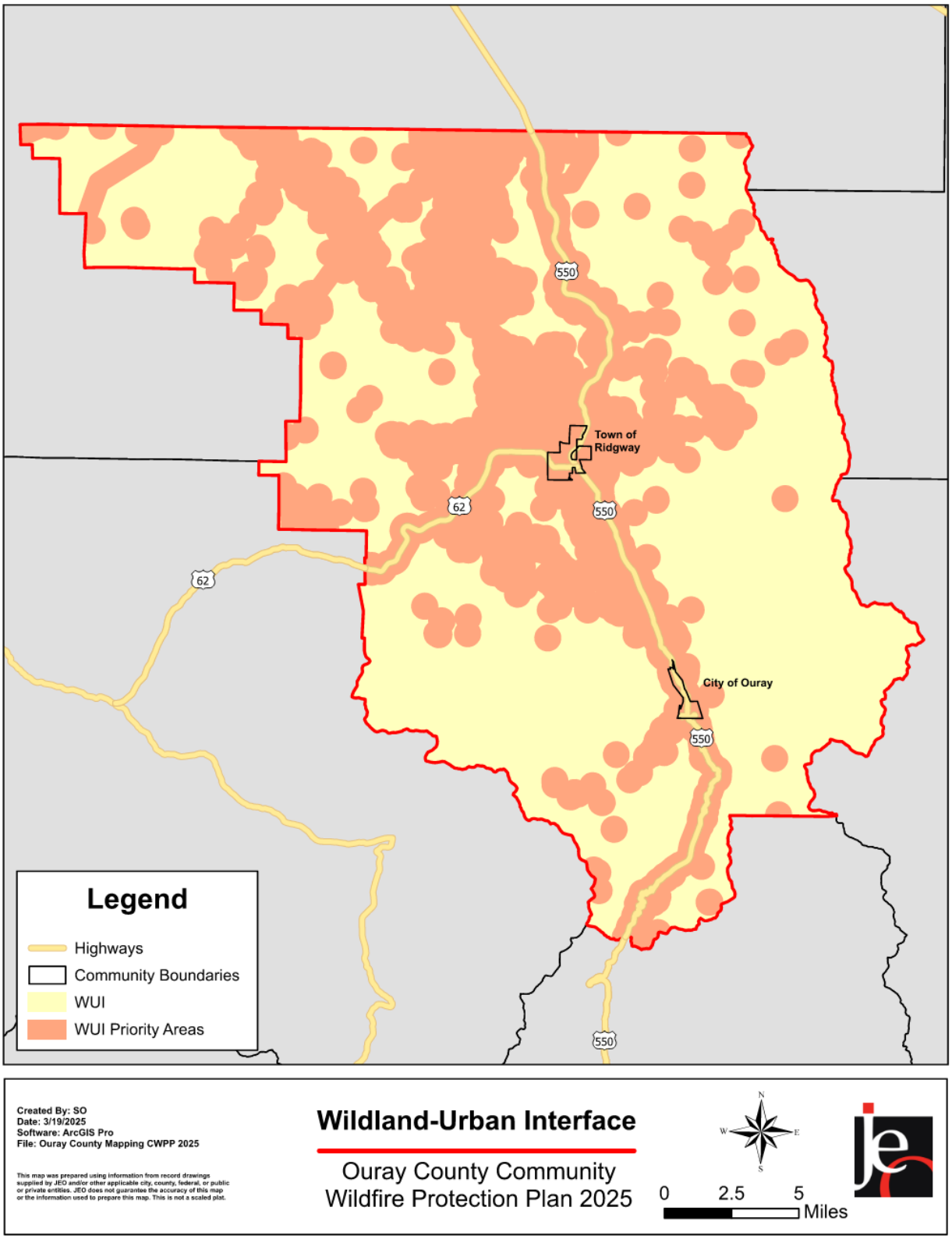
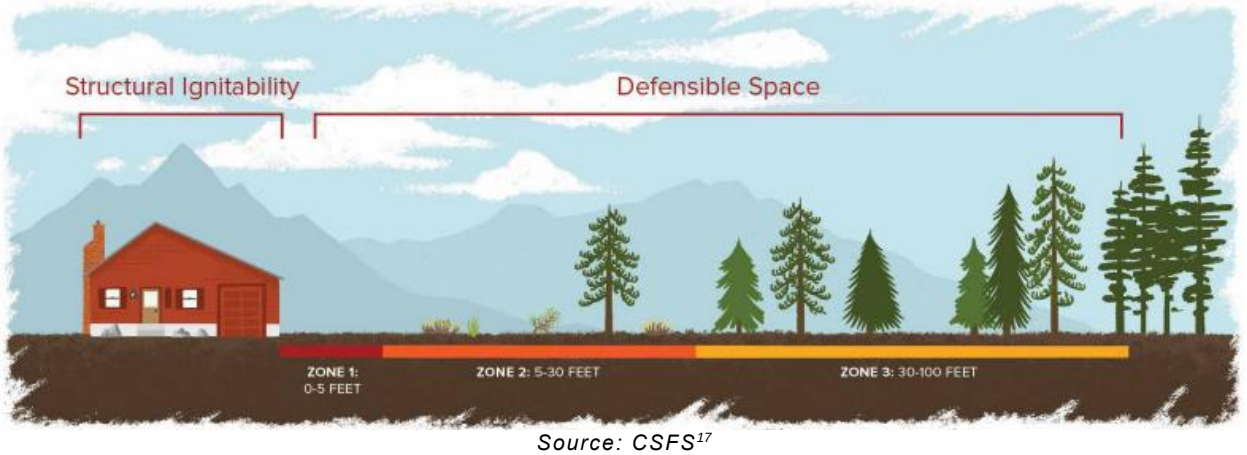


Figure 17: Home Ignition Zones



Source: CSFS[17]

Zone 1 is the area nearest the home (0-5 feet). This zone requires the most vigilance to reduce or eliminate ember ignition and direct flame contact with your home. Use nonflammable, hard surface materials in this zone, such as rock, gravel, sand, cement, bare earth, or stone/concrete pavers.

Zone 2 is the area transitioning away from the home where fuels should be reduced (5-30 feet). This zone is designed to minimize a fire's intensity and ability to spread while significantly reducing the likelihood that a structure ignites because of radiant heat.

Zone 3 is the area farthest from the home (30-100 feet). It extends 100 feet from the home on relatively flat ground. Efforts in this zone are focused on keeping the fire on the ground and getting a fire that may be active in tree crowns to move to the ground where it will be less intense.

One of the significant issues confronting defensible space is the need for ongoing maintenance. Treatment projects in timber or shrub fuels have an effective life span of approximately 10 to 15 years before vegetation regeneration once again creates hazardous fuel loads.

Structural Ignitability

There are several characteristics of homes that make them more vulnerable to wildfires. These common characteristics are listed below.[18]

- Horizontal or nearly horizontal surfaces, such as wood decks
- Wooden or plastic fences
- Wood or shake-shingle roofs
- Roofs with eaves
- Combustible building materials
- Single-paned windows
- Vents with gaps that exceed 1/8 of an inch

[17] Colorado State Forest Service. 2021. "The Home Ignition Zone". https://csfs.colostate.edu/wp-content/uploads/2021/04/2021_CSFS_HIZGuide_Web.pdf.
[18] Colorado State Forest Service. 2021. "The Home Ignition Zone". https://csfs.colostate.edu/wp-content/uploads/2021/04/2021_CSFS_HIZGuide_Web.pdf.

- Fuels such as tall grass, woodchips, trees, or shrubs within five feet of a home or under decks
- Pine needles in gutters
- Firewood or propane tanks within 30 feet of the home

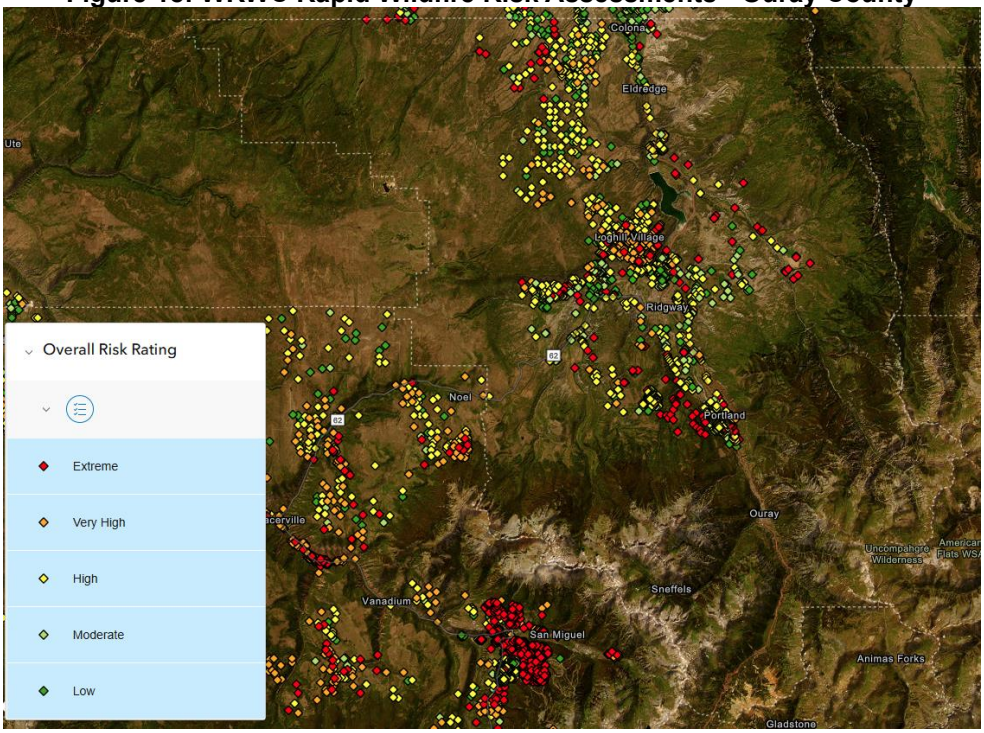
Using fire-safe building materials such as a Class A fire-resistant roof and reducing vegetative fuels surrounding homes are key to reducing structure ignitability. However, completely fireproofing structures can be prohibitively expensive. Conversely, trying to provide a defensible space large enough for a typical, combustible structure may not be practical because firebrands are known to be carried by winds over a mile away from a fire. Combining these two strategies may be the best alternative for a particular site.

Research has demonstrated that homes with a Class A-rated roof and a defensible space have an 85% chance of surviving a wildfire. The Class A-rated roof protects the home from firebrands that may blow onto the roof from a nearby wildfire. The house's structural integrity can be improved using fire-resistant siding and other building materials. Wooden decking should be avoided because it can be a significant source of home ignition, much like wood roofing material. Improving the fire-resistant characteristics of a structure goes hand-in-hand with developing defensible space. Extensive recommendations can be found in CSFS publications available at https://csfs.colostate.edu/wildfire-mitigation/protect-your-home-property-from-wildfire/.

West Region Wildfire Council Programs

The WRWC has two programs to help homeowners with defensible space and structural ignitability. The first is the Rapid Wildfire Risk Assessments. WRWC conducts curbside assessments of properties and gives an assessment rating based on criteria from the Wildfire Research Center. These ratings have been undertaken on many homes in Ouray County (Figure 18).

Figure 18: WRWC Rapid Wildfire Risk Assessments - Ouray County



Source: West Region Wildfire Council

The other program is the Wildfire Ready Home Program. Homeowners can sign up for and learn practical steps to reduce risks around their homes. During the program, homeowners work with a Wildfire Ready Home Assessor who will provide a detailed Wildfire Ready Home Report that contains specific and targeted recommendations.

Potential Operational Delineations

Potential Operational Delineations (PODs) are planning units that can be used for fire containment during wildfire or prescribed fire.[19] They symbolize the safest and most effective lines to prevent fires from spreading. PODs can be natural (ridges, fuel type transitions, etc.) or human-made (roads, fuel breaks, etc.). Ouray County has recently gone through the process of identifying the POD boundary lines in the county (Figure 19). These POD boundaries can be instrumental in identifying fuel treatment projects because of the strategic framework they provide. They can help predict fire behavior and identify areas where fuel treatments will most effectively slow or stop wildfire movement. Fuel treatments along POD lines can help create safer evacuation routes and provide a common framework for interagency coordination.

Fire District Capabilities

Four fire protection districts operate in Ouray County: Log Hill Mesa Fire Protection District, Montrose Fire Protection District, Ouray Fire District, and Ridgway Fire District. Only a tiny portion of the Montrose Fire Protection District falls within Ouray County, and the rest of the districts are located in the county. Figure 20 shows the locations of the fire districts. In addition to the fire protection districts, the Horsefly Volunteer Fire Protection Association is a donation-based, all-volunteer association that provides wildfire fire response and emergency services to properties along Government Springs Road, Wildcat Canyon Road, Mariposa Drive, and the Cornerstone subdivision in southwestern Ouray County and southern Montrose County. There have been discussions about combining all fire districts into one unified fire district that covers the entire county. However, nothing has been decided as of this CWPP.

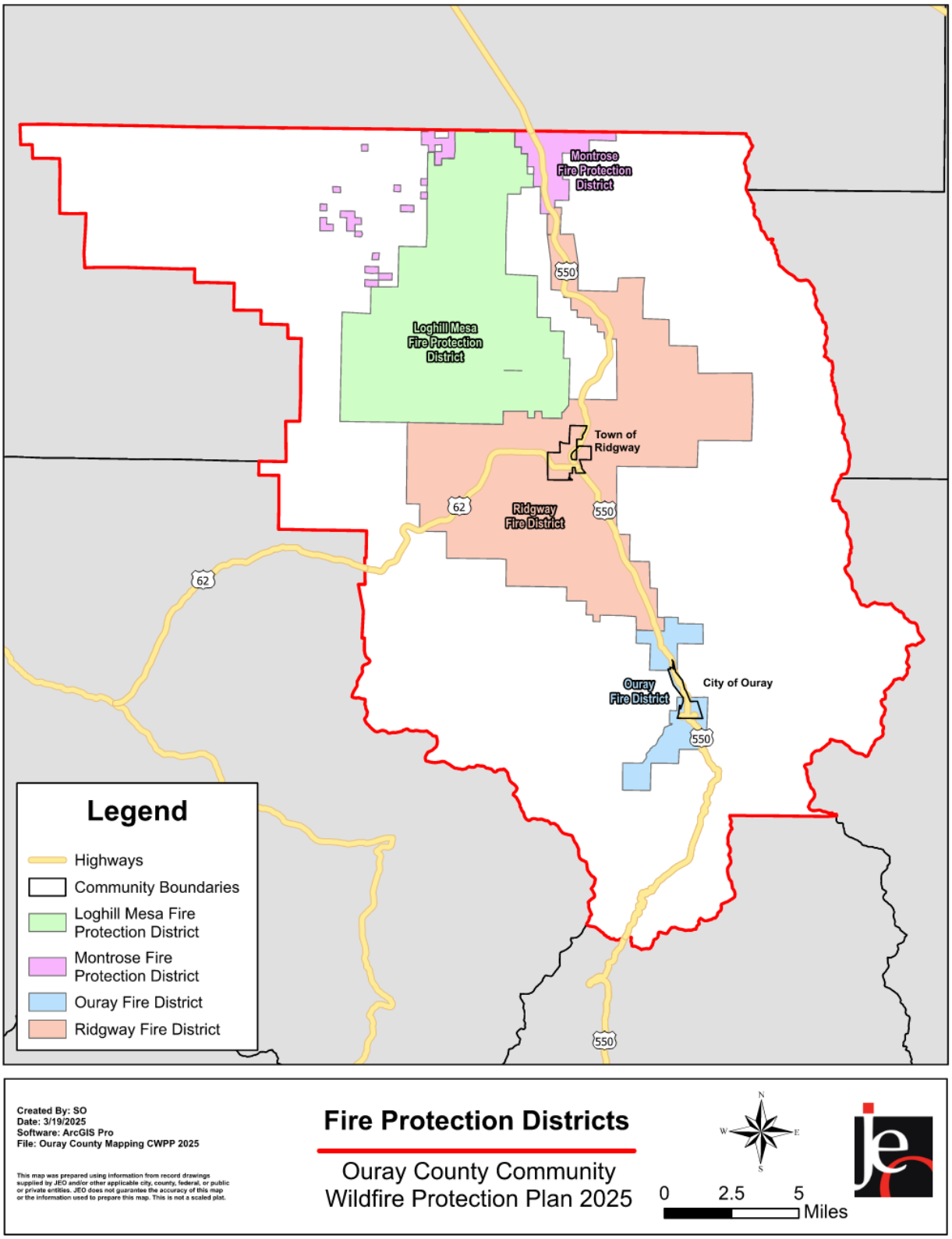
Authority for wildland fire suppression on non-federal land rests with the local fire protection districts or the County Sheriff for any areas outside fire protection district boundaries. Federal jurisdictional agencies (USFS, BLM) are responsible for wildfire protection on federal land. The Division of Fire Prevention and Control does not have jurisdiction over any lands until authority and responsibility are transferred by mutual consent from the County Sheriff. If multiple agencies are engaged in a fire on or near common boundaries, agency representatives will convene to decide on the best fire strategy and delegate an Incident Commander. Mutual aid agreements among the agencies guide the initial wildfire attack and support during an incident. Wildfire protection within the county cannot be accomplished by solely one authority because of the complexity of land ownership. Cooperation and coordination are key to effective wildfire and fuels management, which is coordinated through the Ouray County Wildfire Annual Operating Plan.

