



# Bridging the Gap



WARNER COLLEGE OF NATURAL RESOURCES

## COLORADO WILDFIRE RISK ASSESSMENT

utilization of data in

Wildfire Mitigation & Education  
Assessment and Planning





# Decision Making



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Colorado  
Wildfire Risk  
Assessment

CO-WRAP  
Web Mapping  
Tool

CWPP  
Reports  
Prioritization



# The Colorado Wildfire Risk Assessment



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- Purpose
  - Quantify the magnitude of current wildfire problem in Colorado
  - Provide foundation for coordinating policy
  - Provide baseline data
  - Enhance communication
- Scope
  - All lands
  - Measure threat, fire effects, & risk
  - Quantitative, repeatable & consistent
  - Summarize by state & county
  - Leverage existing data & methods





# Putting Colorado WRA Data to Use



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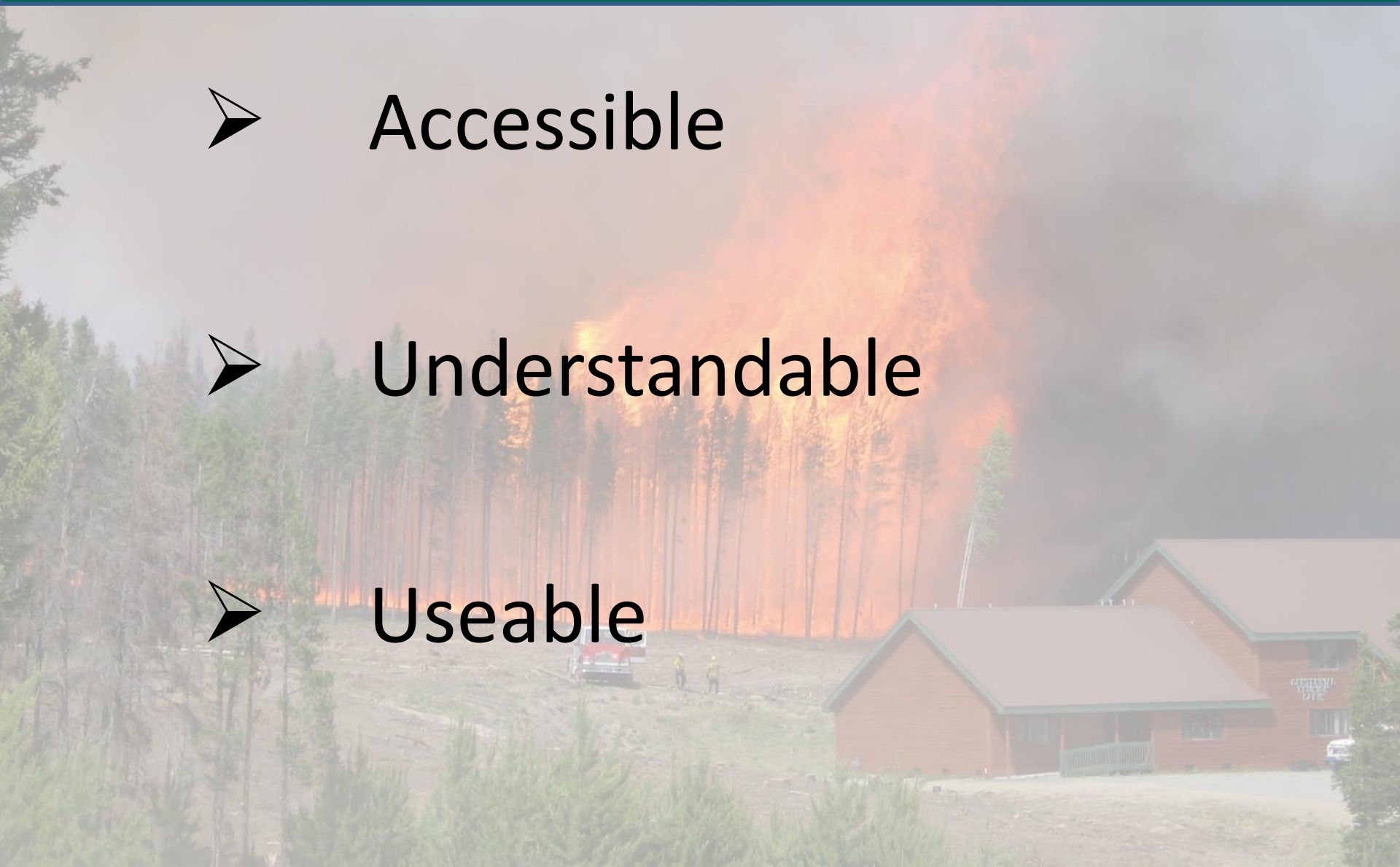
Accessible