The following information describes the updated capabilities assessment results sent to all fire chiefs. The capabilities discussed include training, personal protective equipment (PPE), communications, equipment, and water supply.

[19] U.S. Forest Service. January 13, 2022. “PODs at a Glance.” https://research.fs.usda.gov/rmrs/understory/pods-glance.

Figure 19: POD Boundaries

Figure 20: Fire Districts in Ouray County



Horsefly Volunteer Fire Protection Association

Training

The Horsefly Volunteer Fire Protection Association has done a commendable job in wildland fire training for a donation-based, all-volunteer fire association. All firefighters must take the entry-level wildland fire course S-130/190; a few have also taken S-131 Firefighter Type 1. Other wildland courses are sought and offered as available. All firefighters must take the annual fire refresher (RT-130) to retain wildlife firefighter status and be allowed on fires. The work capacity test is not required. Department trainings occur twice monthly during fire season, typically May through September, and sometimes include a live-fire exercise for one of the trainings each year. The association has a dedicated training officer who coordinates training with the fire chief.

Personal Protective Equipment

Most PPE is provided to firefighters, including Nomex pants and shirts, fire packs, helmets, gloves, and new-generation fire shelters. Boots are not provided at this time.

Communications

The association has ten 800 MHz pack sets, four 800 MHz mobile radios as of the summer of 2025, and existing VHF handheld and vehicle radios. The association is seeking additional radio infrastructure.

Equipment
The Horsefly Volunteer Fire Protection Association has two Type 3 engines and three Type 6 brush trucks at the Mariposa Road station. Additionally, some volunteers have personal brush trucks and water trailers staged around the hill.

Water Supply
The availability and location of water resources are limited throughout most fire association areas. The association fills tanks from fill stations along Government Springs Road and within the Cornerstone development. The association has a 5,000-gallon cistern at the firehouse. Many other areas serviced by the association lack available water supplies. Some homes have cisterns and seasonal ponds in certain areas, but they require time and effort to draft water from them. Shuttle trips can be set up to bring water back to the fire area; however, that takes additional time, personnel, and equipment.

Log Hill Mesa Fire Protection District

The Log Hill Mesa Fire Protection District has completed several wildfire mitigation projects since 2011. A summary is listed in *Appendix B: Fuel Treatment History.*

Training
Members of the Log Hill Mesa Fire Protection District go through a relatively rigorous training program for a volunteer fire department. All firefighters are required to take the entry-level wildland fire course S-130/190 within two years of joining. Other wildland courses are also offered to department members, including those taught at the statewide fire academies and the Colorado Firecamp. All firefighters are required to take one of two fitness tests offered each year, which includes the standardized Work Capacity Test. Department trainings occur bimonthly on the first Wednesday and second Saturday of each month and include a wildfire component during the typical fire season months. An in-house sawyer class is also offered annually to all department members.

Personal Protective Equipment
All PPE is provided to firefighters. This includes Nomex pants and shirts, fire packs, boots, and a new-generation fire shelter.

Communications
All firefighters are equipped with portable VHF radios, which are compatible with federal and state agencies. The chief and assistant chief also have portable 800 MHz radios. All fire apparatus is equipped with mobile VHF radios, and select vehicles also have mobile 800 MHz radios.

Equipment
The Log Hill Mesa FPD has several wildland fire trucks. At the Log Hill Village station (Station 2), the department is equipped with one 400-gallon Type 1 engine with a 1,500 GPM pump; one 750-gallon Type 3 engine with a 750 GPM pump; one 350-gallon Type 6 brush truck with a 150 GPM pump; one 3,000-gallon tender with a 500 GPM pump and a 3,000-gallon dump-tank; and one utility vehicle (UTV) with a 50-gallon tank and a 50 GPM pump. Additionally, at the North Log Hill station (station 1), the district has one Type 3 engine with 750 gallons of storage and a 750 GPM pump; one Type 6 brush truck with 350 gallons of storage and a 150 GPM pump; one 3,000-gallon tender with a 500 GPM pump and a 3,000 gallon dump-tank; one 1,000-gallon tender with a 250 GPM pump; and one UTV with an 80-gallon tank and a 50 GPM pump.

Water Supply
The availability and location of water resources are an issue in some parts of the district. While there are adequate fire hydrants within most of the Log Hill Village/Fairway Pines community, many other areas serviced by the FPD lack adequate water supplies. Scattered hydrants and cisterns are available in these areas but may not be reliable or known by all fire personnel. See the individual community/planning area write-ups for details on water supply within the community/planning area.

Montrose Fire Protection District

Training
The Montrose Fire Protection District (FPD) is composed of 47 members. All FPD members have taken the S-130/190 introductory wildland fire course. Additional wildland fire courses are also offered by the Montrose FPD and are paid for by the department. A regular training program is conducted on duty for FPD members. Furthermore, the Montrose FPD members take the work capacity test and fire refresher annually.

Personal Protective Equipment
Montrose FPD provides Nomex pants and shirts, wildland boots, helmets, fireline packs, and new-generation shelters.

Communications
The department uses VHF and 800 MHz radios, with 21 mobile and 55 handheld units. All trucks are equipped with radios in their apparatus.

Equipment
The Montrose FPD has three Type 6 engines, one 500-gallon Type 3 engine, three 1,000-gallon Type 1 engines, one 750-gallon Type 1 engine, and one 3,000-gallon tender.

Water Supply
Water availability varies within the area; however, a minimum of 500 gallons per minute (GPM) is available in areas with newer subdivisions. Both hydrants and ponds are present and serve as water sources within the region. Flow rates for hydrants are not tested annually. However, flow rates vary from 100-500 GPM and depend on the hydrant location.

Ouray Fire District

Source: Geryll Zehr

Training
Though not required, firefighters of the Ouray Fire District are encouraged to take the entry-level wildland fire course S-130/190. However, the district attempts to have five department members current in this fire course. Additional wildland fire courses are also offered and paid for but not required. The work capacity qualification assessment is also offered should members choose to take it, but it is not required. The district has a scheduled training program, which occurs bi-weekly and includes a wildland component in the spring and summer months.

Personal Protective Equipment
All wildland PPE is available for purchase by all qualified cardholders in the district.

Communications
Communication occurs via VHF radios; the district has a VHF radio for every member. All officers have full access to 800mh communication with dual-band radios. All apparatus also have radios, VHF radios, and 800mhz. The City of Ouray operates under a cumbersome dispatch system, whereby the Ouray Fire is dispatched through WESTCO dispatch out of Montrose.

Equipment
The Ouray Fire District has five fire apparatus. These include one 500-gallon Type 1 engine (4x4) with a 1,500 GPM pump, one Type 5 brush truck with a 400-gallon tank and 350gpm pump, one 500-gallon Type 2 engine (4x4) with a 750 GPM pump, one 2,000-gallon tender with a 1,250 GPM pump. All five trucks are housed at the Ouray station. They also have two command/ rescue vehicles, which are crewed 24/7.

Water Supply
The availability of water resources within the communities in Ouray's district is not a significant problem. Hydrants are present throughout most of the city and outlying areas. The district's other communities have large ponds and creek and river resources available for drafting. Water sources, including hydrants, are not marked, however.

Ridgway Fire District

Training
While not required, all firefighters of the Ridgway FPD are encouraged to take the entry-level wildland fire course S-130/190. The work capacity test qualification assessment is also offered should members choose to take it, but it is not required, and most department members do not take it, nor do they take S-130/190. Additional wildland fire courses are also offered and paid for but are not required. The department does have a scheduled training program, which occurs monthly and includes a wildland component in the spring and summer months.

Personal Protective Equipment
All PPE is provided to firefighters. This includes Nomex pants and shirts, fire packs, boots, and a fire shelter. Shelters are not, however, new generation.

Communications
Communication occurs via VHF radios. Some 800 MHz radios are available, but the department needs additional training in using the equipment.

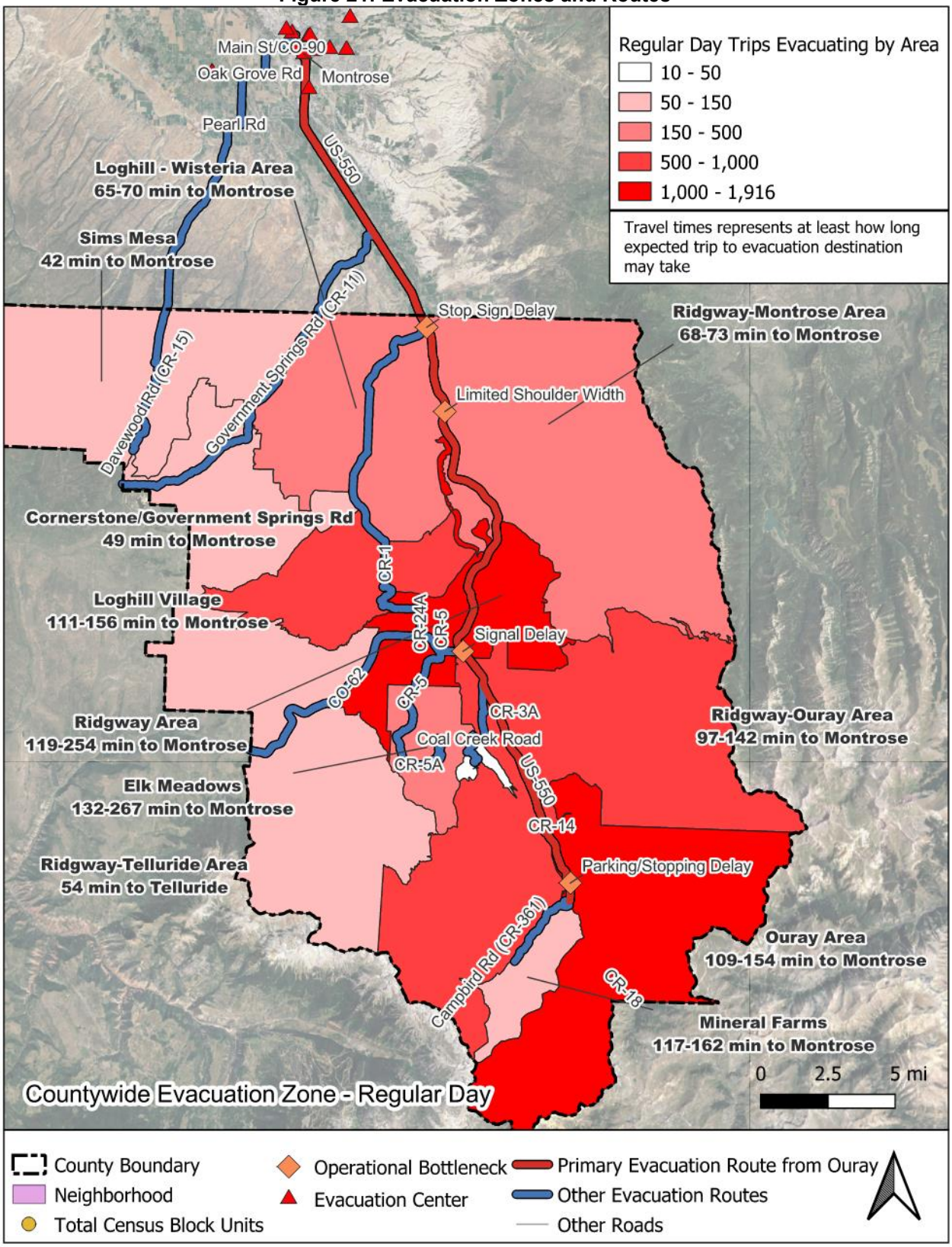
Equipment
The Ridgway FPD has several fire trucks, though only one is specific to wildland firefighting. Their apparatus includes two Type 1 structure engines (4x4): one that carries 2,300 gallons with a 1,000 GPM pump and another that carries 750 with a 1,750 GPM pump. They also have a Type 2 structure engine that can carry 500 gallons of water with a 750 GPM quick-response pump and a two-wheel drive tender that can carry 2,400 gallons with an 800 GPM pump. Specific to wildland firefighting, Ridgway has one 180-gallon Type 6 engine. This truck is low to the ground, which could be problematic in rural areas with poorly maintained dirt roads. This truck also has a bad pump that needs to be replaced.

Water Supply
The availability and location of water resources is a critical problem throughout the fire protection district. While there are adequate fire hydrants within most of the area near the town of Ridgway and other outlying communities, many other areas serviced by the FPD lack adequate water supplies. While some homes have cisterns available for fire department use, they are often small in capacity. Creeks and ponds are available in some areas, but they require time and effort to be spent in the process of drafting water from them. Moreover, shuttle trips will need to be set up to bring water back to the fire area, which will take personnel and apparatus away from the firefighting effort. See the individual community/planning area write-ups for details on water supply within the community/planning area.

Evacuation Preparedness
Access and evacuation are an essential component of any local wildfire response. Access characteristics dictate the efficiency of emergency evacuation and the effectiveness of emergency response. Preferably, road design provides multiple points of ingress and egress, supports two-way traffic flow, and offers adequate emergency apparatus turnaround radius on dead-end roads and cul-de-sacs.

Ouray County completed a county-wide emergency evacuation plan in 2024. It identified such items as the primary evacuation routes, challenges regarding evacuation, and roles and responsibilities during an evacuation event. Figure 21 shows the evacuation zones, routes, potential bottlenecks, and travel times.

Figure 21: Evacuation Zones and Routes



Designated evacuation routes include the following.

- North-bound towards Montrose via Highway 550 and Ouray County Road 1
- South-bound towards Silverton via Highway 550
- West-bound towards Placerville via Highway 62
- East-bound towards Cimarron/Gunnison via Ouray County Road 8

Several areas are at high risk due to limited transportation corridors throughout Ouray County. Many include, but are not limited to, the areas identified below.

Table 3: High-Risk Evacuation Areas

Area Name	# of Ways In & Out	Road Identifiers
Black Lake	2	CR 17 North or CR 17 South
Colona	2	US Hwy 550 North, US Hwy 550 South, or County Road 1
City of Ouray	3	US 550 North, US 550 South, or CR 17
Elk Meadows	1	CR 5
Idlewild/KOA Campground	2	CR 23 or CR 17
Log Hill Mesa	3	CR 1, CR 24, or CR 22
Mineral Farms	1	CR 361
Park Estates	2	CR 17 North or CR 17 South
Panoramic Heights/Lake Lenore	1	CR 14
Pleasant Valley	1	CR 24
Ponderosa Village	2	US Hwy 550 North or US Hwy 550 South
Ridgway Reservoir State Park	2	US Hwy 550 North or US Hwy 550 South
Town of Ridgway	4	US HWY 550 North, US Hwy 550 South, US Hwy 62, or CR 5
Whispering Pines	1	US Hwy 550 North, US Hwy 550 South, or CR 17

Residents and visitors to Ouray County should be aware that evacuation resources are limited. Everyone is responsible for evacuating as quickly and safely as possible. Given the scale of the plan, it was not feasible to identify evacuation routes for each house or neighborhood. Individuals at the neighborhood level should plan the best routes that lead to the main evacuation routes identified in the county plan. These plans will lead to residents becoming more prepared during an evacuation event.

3| Wildfire Risk Assessment

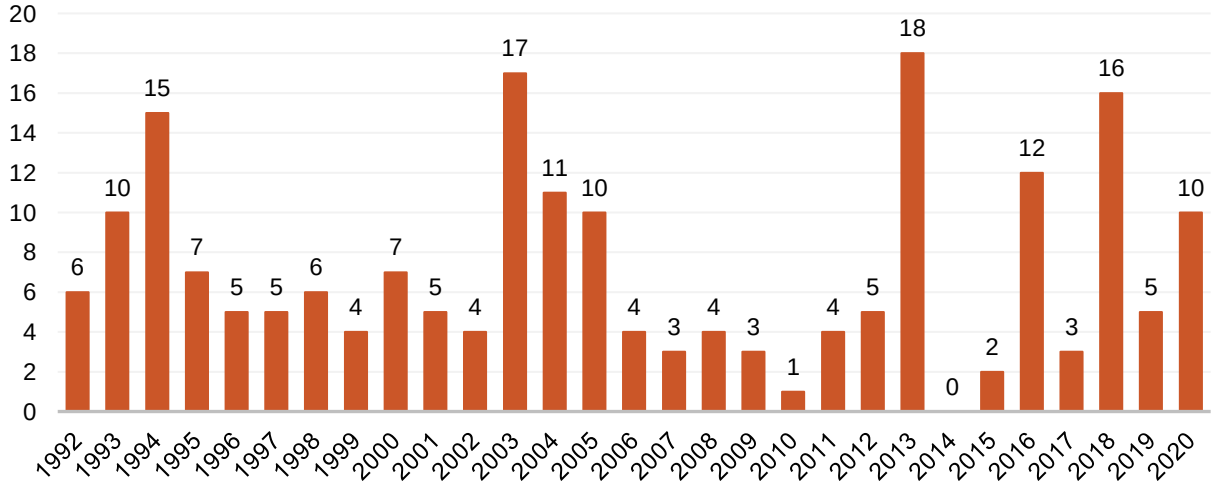
Assessing wildfire risk is essential for protecting lives, infrastructure, property, and natural ecosystems from the devastating impacts of wildfires. By identifying areas with high susceptibility and exposure, communities can implement proactive measures such as fuel reduction, POD boundary hardening, and emergency response planning. Risk assessments help land managers and policymakers allocate resources effectively, prioritize mitigation efforts, and enhance public awareness. They also play a critical role in policymaking, guiding the development of building codes and land management practices that strengthen fire resilience. A well-informed risk assessment allows governments, organizations, and individuals to reduce potential losses, protect natural habitats, and build more fire-adapted communities.

Wildfire History

Multiple wildfire events occur annually in Ouray County. Most wildfire events are small (one acre or less), but a few larger wildfires have occurred. Figure 23 shows the location of historical wildfire events from 1992 to 2020. This map likely underrepresents the total number of wildfire events because there are few reporting databases, and not all local agencies report. Most fires in the county are from natural causes (i.e., lightning). Write-ups on the more significant wildfire events and a graph of the events by year can be found below.

While a devastating wildfire has not occurred in the county, the growing number of significant and damaging events across Colorado and the United States show that it can happen anywhere in Ouray County. The increasing frequency and intensity of wildfires, exacerbated by climate change and expanding communities in wildfire-prone areas, pose substantial risks to the lives, property, infrastructure, natural environment, water quality, and air quality in the county.

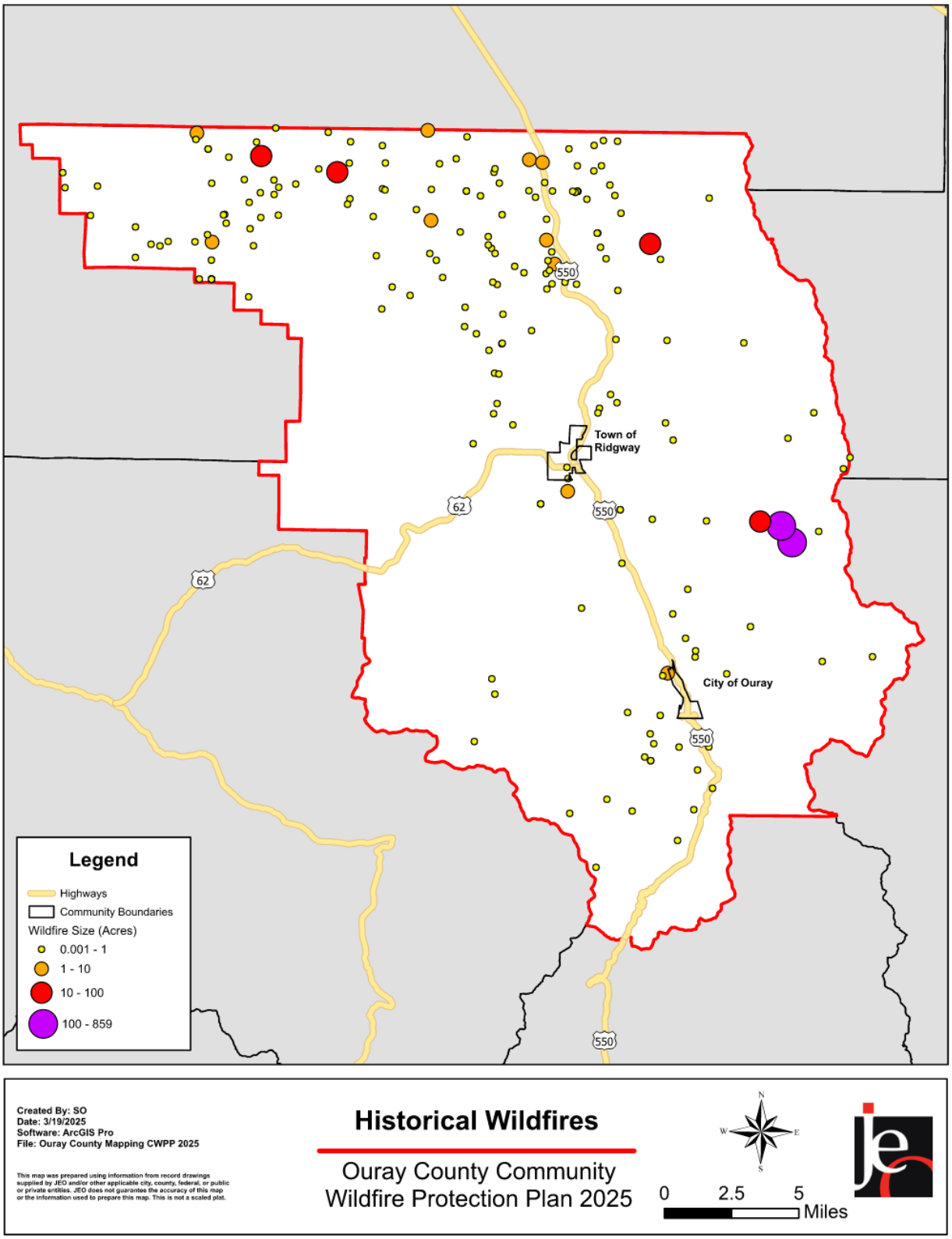
Figure 22: Wildfire Occurrence by Year in Ouray County



Source: U.S. Forest Service, 1992-2020[20]

[20] U.S. Forest Service. 2022. "Spatial Wildfire Occurrence Data for the United States, 1992-2020". https://www.fs.usda.gov/rds/archive/catalog/RDS-2013-0009.6.

Figure 23: Wildfire History, 1992-2020



Tappan Fire (July 3, 2004)
The Tappan Fire began from a lightning strike on July 3, 2004, and burned 80 acres along the Ouray and Montrose county lines. It was fought by resources from BLM, Log Hill Fire, and Montrose Fire and burned for 5 days.

Red Creek Fire (June 27, 2006)
The Red Creek Fire was a lightning-caused fire burning 401 acres. The fire occurred on June 27, 2006, about eight miles northeast of Ridgway. The fire consumed 350 acres of timber and resulted in the closure of trails in a wilderness area. Smoke from the fire impacted communities to the north, including the City of Montrose.

Cow Creek Fire (October 16, 2019)
The Cow Creek Fire burned 850 acres in the Uncompahgre National Forest. The fire was caused by a wood-burning stove inside a wall tent in the Green Mountain Camp. This fire incurred significant suppression costs fighting the fire.

Figure 24: Cow Creek Fire

Source: 2019 Ouray County Hazard Mitigation Plan

Simms Incident (May 19, 2022)
The Simms Incident was a controlled burn of 188 acres that escaped containment on May 19th due to high winds. The fire ultimately burned 314 acres and destroyed several structures before being fully contained. Suppression costs were estimated at $3,000,000.

Figure 25: Simms Incident

Source: West Slope Fire Information

Spring Creek Fire (2023)
The Spring Creek Fire began on September 10, 2023. It took several days to contain and burned 16 acres. Several trails and roads were closed due to the fire. Suppression costs were estimated at $1,000,000.

Wildfire Risk

Wildfire risk is the likelihood of a wildfire occurring in a specific area and its potential consequences on people, property, and the environment. It can be broken down into three main factors: wildfire likelihood, wildfire intensity, and susceptibility of people, resources, and values.

When discussing wildfire risk in Ouray County, the CWPP Stakeholder Group felt that none of the previously modeled wildfire risk maps accurately depicted risk for the county. The group thought a more accurate depiction of risk included several different inputs. Ultimately, the stakeholder group decided fire intensity, burn probability, potential control location suitability, and overall watershed risk were the most accurate inputs when identifying wildfire risk in Ouray County. Descriptions and maps of those four individual inputs can be found in the pages below.

Four different inputs made it difficult to identify specific high-risk areas in the county where fuel treatment projects could occur. A combined wildfire risk map was created using sub-basin watershed areas and averages for fire intensity, burn probability, potential control location suitability, and overall watershed risk to represent wildfire risk

visually. Figure 26 shows the combined wildfire risk map, and the paragraphs below provide additional information on the creation of the map.

Before the four risk inputs could be combined, they each needed a standard scoring value. To start, an average score for each input was calculated using ArcGIS for each of the small sub-basin watershed areas in the county. Once the average scores for each input were calculated, a standard scoring value needed to be created. To do that, each input's average scores were split into five groups from least to highest risk. Those five groups were then given a value from 1 (least risk) to 5 (most risk). These values standardized scoring and ensured that no one risk input would hold more weight than another.

The risk input values were added within each small watershed to give a final combined wildfire risk score. An example of this is provided in the table below. With five groups across four risk inputs, possible combined scores ranged from 4 to 20. Areas with a score of 17 to 20 received the highest combined wildfire risk rating.

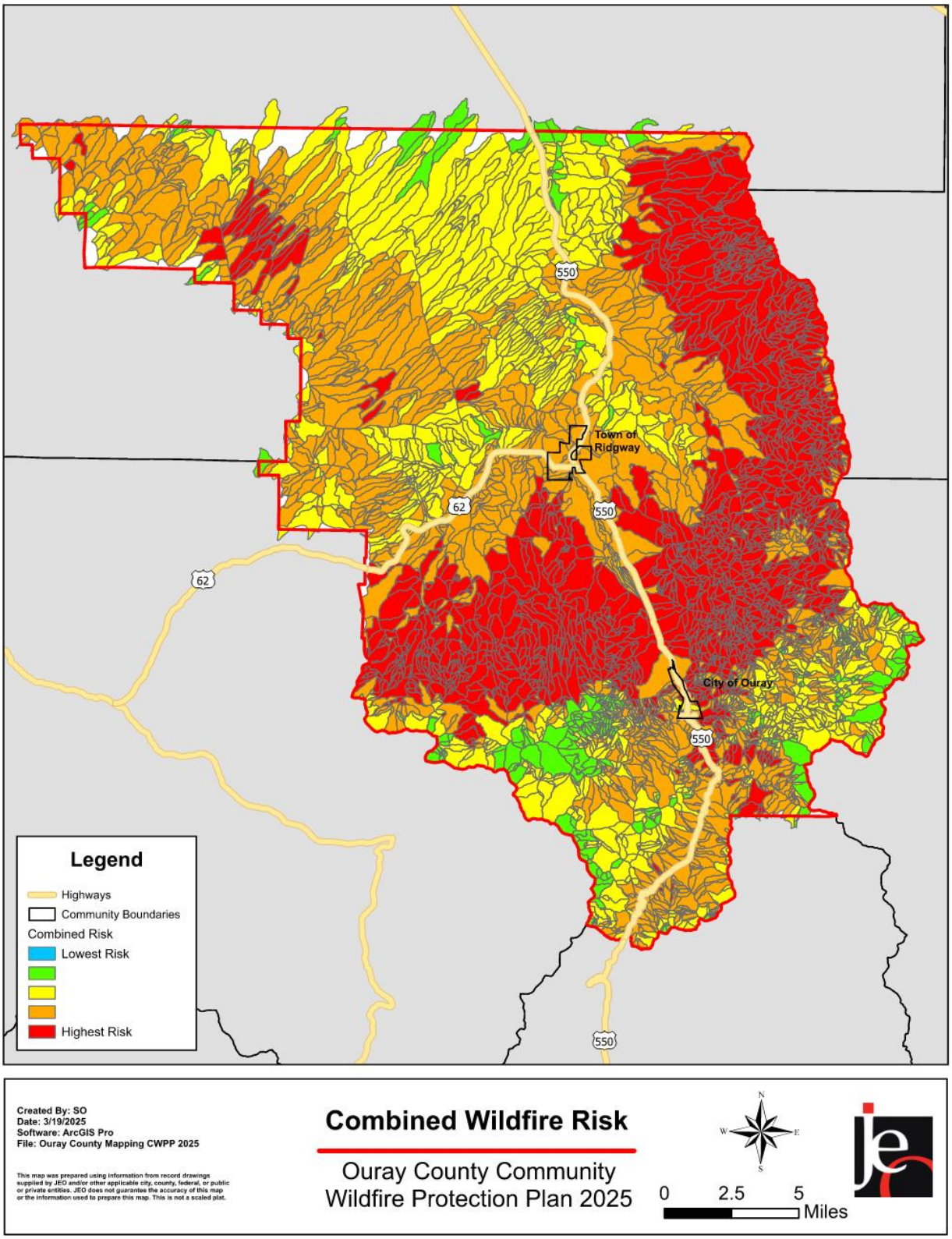
Table 4: Example Combined Risk Scores

Input Values	Sub-Watershed 1	Sub-Watershed 2	Sub-Watershed 3
Fire Intensity Group Value	5	1	5
Burn Probability Group Value	3	2	5
Potential Control Location Suitability Group Value	4	1	4
Watershed Risk Value	4	4	5
Combined Wildfire Risk Score	**16**	**8**	**19**

Ouray County locations with the highest combined risk (red on the map) include the heavily forested areas owned by the USFS along the eastern border, the central portion of the county between Ridgway and Ouray, and locations surrounding the City of Ouray. Adding to the concerns, these highest-risk areas cross critical evacuation routes, including Highway 550 and County Road 8. Most of the population in the county lives in areas with elevated wildfire risk (yellow or orange on the map). Many subdivisions and neighborhoods are in or neighbor the highest-risk areas. All individuals in the county need to have an evacuation plan in place. They should also take steps to harden their home and have defensible space. Areas with lower risk scores (green and blue on the map) include northern Ouray County and the highest elevation areas above the tree line, with little to no combustible vegetation.

Source: WRWC. An example of home hardening is using fire-rated materials rather than wood.

Figure 26: Combined Wildfire Risk



Fire Intensity

Fire intensity shows where significant fuel hazards and potential for dangerous fire behavior exist. It consists of five classes, where Class 1 represents very low wildfire intensities and Class 5 represents very high wildfire intensities. Below are the fire intensity definitions for each class as provided by Colorado Forest Atlas[21]

Class 1 (Lowest Intensity): Very small, discontinuous flames, usually less than 1 foot in length; very low rate of spread; no spotting. Fires are typically easy to suppress by firefighters with basic training and non-specialized equipment.

Class 2 (Low): Small flames, usually less than two feet long; a small amount of very short-range spotting possible. Fires are easy to suppress by trained firefighters with protective equipment and specialized tools.

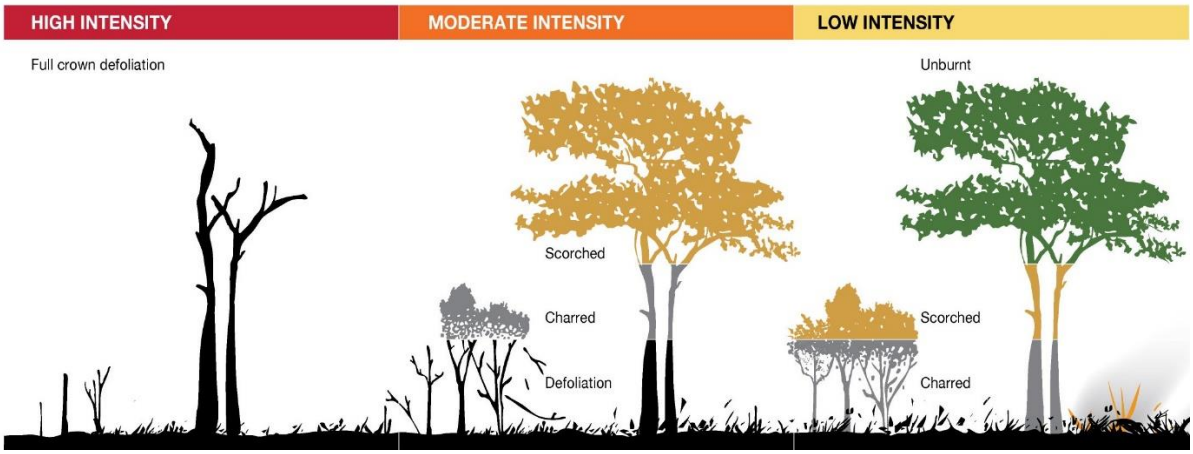
Class 3 (Moderate): Flames up to 8 feet in length; short-range spotting is possible. Trained firefighters will find these fires challenging to suppress without support from aircraft or engines, but dozers and plows are generally effective. Increasing potential for harm or damage to life and property.