Understandable



Useable





# Colorado Wildfire Risk Assessment Portal



Colorado  
State  
University

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CoWRAP Home

Sign In

Home Support Contact

 **COLORADO WILDFIRE**  
RISK ASSESSMENT PORTAL

**Are you at Risk?**

Wildland fires continue to threaten people and property across Colorado. Continued population growth into wildland-urban interface areas and an increasing frequency of elevated fire weather conditions present major challenges to Colorado residents. Heightened awareness of wildfire risk, prevention and mitigation are becoming increasingly important to ensure safety. The Colorado Wildfire Risk Assessment Portal provides access to information that describes wildland fire risk statewide.

[LEARN MORE](#)

**Applications**

**Public Viewer**  
Identify your risk 

**Professional Viewer**  
Support your fire protection plans 

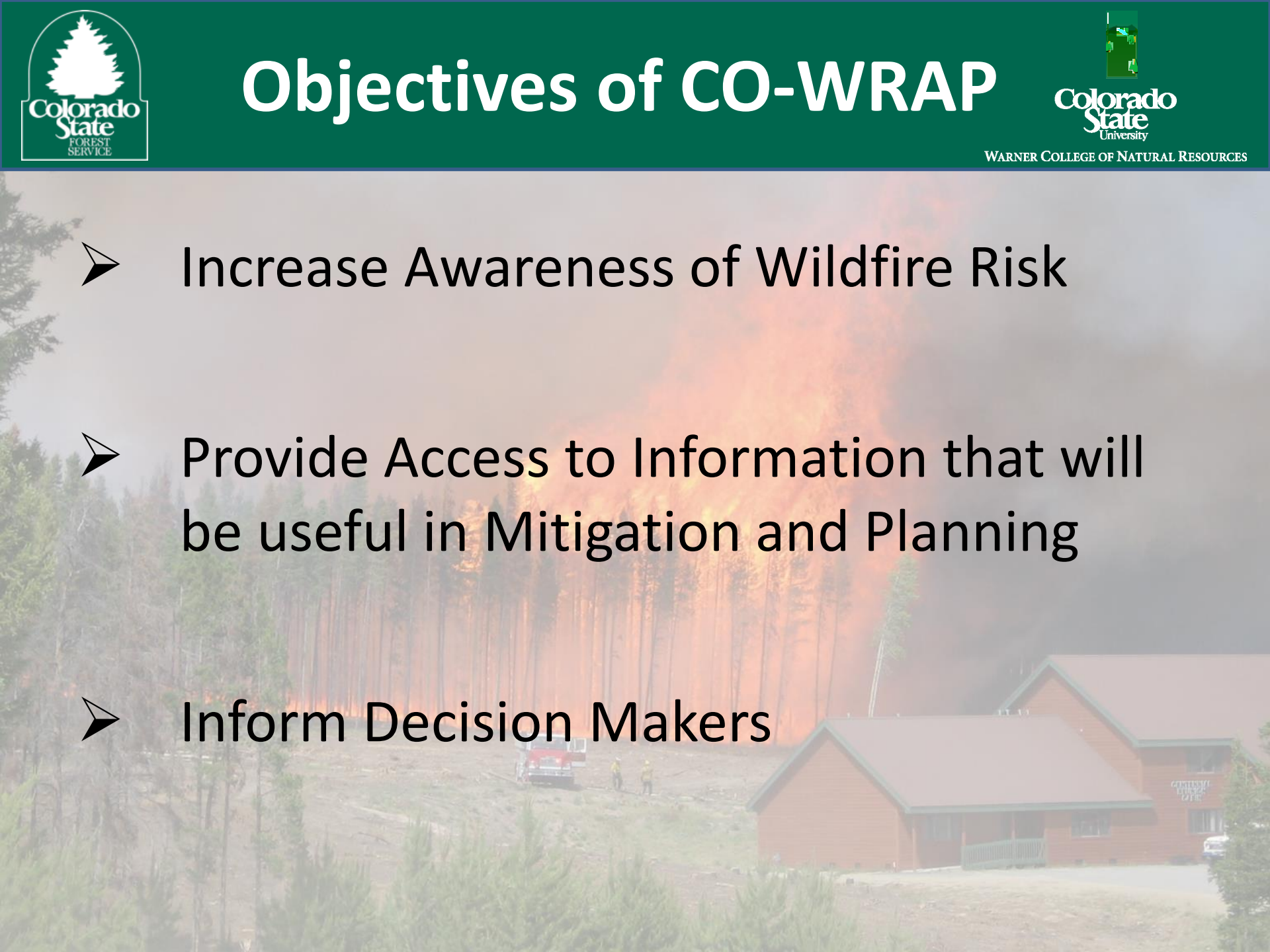
**About the applications**

The Colorado WRAP is the primary mechanism for the Colorado State Forest Service to deploy risk information and create awareness about wildfire issues across the state. It is comprised of a suite of applications tailored to support specific workflow and information requirements for the public, local community groups, private landowners, government officials, hazard-mitigation planners, and wildland fire managers. Collectively these applications will provide the baseline information needed to support mitigation and prevention efforts across the state.



**COLORADO WILDFIRE**  
RISK ASSESSMENT PORTAL

# Objectives of CO-WRAP

- 
- A large, intense wildfire is burning in a forest, with thick black smoke rising into the sky. In the foreground, a red fire truck and two firefighters are visible near a wooden building, likely a fire station or training facility.
- Increase Awareness of Wildfire Risk
  - Provide Access to Information that will be useful in Mitigation and Planning
  - Inform Decision Makers



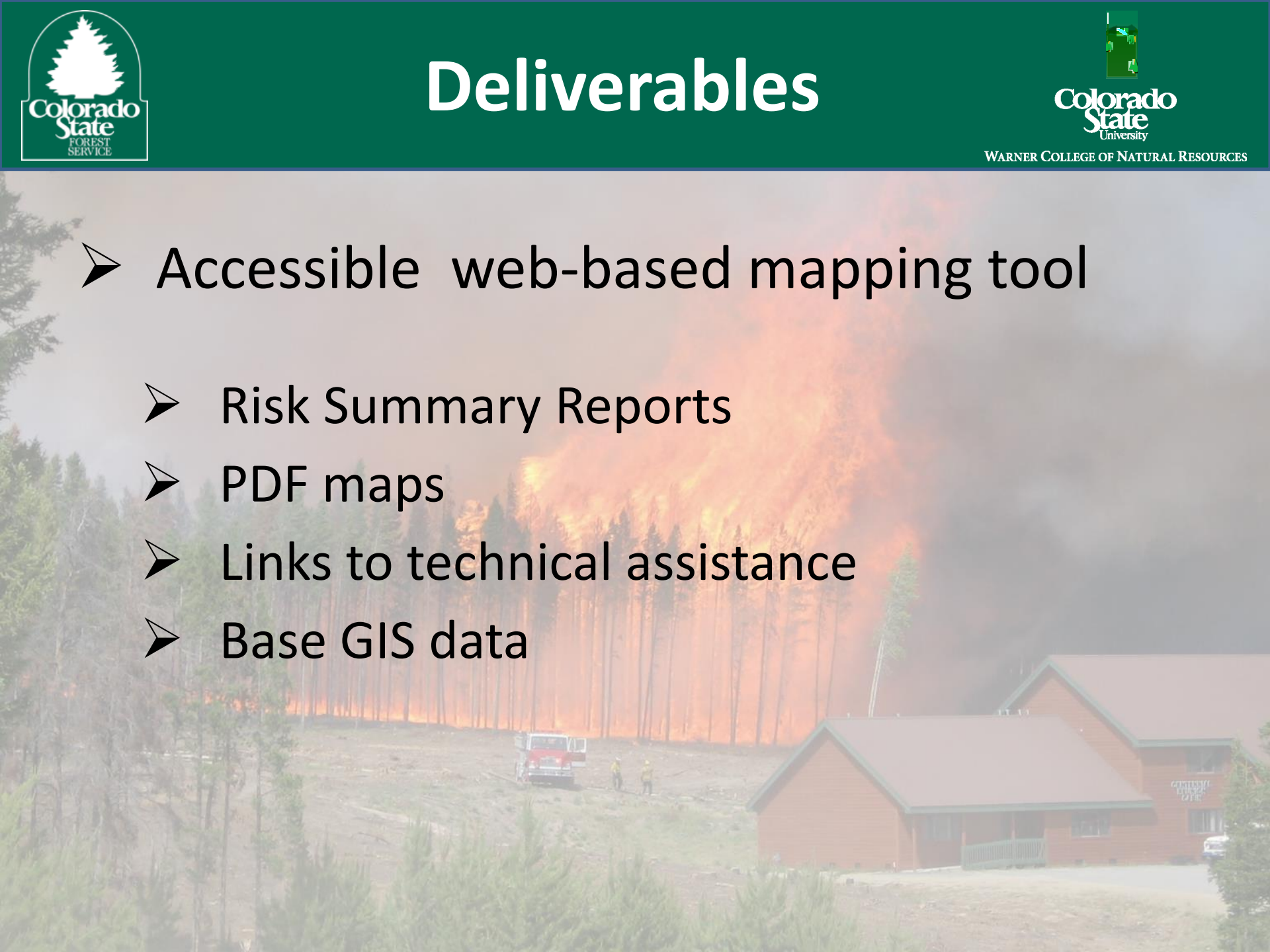


# CO-WRAP Tool Attributes



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- Simple to access
- Leverage Resources that already exist
- Self explanatory – intuitive
- Adaptive to future uses
- Reaches diverse audiences
- Boosts Understanding
- Inspires Action

- 
- A large, intense forest fire is burning in the background, with thick black smoke rising into the sky. In the foreground, a red fire truck is parked on a dirt road, and two firefighters are visible. A wooden building is partially visible on the right side of the image.
- Accessible web-based mapping tool
    - Risk Summary Reports
    - PDF maps
    - Links to technical assistance
    - Base GIS data



# The Colorado Wildfire Risk Assessment Portal

Getting Started ?

Explore Map Themes ?

Manage Project Areas ?

Generate Summary Report ?

Export Data ?

Print Map ?

Zoom To... ?

Zoom To Results ?

Export Data ?

Export GIS data for the active Project Area. Requires ArcGIS Desktop 9.3 or higher.

An email will be sent to the following email address with a link to download the requested data.

Send download link to:



Explore Map Themes ?

- ▶ Reference Base Layers
- ▶ Wildfire Risk Themes
- ▶ Wildfire Effects Themes
- ▶ Wildfire Behavior Outputs
- ▶ Landscape Characteristics
- ▶ Historical Wildfire Occurrence
- ▶ Forest Management Activities

Active Layer Description

Forest Management Activities 2010

Show Legend Full Description

Transparency  25

Explore Map Themes ?