Class 4 (High): Large Flames, up to 30 feet in length; short-range spotting common; medium-range spotting possible. Direct attack by trained firefighters, engines, and dozers is generally ineffective; indirect attack may be effective. Significant potential for harm or damage to life and property.

Class 5 (Highest Intensity): Huge flames up to 150 feet long; profuse short-range spotting; frequent long-range spotting; strong fire-induced winds. An indirect attack is marginally effective at the head of the fire. There is great potential for harm or damage to life and property.

Figure 28 on the next page shows the fire intensity map for Ouray County. There are no Class 5 areas located in the county. High-intensity regions in the county can be found in the south-central, eastern, and western edges. Areas of lowest fire intensity are in the county's north-central and high mountain peaks.

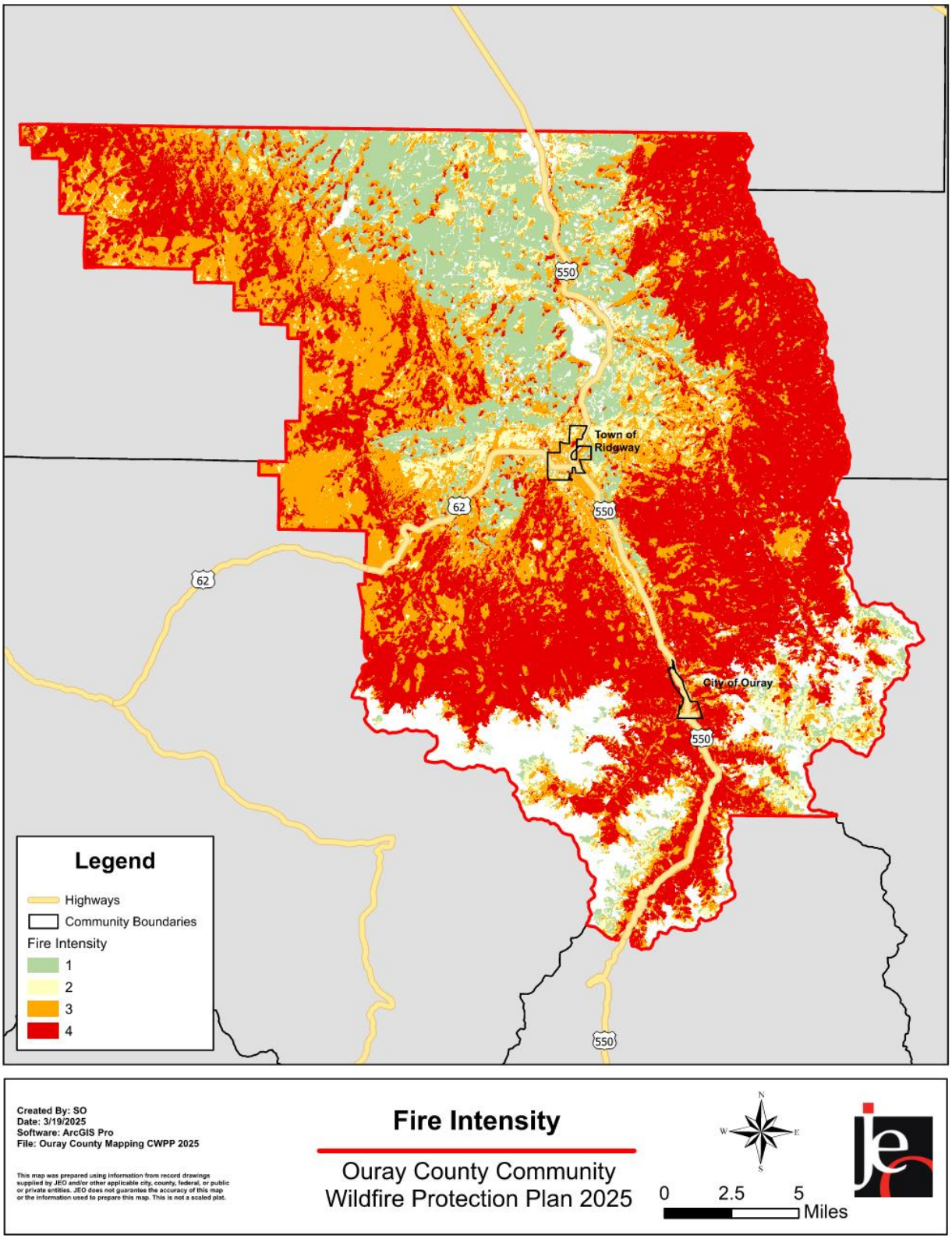
Figure 27: Fire Intensity Example



Source: Andrew Sullivan/CSIRO, 2021

[21] Colorado State Forest Service. 2022. “Colorado Forest Atlas.” https://coloradoforestatlas.org/.

Figure 28: Fire Intensity



Burn Probability

Burn probability is the annual probability of any location burning due to wildfire. The Ouray County CWPP utilized the burn probability map the Colorado Forest Atlas created. The information below provides an overview of how burn probability was calculated.

> The annual burn probability was calculated as the number of times a cell was burned and the number of iterations used to run the models. The annual burn probability was estimated for Colorado by using a wildfire simulation approach where a total number of 2,342,334 fires were simulated. The ignition points were spatially distributed evenly every 500 meters across the state. Only high and extreme weather conditions were used to run the single fires. All fire simulations had a duration of eight hours. After simulating all the fires, some cells were not burned by any simulated fire, resulting in a burned probability value of zero. Some cells were non-burnable due to the associated fuel type (i.e., water, roads, urban, agricultural, barren areas). The wildfire simulator considered the number of times the simulated fires burned each cell. After that, results were weighted by considering the historical fire occurrence. The weighting was done by assessing the relation between the annual historical fire ignition density in Colorado, the total number of simulated fires with varying input data in high and moderate weather scenarios, and the historical spatial distribution of the ignition points."[22]

The map and table below show the output from the burn probability analysis for Ouray County. Areas where burn probability is elevated include the eastern border and the county's northwest corner. Areas where burn probability is lowest include the north-central and southern portions of the county.

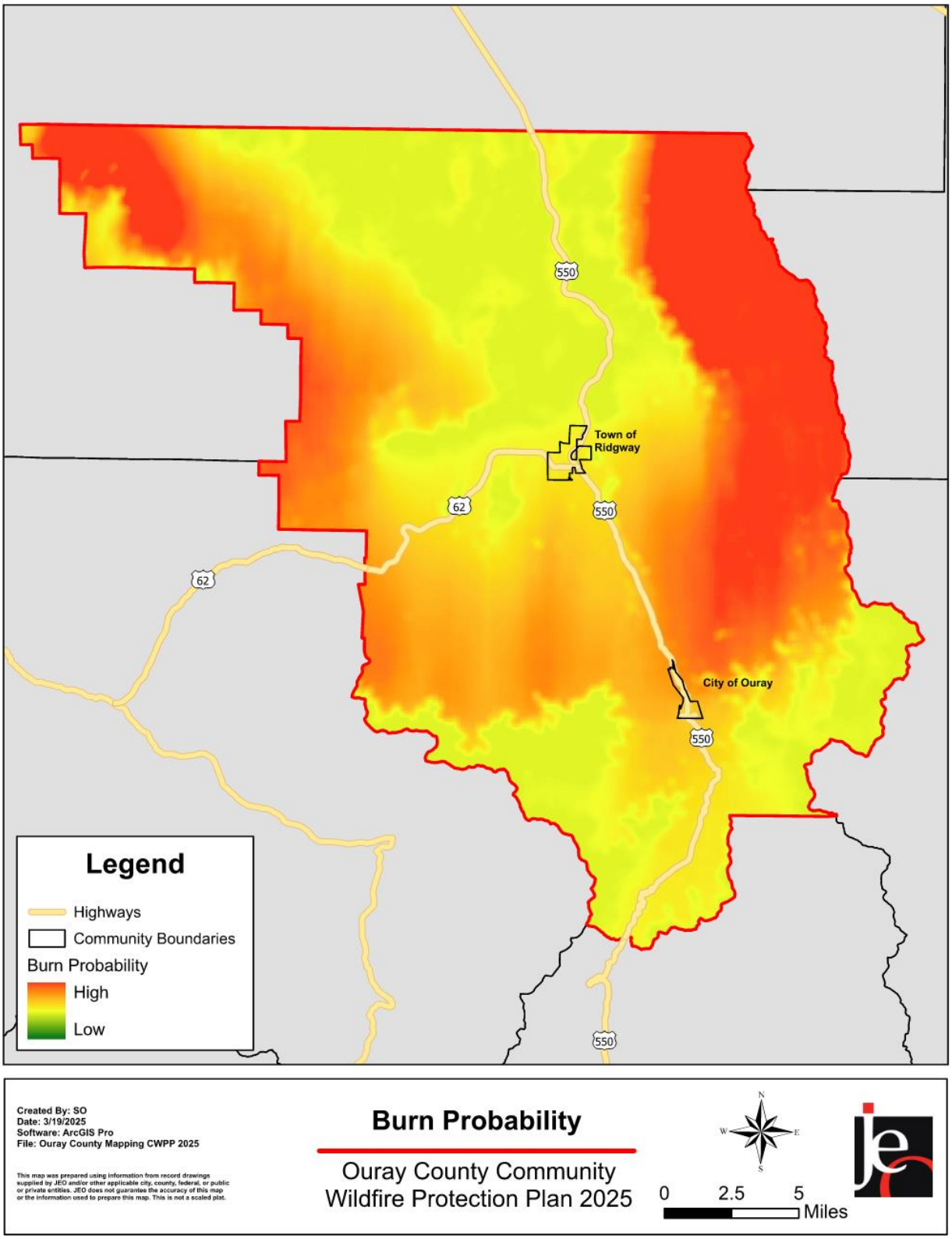
Figure 29: Burn Probability Table - Ouray County

Burn Probability	Acres	Percent
Lowest	79,762	23%
	22,567	6.5%
Low	21,836	6.3%
	78,078	22.5%
Moderate	92,100	26.5%
	52,456	15.1%
High	475	0.1%
		0%
Highest		0%
Total	**347,276**	**100%**

Source: Colorado Forest Atlas

[22] Colorado State Forest Service. 2022. "Colorado Forest Atlas." https://coloradoforestatlas.org/.

Figure 30: Burn Probability



Potential Control Location Suitability

Potential control location suitability (PCL) shows where wildfire containment is most likely successful based on where fires stopped in the past. PCL is scaled from zero to one hundred, corresponding to conditions with a low to high probability of containing a fire. Areas where large fire containment is unlikely (PCL<10) suggest the need for an indirect suppression strategy, and areas with a PCL greater than 75 are where fires tend to stall or stop due to a combination of site conditions and suppression success. PCL considers fire containment successes and failures from 2002-2021, topography, fuels, accessibility, suppression difficulty, and potential fire behavior.[23]

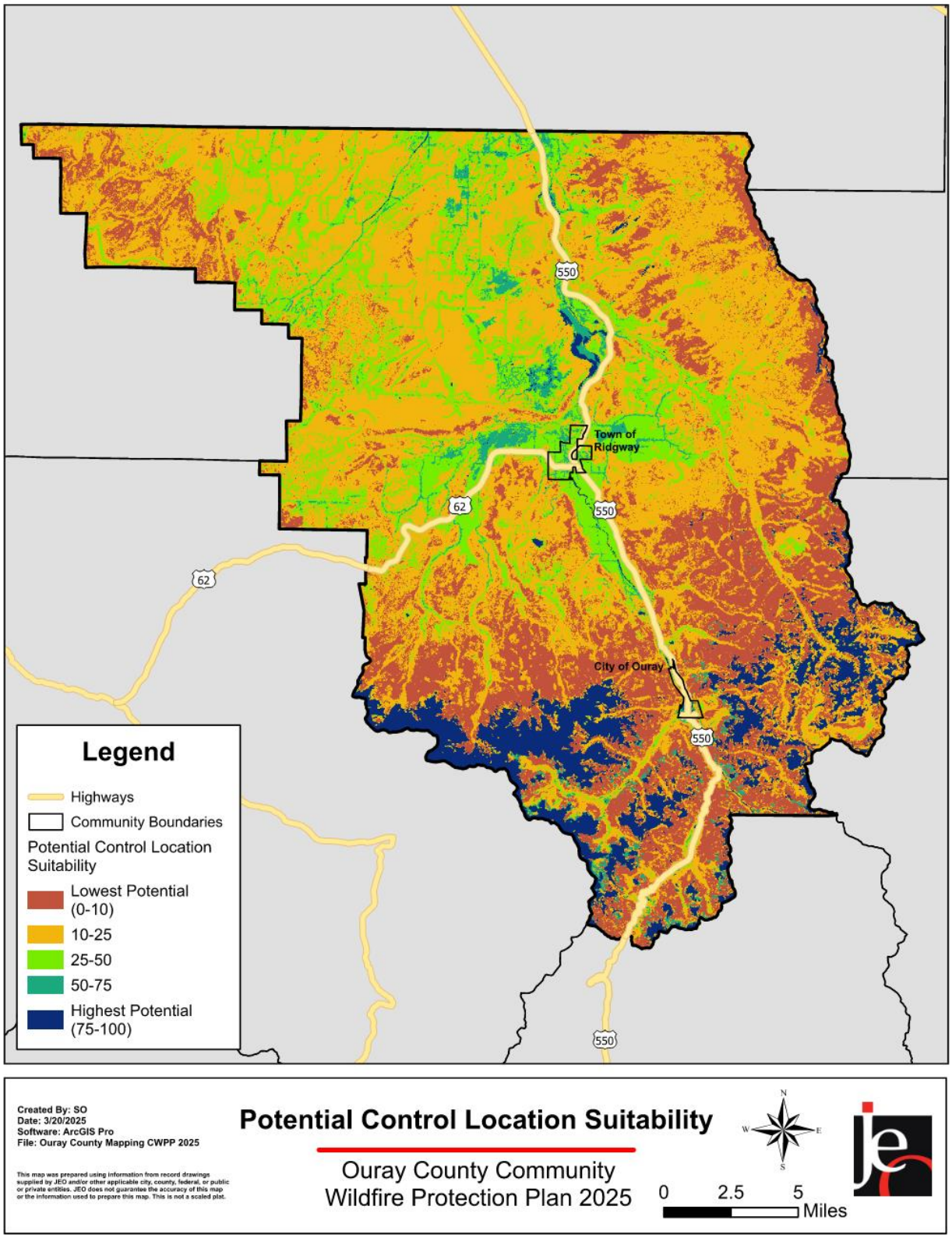
Figure 32 on the next page shows the Potential Control Location Suitability for Ouray County. Areas where containment is unlikely include the south-central portion of the county and the eastern border. Areas where potential containment is highest include the high mountain peaks in the county's southern portion and low-lying areas along the Uncompahgre River and Dallas Creek.

Figure 31: Wildfire Control Point

Source: West Slope Fire Information

[23] U.S. Forest Service. 2024. “Potential Control Location Suitability.” https://www.arcgis.com/home/item.html?id=c83484a8f54d4212a453cbec8f461491.

Figure 32: Potential Control Location Suitability



Watershed Risk

Wildfires and the subsequent suppression activities can significantly affect watersheds and municipal water supplies. When wildfires burn across an area, they leave unstable soils vulnerable to erosion, landslides, and debris flows. This results in increased sediment and debris clogging streams and reservoirs. Ash, heavy metals, and pollutants from burned materials can wash into streams, degrading water quality and making water treatment more challenging. The intense heat from wildfires can also create hydrophobic soils that exacerbate runoff and contribute to flash flooding. Chemicals used in firefighting, such as fire retardants and foams, can add to water quality issues when they get washed into water sources. These place increased strains on water treatment facilities, which may not typically be needed to treat these pollutants.

Planning for the impacts of wildfires on watersheds and drinking water is crucial because water is a vital resource for public health and the environment. Wildfires can significantly compromise water quality, leading to higher treatment costs, unsafe drinking water, and degradation of aquatic plants and animals. By planning, communities can implement mitigation strategies to help reduce these impacts and minimize long-term economic and environmental costs.

The Colorado Water Conservation Board's Wildfire Ready Watersheds Susceptibility Explorer was utilized to analyze watershed risk in Ouray County. This tool assesses the susceptibility of Colorado's watersheds to post-fire hazard risk to support the development of pre-fire planning. The Wildfire Ready Watersheds explorer contains four key summaries related to hazards and values at risk. These summary maps are Debris Flow Probability, Sedimentation Risk, Hydrologic Change Risk, and All Values-at-Risk and Hazards. These summaries are provided at a watershed (HUC-12) scale. Summary descriptions and maps can be found below. To learn more about how these summaries and maps were created, visit https://www.wildfirereadywatersheds.com/.

Debris Flow Probability

Debris flow probability, as shown in Figure 33, estimates the likelihood of a debris flow event after a wildfire. These estimates were created using the U.S Geological Survey's debris flow probability logistic regression model and burn severity inputs.[24]

Sedimentation Risk

Sedimentation risk measures the expected change in sediment yield between pre-fire and post-fire conditions. Figure 34 shows the sedimentation risk for Ouray County. The larger the number, the more sediment is expected in waterways after a fire event.[25]

Hydrologic Change Risk

Figure 35 shows the hydrologic change risk for watersheds in Ouray County. Hydrologic change looks at the expected magnitude of change in runoff from a watershed, assuming an estimated burn severity. A higher number means there is an increased amount of runoff and less infiltration that would occur.[26] More runoff can lead to increased risk of flooding downstream, sediment loads, and risk of debris flows.

[24] Colorado Department of Natural Resources. 2024. "Wildfire Ready Watersheds." https://www.wildfirereadywatersheds.com/.
[25] Colorado Department of Natural Resources. 2024. "Wildfire Ready Watersheds." https://www.wildfirereadywatersheds.com/.
[26] Colorado Department of Natural Resources. 2024. "Wildfire Ready Watersheds." https://www.wildfirereadywatersheds.com/.

Figure 33: Watershed Debris Flow Probability

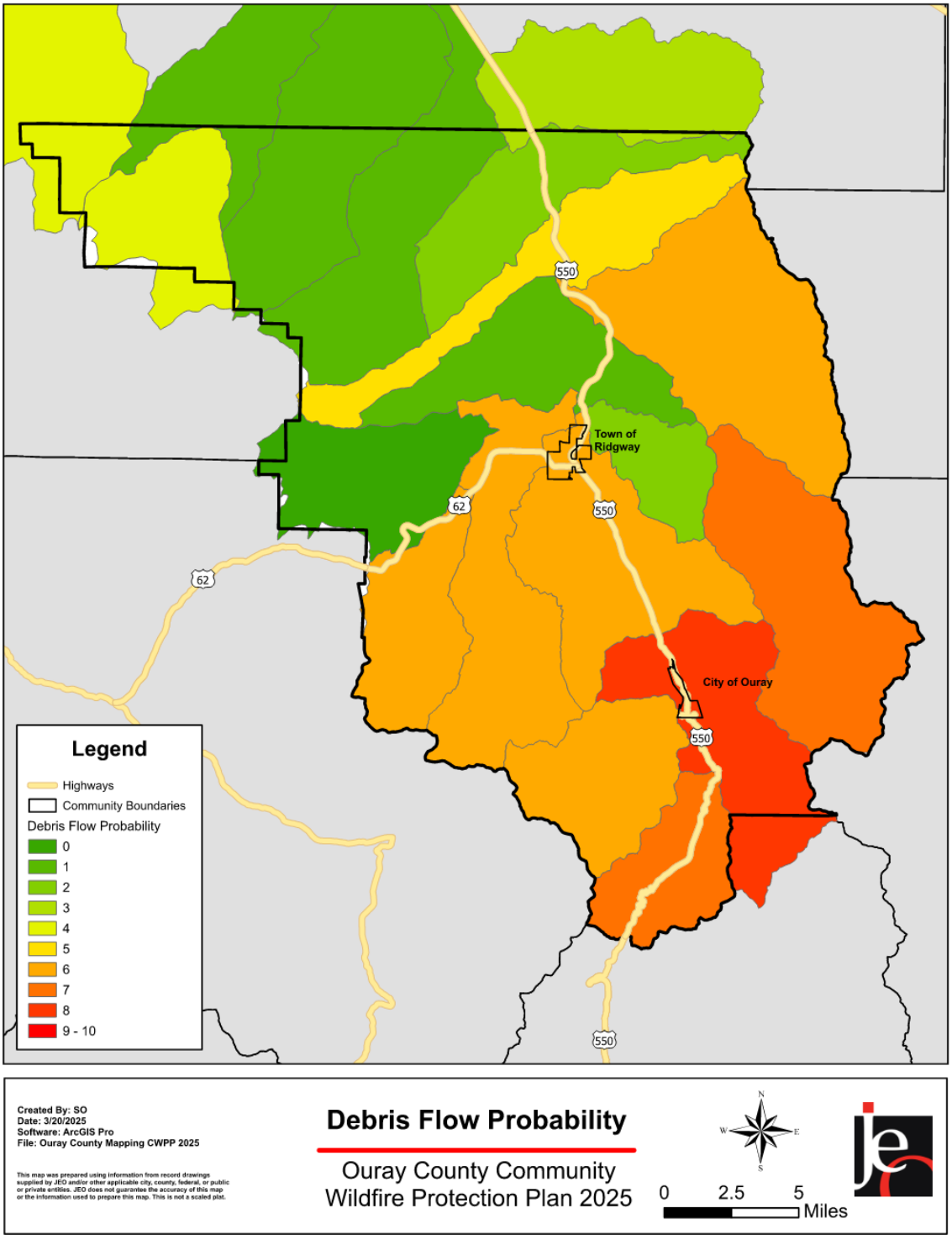


Figure 34: Watershed Sedimentation Risk

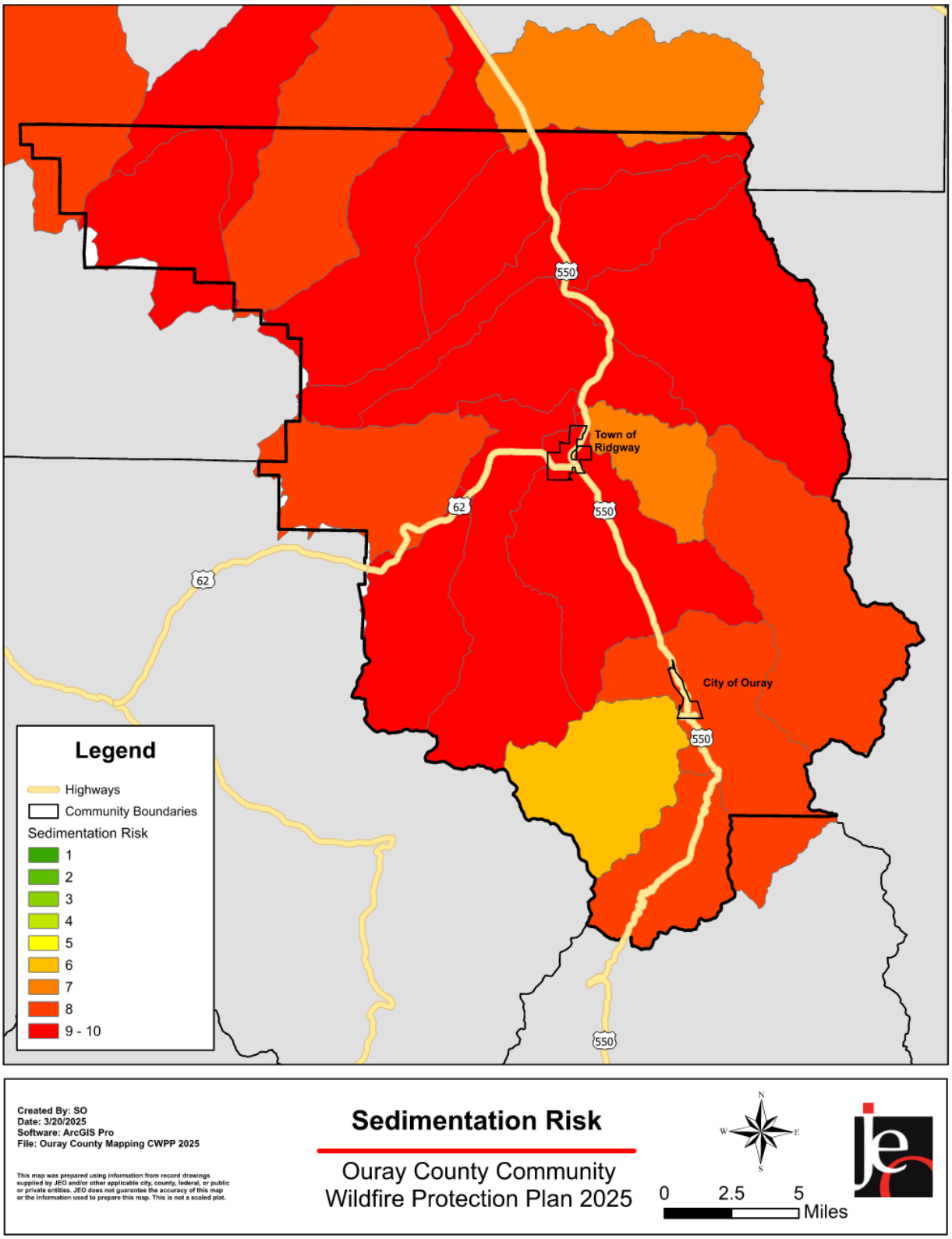
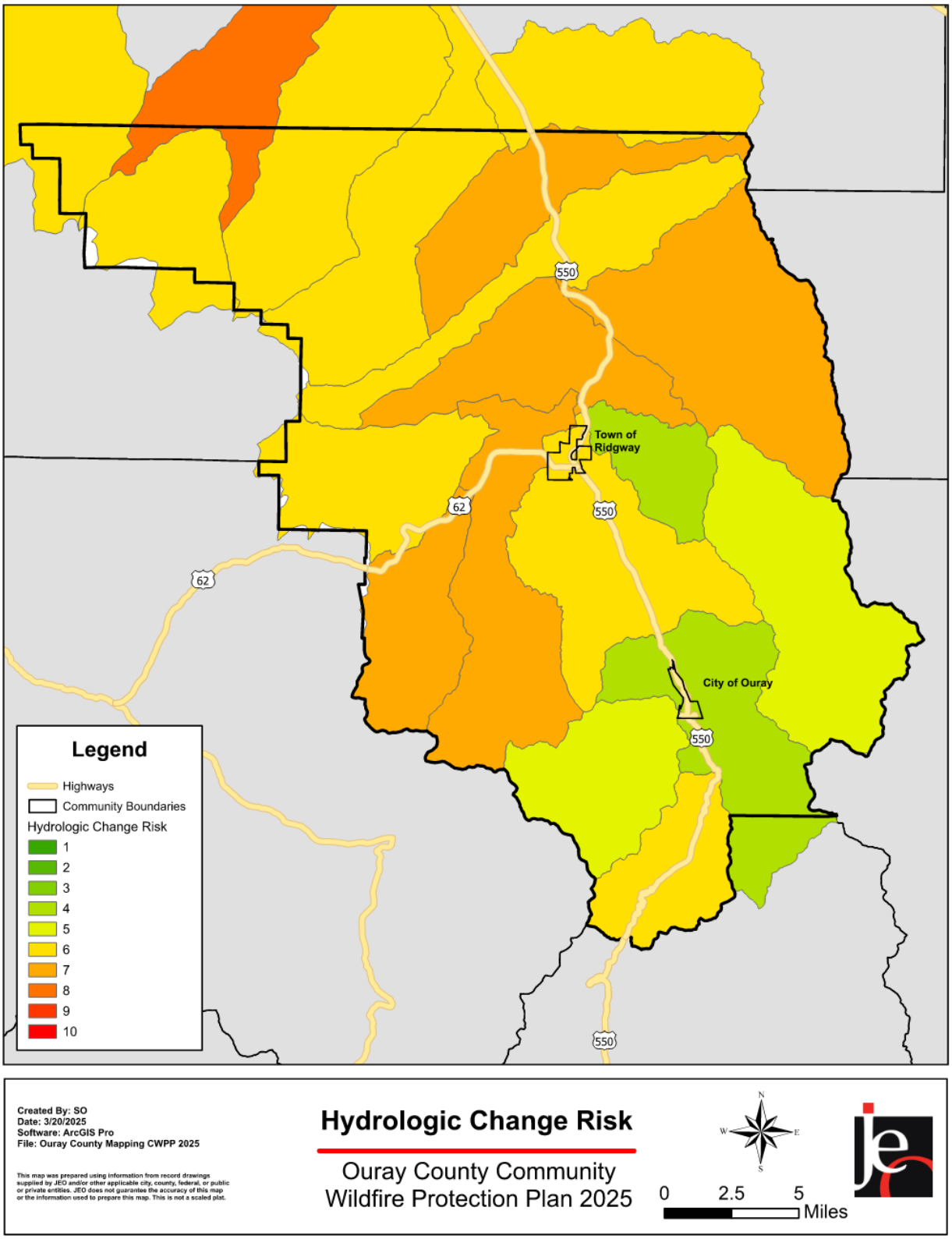


Figure 35: Watershed Hydrologic Change Risk



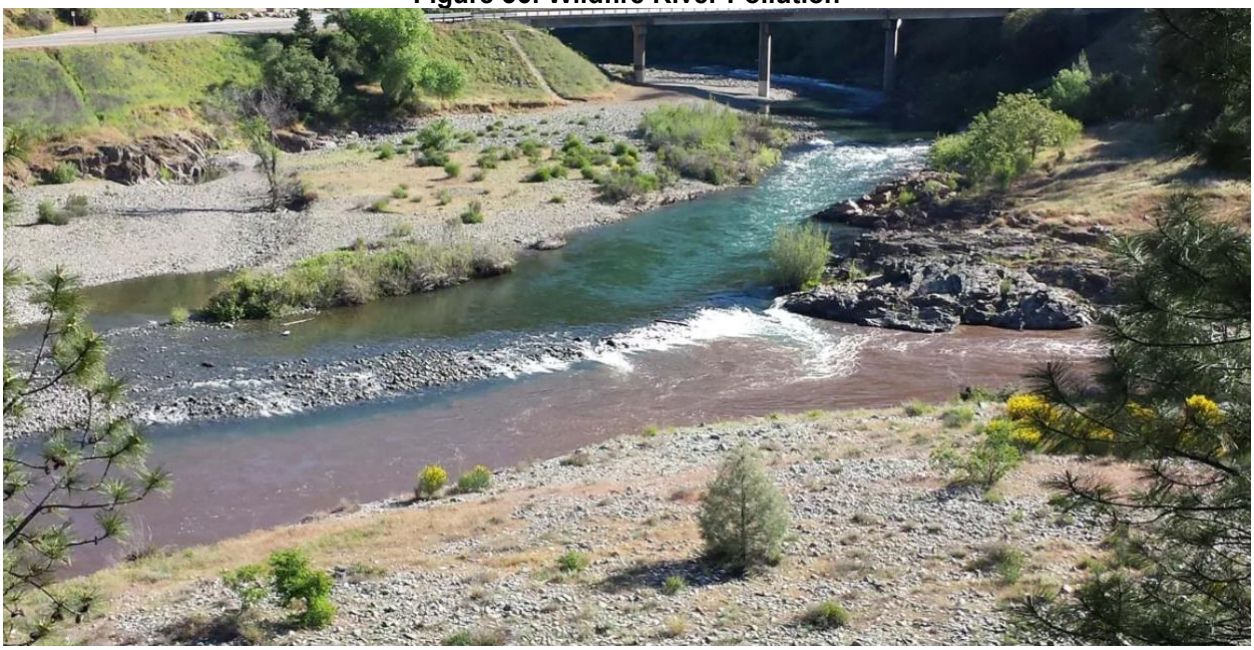
Combined Watershed Risk

This summary combines all three risk types discussed above and susceptibility to life, property, and water infrastructure. The output is Figure 37, which provides an average overall susceptibility score between 0 and 100. Higher values mean higher overall susceptibility, whereas lower scores indicate lower overall susceptibility.[27] The combined wildfire risk map used this summary as the watershed risk input (Figure 26).

Forests to Faucets

The USFS Forests to Faucets project ranks areas within a watershed from 0 to 100 regarding relative importance to overall drinking water quality (100 being most important, 0 being least important). These rankings help identify critical watersheds for drinking water based on the population served, forest cover, riparian condition, and hydrology.[28] Forests to Faucets data can be helpful when identifying potential mitigation project locations to prioritize. Figure 38 shows that most of the county's watersheds rank between 30 and 60. Watersheds with the most relative importance are located in the county's southern portion and provide the City of Ouray and the Town of Ridgway with drinking water.

Figure 36: Wildfire River Pollution



Source: CNN. A confluence of two rivers. The bottom carried ash and burned soil; the other was unaffected by wildfire.

[27] Colorado Department of Natural Resources. 2024. "Wildfire Ready Watersheds." https://www.wildfirereadywatersheds.com/.
[28] USFS. "Forests to Faucets 2.0." Accessed March 2025. https://storymaps.arcgis.com/collections/4e450a6c7ed24f0cbae4abc1c07843b7?item=1.

Figure 37: Combined Watershed Risk

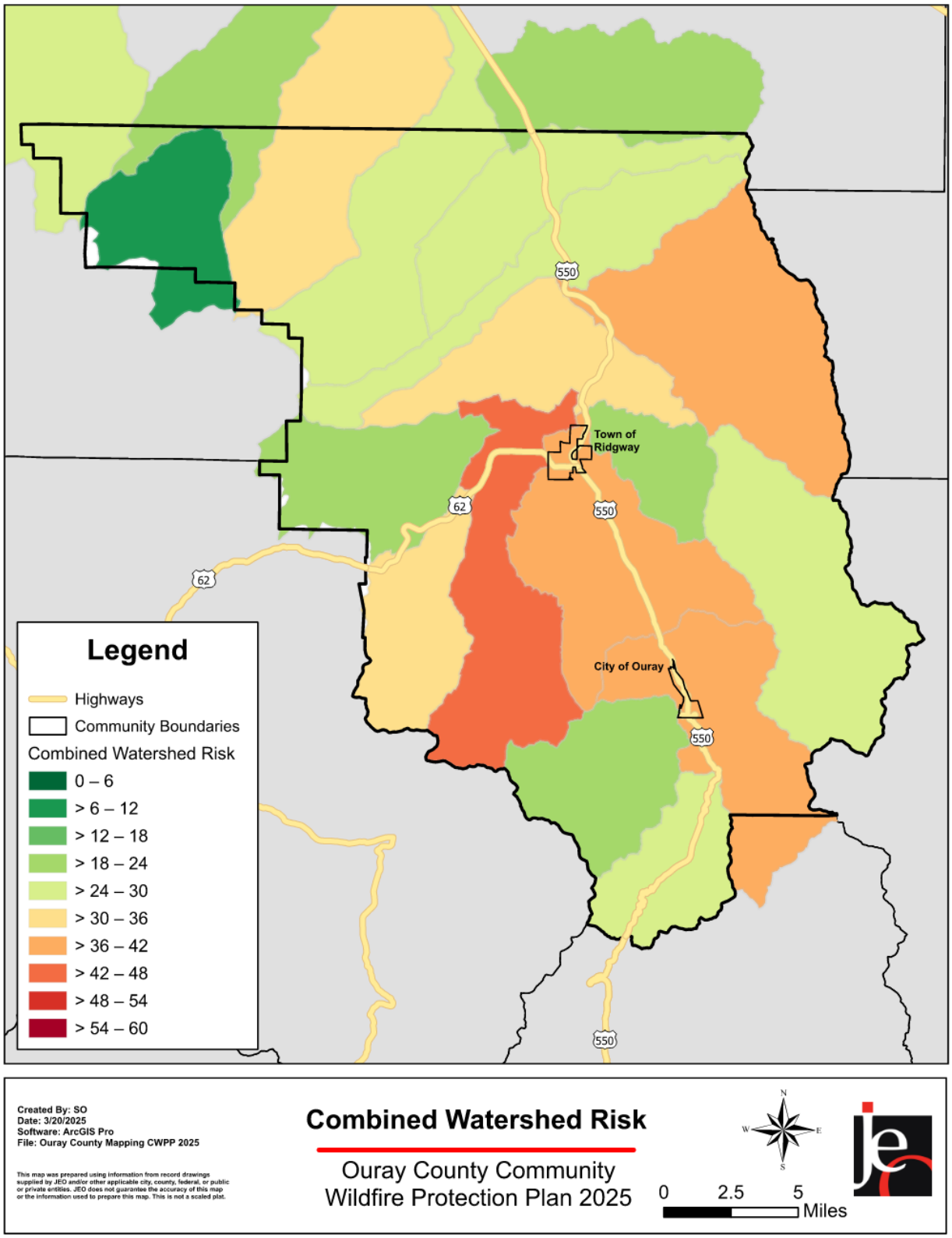
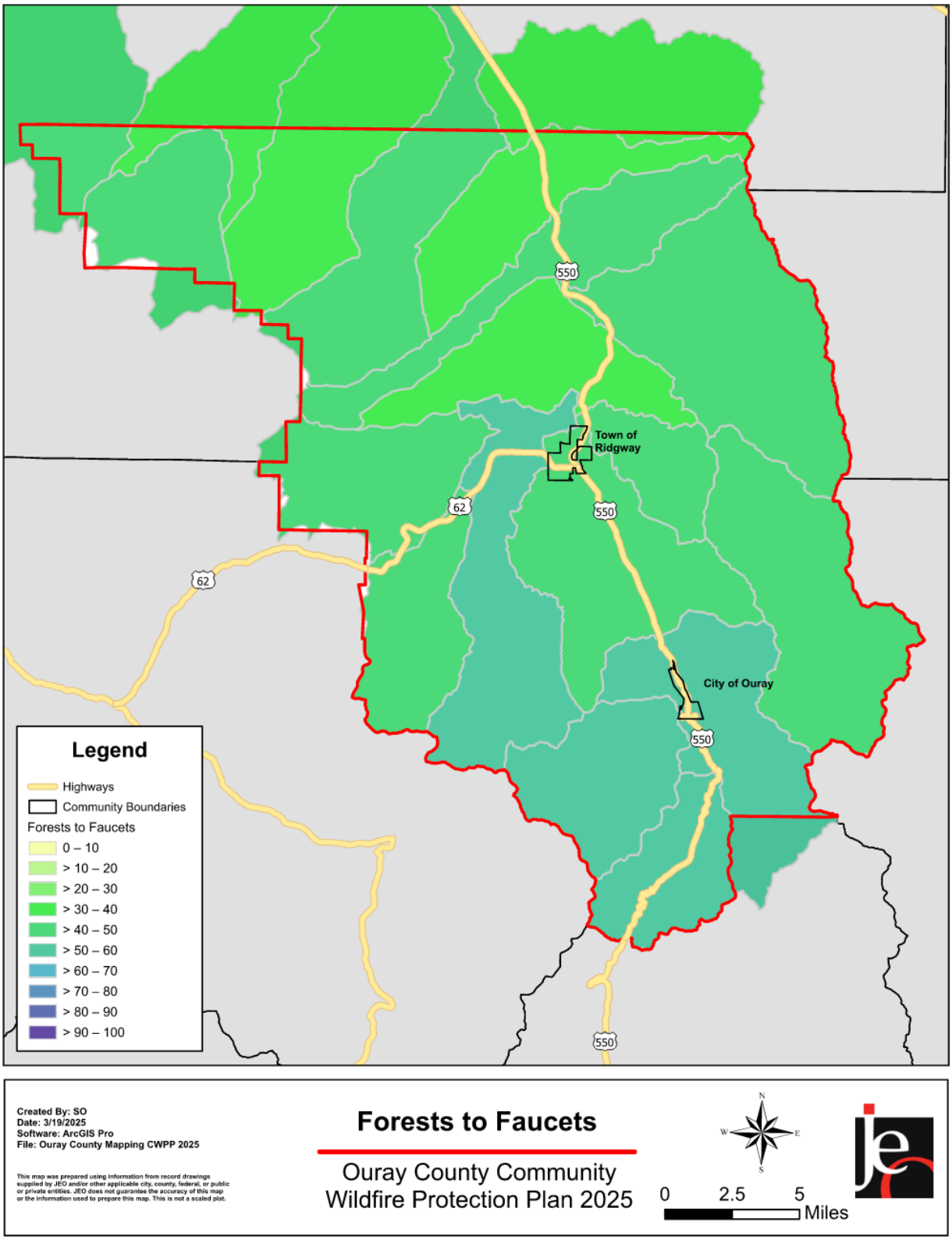


Figure 38: Forest to Faucets - Drinking Water Importance



Values to Protect

Identifying important values and resources when planning wildfires is crucial because it helps ensure that the strategies and mitigation efforts protect what matters most. By understanding these priorities, actions can be tailored to protect key assets like drinking water infrastructure, residential areas, communication infrastructure, and key governmental services that support communities' long-term health and growth.

Furthermore, recognizing these values allows for a more efficient allocation of limited resources. It helps decision-makers prioritize actions, develop focused risk-reduction strategies, and coordinate with various stakeholders. This targeted approach minimizes potential damage during a wildfire event and facilitates a faster and more effective recovery, ultimately enhancing the county's resilience.

During the first meeting, the CWPP Stakeholder Group was asked to identify values and resources they wished to protect from wildfire. The values were organized and grouped into 12 categories from that initial discussion. Definitions and locations were then gathered for each value category. While not every category had a specific location that could be represented on a map (i.e., air quality and human life), the stakeholder group felt it was still important to include them in the analysis. During the second meeting, the CWPP Stakeholder Group was shown a list and map of the different value categories. They were then asked to rate the 12 different value categories from most important to least important. Figure 39 shows the 12 value categories and their relative importance based on the average ratings.

Figure 39: Values to Protect Ranking

General definitions for each value to protect categories can be found on the next page. Most of the definitions and locations of the categories came from Ouray County Emergency Management. Figure 41 shows a map of the top five values to protect in Ouray County. When layered on top of the combined wildfire risk map, it revealed that many of the most important values to protect were located in the high to highest-risk areas. Having many values in high-risk areas shows the

importance of large-scale fuel management needs, site-specific defensible space, and location hardening.

Human Life – All residents and visitors in the county.

Emergency Response & Governmental Services – Governmental buildings, schools, and fire stations.

Infrastructure – Communication towers, power substations and lines, roads, and water infrastructure.

Water Quality – Reservoirs, rivers, and streams.

Buildings – All addresses of buildings in the county.

Forest Health – Vegetation throughout the county.

Wildlife – Endangered species ranges in the county.

Historical Sites – Locations on the National Register of Historic Places.

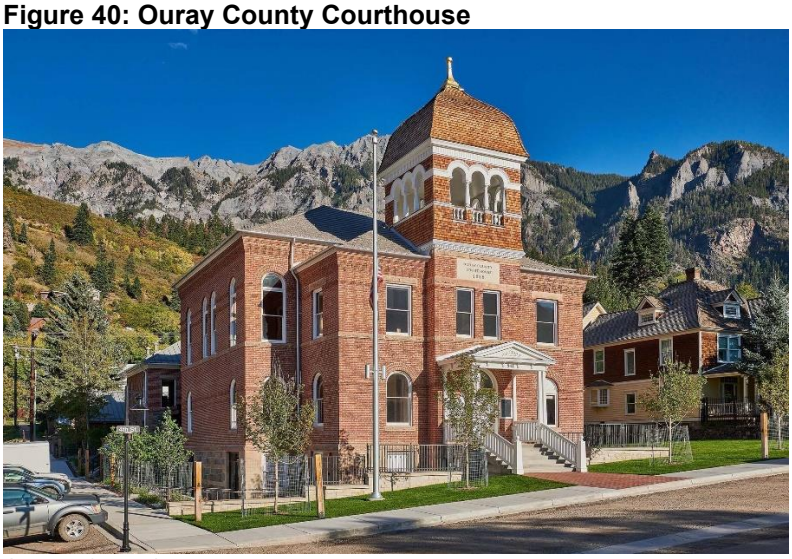
Air Quality – How clean or polluted the air is in the county. It can be measured by the concentration of pollutants in the air.

Cultural Areas – Places that hold cultural significance. They reflect the traditions, values, beliefs, and expressions of particular groups or civilizations. While there are cultural areas and sites in Ouray County, these areas are not publicly available, and the locations cannot be identified.

Livestock – Large farms and ranches in the county.

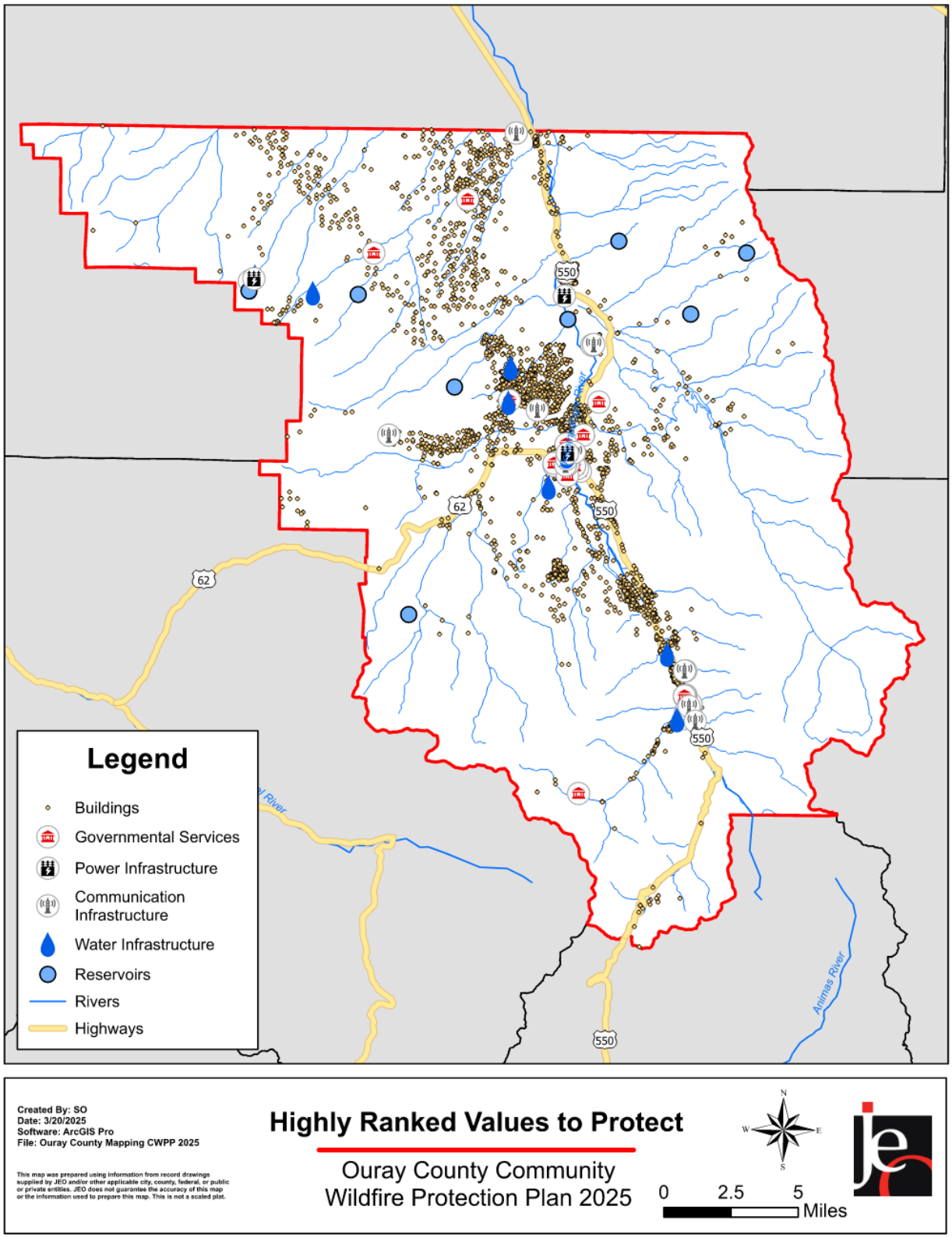
Recreation – Campgrounds, trails, golf courses, parks, pools, athletic fields, and other recreational-related locations.

Figure 40: Ouray County Courthouse



Source: Ouray County

Figure 41: Highly Ranked Values to Protect



4| Action Plan

Wildfire action planning involves identifying and implementing strategies to reduce the risk and impact of wildfires on people, property, infrastructure, and ecosystems. It consists of analyzing wildfire risks, determining vulnerabilities, and outlining specific actions to prevent or minimize damage to identified values. These wildfire risk reduction projects and actions support the overarching goals of the Ouray CWPP.

Goal 1: Fire-Resilient Landscapes
Develop and maintain landscapes across the county that are resilient to wildfire, mitigate undesirable fire outcomes, and protect highly valued resources and assets.

Goal 2: Fire-Adapted Communities
Empower the county and its residents to “live with wildfire,” including being prepared to withstand, respond to, and recover from wildfires.

Goal 3: Safe and Effective Wildfire Response
Enable safe and efficient wildfire response through improved planning, coordination, and capacity building.

Ouray County, the local fire districts, BLM, USFS, and other regional stakeholders must work together to implement these wildfire risk reduction projects. Unfortunately, implementing these projects can be difficult due to limited budgets and staffing constraints from the local to the federal level. With limited resources, supported projects must be well-defined and address multiple goals and issues. Collaborative planning will be essential to maximize the benefits of the identified projects.

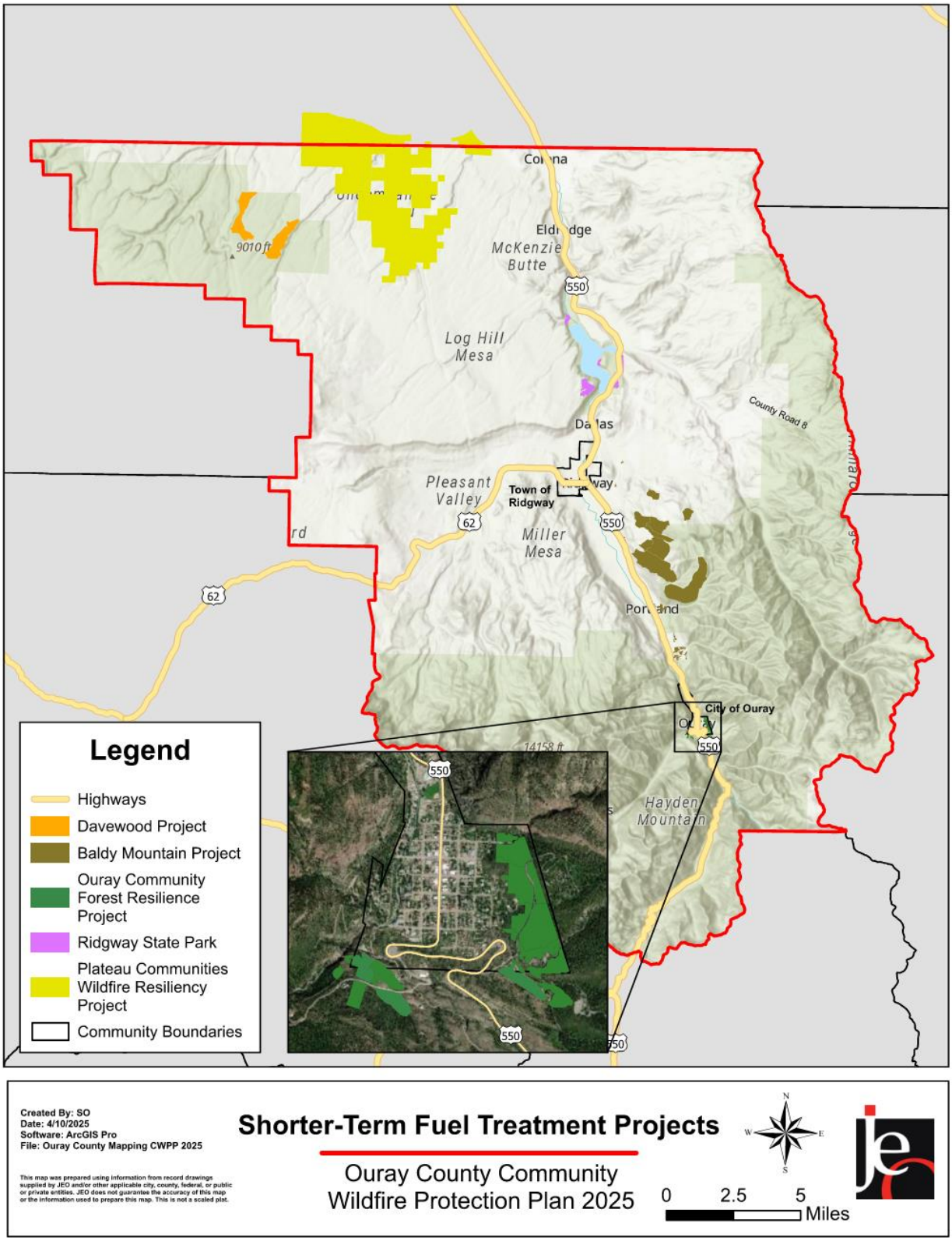
Fire-Resilient Landscapes Actions

Fire-resilient landscapes aim to develop and maintain landscapes across the county that are resilient to wildfire, mitigate undesirable fire outcomes, and protect highly valued resources and assets. To do that, fuel treatment projects were identified during the fourth CWPP meeting and further refined through discussions with the county and other key local, state, and federal stakeholders. These fuel treatment projects fall into two main types: short-term projects where planning has already begun and longer-term prioritized projects where additional planning work is needed to refine the project. Additionally, watershed projects were identified to help protect the county's drinking water and other water resources.

Shorter-Term Projects

These projects are likely to be implemented and completed first. Some are already underway, while others have started the planning process but may still need funding or additional planning to get started. Below is the list of shorter-term projects in the county and a short summary of each project. Figure 42 shows where these projects are planned to be located.

Figure 42: Shorter-Term Fuel Treatment Project Locations



Baldy Mountain Project
The USFS is leading and working with partners from USDA, BLM, WRWC, and many others on the Baldy Mountain project. This project will cover approximately 2,400 acres with treatments on public and private land. The project intends to treat existing vegetation to benefit wildlife habitat, reduce fuels, reduce post-wildfire flooding and soil erosion effects, and improve landscape resiliency. Activities began in 2023 with hand and mechanical treatments. Additional prescribed fire and mastication will continue until 2027. Total costs are expected to be over $3.5 million. More information about the Baldy Mountain Project can be found on this ArcGIS StoryMap: https://storymaps.arcgis.com/stories/9eea6bb08bf6488482f9e0cd1955b2b6 and the USFS project website: https://www.fs.usda.gov/project/?project=58554.

As part of the project, the WRWC works with qualified private landowners to provide free vegetation management on approximately 123 acres. Work will include tree thinning using hand crews and mastication and brush control. The cut vegetation will be chipped, removed from the site, chopped into chucks, and dispersed on the ground.

Davewood Project
This project is being led by the USFS and is planned to cover approximately 850 acres. This project will primarily be a prescribed burn. Heritage clearance and funding are still needed before any work is done. The goal of this project is to reduce vegetation in a densely forested area that is adjacent to private land. This project will help to reduce the risk of a large wildfire moving across the region. The USFS is hoping to complete this project by 2028.

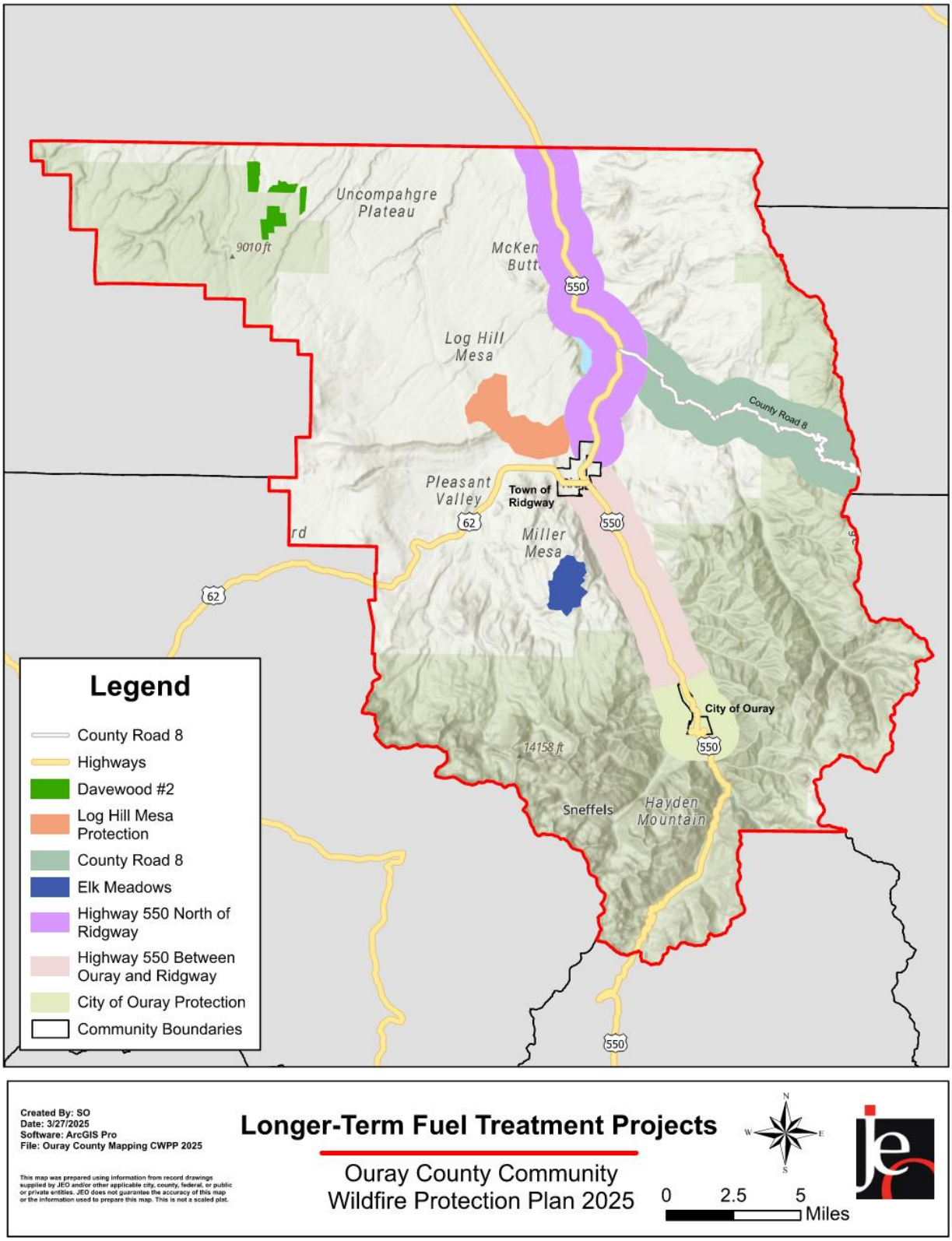
Ouray Community Forest Resilience Project
This proposed project has been in the making through the Ouray Forest Collaborative for a few years and will cover approximately 93 acres. The City of Ouray and Ouray County hired Spring Branch Forestry to lay out the project to mitigate the forest directly outside the City of Ouray. Several different fuel reduction methods will be used, including helicopter removal of trees, hand treatment, mastication, and aerial chipping. The estimated cost is approximately $1.1 million. The project will likely start in the fall of 2026 or 2027 but largely depends on funding. WRWC has secured some funds through multiple grants, but additional funds are still needed to start the project.

Plateau Communities Wildfire Resiliency Project
This project led by BLM will cover 11,363 acres of primarily roadside and boundary thinning. Treatment methods will include cut, pile, and burn; mastication; and lop and scatter. Additionally, many treatments will be preceded and followed by herbicide application and seeding. Previously treated areas will be re-treated as well. The NEPA process for this project is currently underway.

Ridgway State Park
The CSFS is leading this proposed project. The project will treat approximately 90 acres around Ridgway State Park.

Longer-Term Prioritized Projects
The CWPP Stakeholder Group prioritized these longer-term projects during the fourth CWPP meeting. Meeting attendees participated in a project identification activity where each was given three stickers to place on the combined wildfire risk map. These stickers acted as votes for the locations where vegetation management should occur. The six locations that received the most stickers were identified as the longer-term prioritized projects (Figure 43). Only six locations were prioritized due to limited budgets, staffing, and time. In future updates and reviews, additional project locations can be added.

Figure 43: Longer-Term Fuel Treatment Project Locations



Below is the list of longer-term projects in the county, along with a short summary of each project. The locations provided in the map above are approximate, and the actual project may be outside the boundaries or in smaller, specific areas within the locations. These projects are likely to take a longer time to be implemented. For most, the planning process has not yet started. Because of this, the summaries will not be as detailed, with specific types and methods of treatments yet to be identified.

Other non-prioritized areas discussed include, but are not limited to:

- Blackbear Trail Area
- Blue Lakes Trailhead
- Buckhorn Lakes
- Cornerstone Area
- County Road 1
- County Road 24
- County Road 361
- East Horsefly Creek Area
- Elk Mountain Resort Area
- Highway 62
- Highway 550 south of Ouray
- Wildcat/Simms Area
- Wilson Creek Area

Elk Meadows Project

The Elk Meadows neighborhood is west of Highway 550 and approximately four miles south of the Town of Ridgway. These homes are located in the county's highest or second-highest wildfire-risk areas. Many of the homes are located in or near heavily vegetated areas. Evacuation of this neighborhood is a concern, with only one dirt road in or out (County Road 5).

All of the land within the neighborhood is privately owned, which means the county will need to work with private landowners, CSFS, and the WRWC to perform any significant fuel reduction projects. Possible treatment types include creating defensible space, thinning and pre-commercial thinning, logging, ingress/egress routes, fuel breaks, and possibly prescribed burns.

City of Ouray Protection Project

The City of Ouray is surrounded by dense forests and is located in some of the higher wildfire-risk areas in the county. This project will identify possible fuel treatment locations surrounding the community and tie into the Ouray Community Forest Resilience Project where possible. The areas around the city are a mixture of private and USFS land. The city will likely lead this project but will work closely with the USFS, WRWC, and private landowners. Thinning through hand treatment, mastication, and chipping are the most likely treatment types.

Davewood #2 Project

The Davewood area is one of the county's more densely forested areas within USFS lands. It is also adjacent to private land that is densely forested. Seasonal winds favor a southwest flow, and any established fire in these areas is at risk of moderate to rapid growth in a northerly direction through the largely untreated areas adjacent to the forest.

This 1110-acre project would tie into the previously treated and planned treatment locations in the Davewood area. The primary suggested treatment type would be mastication of the Gamble Oak

along topographic transitions, roadways, and structures. Areas with more Pinyon/Juniper could also be thinned, and ladder fuels could be removed through chipping or pile burning. There could also be opportunities to work with adjacent landowners to expand the treatment area. Heritage clearances need to be re-validated in the area, and the first Davewood Project will need to be completed before starting this project.

County Road 8 Project

This future project would cover areas surrounding County Road 8 in the county's eastern portion. This stretch of road is located in the highest wildfire-risk regions in the county and could be used as an evacuation route. This portion of County Road 8 is an identified POD boundary line, so any fuel treatment work would help reduce the spread of wildfire. Possible fuel treatment types include thinning, prescribed burns, and expanding the fuel break created by County Road 8. Most of the surrounding area is USFS land, so they would likely be the ones to implement this project.

Loghill Mesa Protection Project

This potential future project covers a large land area south and west of Loghill Mesa. Loghill has the highest density of homes in the unincorporated areas of Ouray County. Most of these homes are at elevated fire risk because they are located in heavily wooded areas. Loghill has several highly ranked values, including communication towers, the Dallas Creek Water Company, and the Fairway Pines Sanitation Facility.

All the land is privately owned, so the county will need to work with private landowners, CSFS, and the WRWC to perform any significant fuel reduction projects. Treatment types could include defensible space work, thinning, improving ingress/egress, and POD boundary line hardening using fuel breaks.

Highway 550 Between Ouray and Ridgway Project

This future project would cover areas surrounding Highway 550 between the City of Ouray and the Town of Ridgway. This entire stretch of road is located in elevated wildfire risk areas. It is the primary evacuation route for people in the county's southern half, including the City of Ouray. While most of the land is privately owned, there are areas that the USFS or BLM federally owns. Ouray County would likely need to work with private landowners, CSFS, WRWC, USFS, and BLM.

Ideally, this project would tie into the Baldy Mountain project to create a larger treated area. Possible fuel treatment types could include thinning, prescribed burns, and POD boundary line hardening by expanding the fuel break created by Highway 550.

Highway 550 North of Ridgway Project

This project would cover areas surrounding Highway 550 north of the Town of Ridgway. While much of the project would be located in relatively lower wildfire risk areas, the entire stretch of road is the primary evacuation route leading out of the county. A mix of BLM, State, and private landowners owns the project area. The CSFS or BLM would be the most likely agencies to lead this project. Possible fuel treatment types could include thinning, prescribed burns, and POD Boundary line hardening by expanding the fuel break created by Highway 550.

Watershed Projects

Implement Projects Identified in the Dallas Creek Water Company Source Water Protection Plan
The Dallas Creek Water Company completed its Source Water Protection Plan (SWPP) in August 2016. Dallas Creek Water Company provides drinking water to Loghill Mesa. The SWPP aims to understand potential risks to the watershed better and identify actions to protect and enhance the drinking water supply. The plan recognizes wildfires as a high-priority issue and identifies best management practices. The identified practices to implement are listed below. The Dallas Creek Water Company will implement these actions.

- Explore opportunities for watershed health improvement grant funding.
- Share a copy of the plan and shapefiles with Ouray County, USFS, CFSF, and the West Regional Wildfire Council.
    - Work with USFS, CSFS, West Region Wildfire Council, and Ouray County to educate homeowners about creating and maintaining defensible space on private lands.
- Share a copy of the SWPP with the Ouray County Sheriff's Department regarding fire bans and restrictions. Encourage collaboration with the Sheriff's Department in reviewing fire prevention measures.
- Evaluate fuel conditions to develop fuel mitigation or treatment projects and fire response plans for the Source Water Protection Area with USFS, CSFS, Division of Fire Prevention and Control, Log Hill Fire Protection District, and Ridgway Fire Protection District.

Implement Actions Identified in the Town of Ridgway Source Water Protection Plan
The Town of Ridgway completed its Source Water Protection Plan in September 2012. The SWPP states that wildfire can impact the town's drinking water in several ways. Increased sediment can make it challenging to treat the water, and runoff changes could affect water availability in summer. Within the plan, several actions related to wildfires can be implemented. The Town of Ridgway will implement these actions.

Develop a Source Water Protection Plan for the City of Ouray
The City of Ouray does not have a Source Water Protection Plan. An SWPP can help the city better understand potential watershed and drinking water risks related to wildfires. It will also help the city identify possible actions to help protect the city's drinking water from wildfire impacts. The City of Ouray will lead the development of the SWPP.

Develop Wildfire Ready Action Plan
To better understand the watershed risks and vulnerabilities at the community level, the City of Ouray and the Town of Ridgway should look into developing a Wildfire Ready Action Plan (WRAP) for their drinking water sources. A WRAP will include hazard analysis and evaluations and identify pre- and post-fire management actions that can be taken. The Colorado Watershed Restoration Program has grant funds available to governmental entities to create a WRAP and implement projects identified in the plan.

Wet Meadow Creation
Work with the Uncompahgre Watershed Partnership to coordinate low-tech process-based restoration projects to re-wet and green up meadows in the county. Implementing these wet meadow projects makes them less likely to burn and can act as fire breaks, reducing wildfire spread. Local fire protection districts, Ouray County, and the Uncompahgre Watershed

Partnership can work together to identify locations where there would be both habitat and wildfire risk reduction benefits.

Snowpack Projects

This action contains two snowpack projects. These projects entail snowpack monitoring, and high-country vegetation manipulations to increase the snowpack. Snowpack monitoring consists of measuring and observing snow accumulations and changes over time. It can help predict drought and the severity and timing of the fire season. Vegetation manipulation by intentionally changing the type, density, or structure of vegetation can help to retain more snow and slow its melt in high-country areas. It can help reduce fuel loads and create a more reliable spring/summer runoff.

Fire-Adapted Communities Actions

The goal of fire-adapted communities is to empower the county and its residents to "live with wildfire," including being prepared to withstand, respond to, and recover from wildfires. Several actions were identified during the CWPP meetings to help achieve this goal. A summary of these actions is outlined below.

Joint Task Force on Wildfire Education

This action is creating a Joint Task Force to lead a programmatic wildfire education and outreach campaign. Currently, wildfire education in the county is done separately by the communities, county, local fire districts, federal agencies, HOAs, and other non-profit organizations. No entity can handle all education needs due to limited staffing, time, and budgets. By creating a Joint Task Force comprising all these entities, resources can be pooled, and a unified education campaign can be created. The task force will help to ensure a consistent message that maximizes impact and enhances efficiency in delivering wildfire education to residents and visitors. Initial discussions have the West Region Wildfire Council leading the creation of the Joint Task Force, and a meeting is scheduled.

Wildfire Code Updates and Enforcement

The Colorado Wildfire Resiliency Code Board is creating a statewide wildfire resiliency code. Once approved and adopted, governing bodies must adopt this code. However, local wildfire regulations can exceed the state code requirements.

This action aims to ensure local codes meet or exceed the new state wildfire resiliency code. The county's code will likely exceed the state code. However, the county code should be reviewed against the state code and updated if needed. The City of Ouray and the Town of Ridgway may need to update their local codes to meet or exceed the state code. Another issue in the county and local communities is enforcing their codes. Capacity building within the county and local communities is needed to help enforce codes for both new construction and existing properties.

Neighborhood-Level Evacuation Planning

Ouray County completed a county-wide evacuation plan that identifies such items as the primary evacuation routes, challenges regarding evacuation, and roles and responsibilities during an evacuation event. Given the scale of the plan, it is not feasible to plan the best evacuation routes for each house or neighborhood. Individuals at the neighborhood level should plan the best routes that lead to the main evacuation routes identified in the county plan. These evacuation plans will make residents more prepared during an evacuation event.

Protect County Structures and Infrastructure

Many county-owned structures and infrastructure are located in high wildfire-risk areas with many sites, like the county radio/cell towers, that are surrounded by wildland vegetation. Ouray County Emergency Management, with assistance from local fire districts, will identify structures and pieces of infrastructure that either need to be hardened against wildfire or need defensible space. Once these sites have been identified, specific mitigation work will be performed.

Insurance Company Collaboration

As more and more large wildfire events occur across the country, insurance companies are starting to pull out of high-risk areas or increase premiums for wildfire coverage. In the CWPP public survey, reduced homeowner insurance rates would be the most encouraging factor for homeowners to reduce wildfire risks on their property. Most insurance companies use their own wildfire risk metrics and do not consider local risk indicators or mitigation work on individual properties.

This action aims for Ouray County and the West Region Wildfire Council to work collaboratively with insurance companies to discuss the possibility of offering lower insurance rates for homes that have done mitigation work. One possible solution is to tie in the Wildfire Ready Home Program discussed in the previous action. The West Region Wildfire Council and the county could work with insurance companies to see if they can offer lower rates for homes that have received a Wildfire Ready Home Certification of Completion.

Subdivision Wildfire Requirements

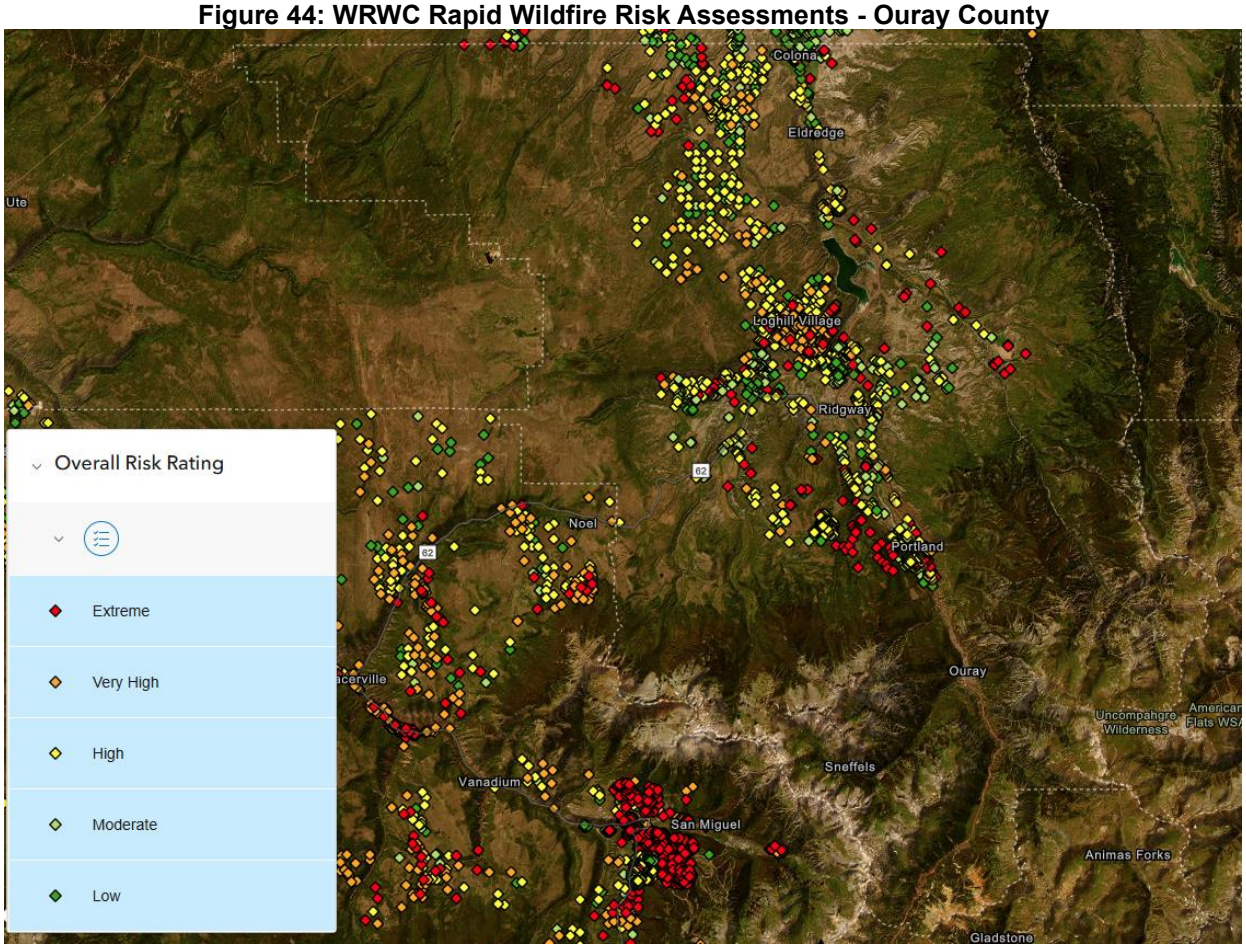
Ouray County will explore adding additional wildfire requirements for subdivision-planned unit development approvals. Possible additions include additional defensible space requirements and requiring the development of a CWPP for the subdivision. These wildfire requirements will help reduce further risk for the new subdivisions, which will likely be built in heavily vegetated areas.

Conduct Rapid Wildfire Risk Assessments

The West Region Wildfire Council can conduct curbside Wildfire Risk Assessments of properties in the WUI. These property-level wildfire risk assessments are based on attributes related to building materials, vegetation near the home, background fuels, topography, and access. The assessment rating gives a risk value relative to neighboring properties. This outreach tool can help inform residents of their risk and encourage them to seek education and resources. As seen on the map below, many homes in Ouray County have already been assessed.

This action aims to increase the number of properties with a risk assessment, especially in and around the City of Ouray. The West Region Wildfire Council will lead the outreach about the assessment and will lead the assessments as funding and capacity allow.

Figure 44: WRWC Rapid Wildfire Risk Assessments - Ouray County



Source: West Region Wildfire Council

Promote the West Region Wildfire Council's Wildfire Ready Home Program

The West Region Wildfire Council has a Wildfire Ready Home Program that homeowners can sign up for and learn practical steps to reduce risks around their homes. During the program, homeowners will work with a Wildfire Ready Home Assessor who will provide them with a detailed Wildfire Ready Home Report that contains specific and targeted recommendations. After completing the program, homeowners will receive a Wildfire Ready Home Certification for Completion.

This action aims to increase the number of residents who have taken the appropriate steps to understand their wildfire risk and the available resources in the area and to increase the number of homes mitigated by creating defensible spaces and hardening structures. The Joint Task Force will lead the outreach about the program, and the West Region Wildfire Council will lead the program's operation.

City of Ouray Forest Management Program

The City of Ouray wants to create an active forest management and improvement program for all city-owned properties. This program will help ensure good land stewardship, wildlife habitat rehabilitation, and wildfire mitigation, promoting overall forest health. Specific wildfire mitigation projects have not been identified but will be during the program's creation. The city hopes to create this program over the next five to ten years.

Safe and Effective Wildfire Response Actions

The goal of safe and effective wildfire response is to enable safe and efficient wildfire response through improved planning, coordination, and capacity building. Actions were identified during the CWPP meetings to support this goal. A summary of these actions is provided below.

Water Source Improvements

Most fire districts have limited access to water and may have to travel longer distances to refill tankers. Having few water sources can limit their ability to control and contain wildfire events quickly. Streams are an option to pull water, but it might not be possible during a drought year when wildfire risk has already increased.

This action aims to increase water source availability throughout the county. The first step is to pre-identify water sources that will likely be available during drought conditions. Listing water sources can help identify areas where water for firefighting is scarce. In these areas, fire districts and the county can work together to install above-ground cisterns and tanks, partner with local landowners to use irrigation equipment or ponds, and work with water providers to extend water mains and hydrants. In areas where there are natural water sources, fire districts can work to install dry hydrants and maintain access points. Local fire districts can also look into expanding the number and size of water tenders. The local fire protection districts and Ouray County Emergency Management will lead this project, and local communities will assist as needed.

Emergency Response Radio and Emergency Alert Training

Ouray County Emergency Management identified a need for training on the emergency response radios for all volunteers and emergency response personnel. Training will help ensure all organizations can communicate and promptly get the resources and information they need. Training on emergency response radios should be held on at least an annual basis. The training will be organized and held by Ouray County Emergency Management. BLM and the Colorado Division of Fire Prevention and Control can also assist with radio training for local fire districts.

Currently, only three individuals in the county can send out emergency alerts. Most of these individuals would likely be out in the field during an emergency and may be unavailable to send out the alerts. Ouray County would like to increase the number of staff trained on emergency alerts so they can serve as backups if needed.

Fire District and Governmental Personnel

Like many other mountain communities and regions, local fire protection districts and local governments in the county have a hard time with staffing. One of the big reasons for this is the lack of affordable housing in the county. Finding affordable housing for first responders and other key governmental staff will help to find and retain needed staff. Ouray County, the Town of Ridgway, and the City of Ouray should look into creating affordable housing plans if one has not already been made. These entities should also look into implementing workforce housing solutions such as down payment assistance, subsidized housing, and zoning adjustments for affordable housing development.

Project Funding

Grant funding support is often necessary for vegetation management projects and can facilitate fuel reduction on private and public lands. Due to an ever-changing political and funding landscape, specific grant programs will not be discussed in this plan. On a federal level, wildfire grants have historically come from three primary sources: the USFS, BLM, and FEMA. On the state level, grants will likely come from the CSFS, Colorado Division of Fire Prevention & Control,

Colorado Department of Natural Resources, and Colorado Water Conservation Board. It is recommended that the CWPP Stakeholder Group regularly check with these federal and state agencies on available grant funds. The Colorado Department of Local Affairs has also compiled a Local Community Funding Guide to help navigate various state and federal funding types.

While grants can help fund wildfire projects, they are not the only option. Many other resources include local funding options (local budgets, capital improvement programs, fees, etc.), public-private partnerships, donations, private foundations, and non-profit organizations. Funding projects and actions will likely take innovative solutions from various sources.

Implementation & Updates

The risk reduction projects and actions outlined in this plan will significantly reduce wildfire risk, but only if implemented. Converting strategy into action is the key to achieving the goals of the CWPP. Where possible, the identified fuel treatment projects and wildfire mitigation actions have identified who will oversee the execution of the project. However, many projects and actions will require collaboration among federal agencies, Ouray County, fire protection districts, communities, local organizations, and private landowners.

An essential component of the implementation process includes identifying a team that will move the plan forward, help implement the mitigation recommendations, and continue planning additional wildfire mitigation actions. This plan recommends that the CWPP Stakeholder Group become that implementation team as it already comprises all the key stakeholders. Regular meetings of the CWPP Stakeholder Group should occur and can be coordinated through Ouray County Emergency Management. The CWPP encourages individuals and home-owner associations to take an active role in this process by attending these meetings and continuing to provide input.

The Ouray County CWPP is a valuable resource that provides the foundation for understanding wildfire risks and hazards and presents attainable actions designed to reduce potential losses from wildfire. This CWPP must be continually monitored and updated as conditions and community values change. It is recommended that Ouray County Emergency Management lead any updates with assistance from the CWPP Stakeholder Group. The CWPP should undergo a complete update every five to ten years. The update ensures that a wildfire risk analysis is as up-to-date as possible. It also allows for updating community values and wildfire risk reduction projects based on changing priorities and landscapes. More minor updates to the plan may be incorporated more frequently, especially in the event of a large wildfire in the county.