▼ Reference Base Layers

- ☐ Cities
- ☒ County Boundaries
- ☐ Fire Protection Districts
- ☐ Schools
- ☐ Hospitals
- ☐ Active Coal Fires
- ☐ 2011-12 Large Fire Perimeters
- ☐ 2000-10 Large Fire Perimeters
- ☐ HUC 12 Subwatersheds

▼ Wildfire Risk Themes

- Wildfire Risk
- Wildfire Threat
- Fire Intensity Scale

▼ Wildfire Effects Themes

- Values at Risk Rating
- Suppression Difficulty Rating
- Wildland Urban Interface Risk
- Drinking Water Risk
- Forest Assets Risk
- Riparian Assets Risk

▼ Wildfire Behavior Outputs

- Characteristic Flame Length
- Characteristic Rate of Spread
- Fire Type - Extreme

▼ Landscape Characteristics

- Surface Fuels
- Vegetation
- Wildland Urban Interface
- Forest Assets
- Riparian Assets
- Drinking Water Importance Areas
- Ownership
- Threats to Forest Health

▼ Historical Wildfire Occurrence

- Federal Fire Ignitions
- Fire Occurrence
- Non Federal Fire Ignitions

▼ Forest Management Activities

- Activities 2008
- Activities 2009
- Activities 2010
- Activities 2011
- Activities 2012

# Utility of CO-WRAP

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Email or Phone

☐ Keep me logged in

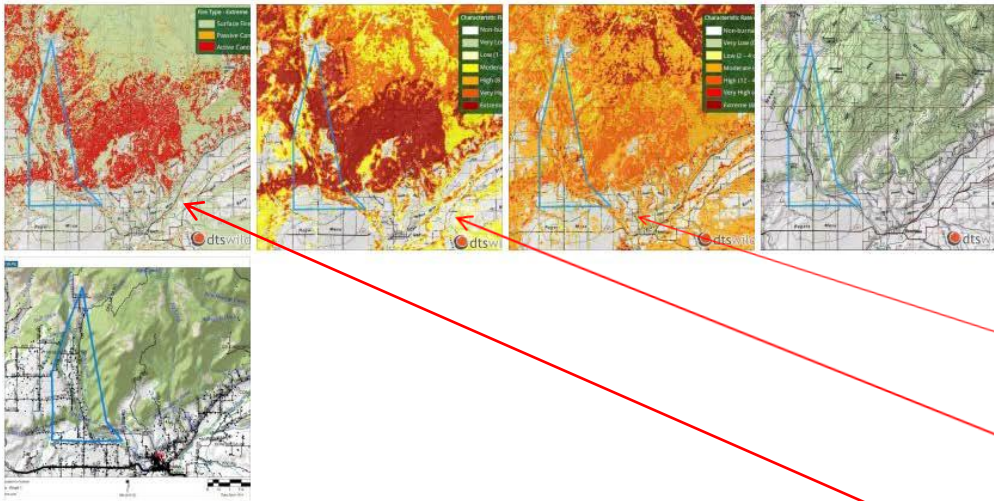
Password

[Forgot your password?](#)

## mid-3100 Rd wildfire potentials

Updated on Sunday

a visualization of the danger a wildfire would present in this area.



Like · Comment · Share

Shellie Gies, Jesse Roberts, Randi Miller and 2 others like this.

View 2 more comments



**Hotchkiss Fire Protection District** HFD considers this area to be a major concern if a wildfire breaks out. We think the number of homes (174 inside the blue lines), the traffic on 3100 Rd, and the dangerous fire behavior may pose a severe risk to life safety, and could result in major ... [See More](#)  
Sunday at 9:05am



**Hotchkiss Fire Protection District** The maps were created from data on the COWRAP website (Colorado Wildfire Risk Assessment Portal), offered by the Colorado State Forest Service. Thanks to Richard Holman of CSFS for letting us work with this great tool. We've used it for assessing the risks to the Town of Hotchkiss's water supply, and will post more areas in the HFD's service area in the upcoming weeks.  
Sunday at 9:10am

Other Albums

- Response to Wildfire
  - Prevention
  - Evacuation

Characteristic Flame Length

Characteristic Rate of Spread

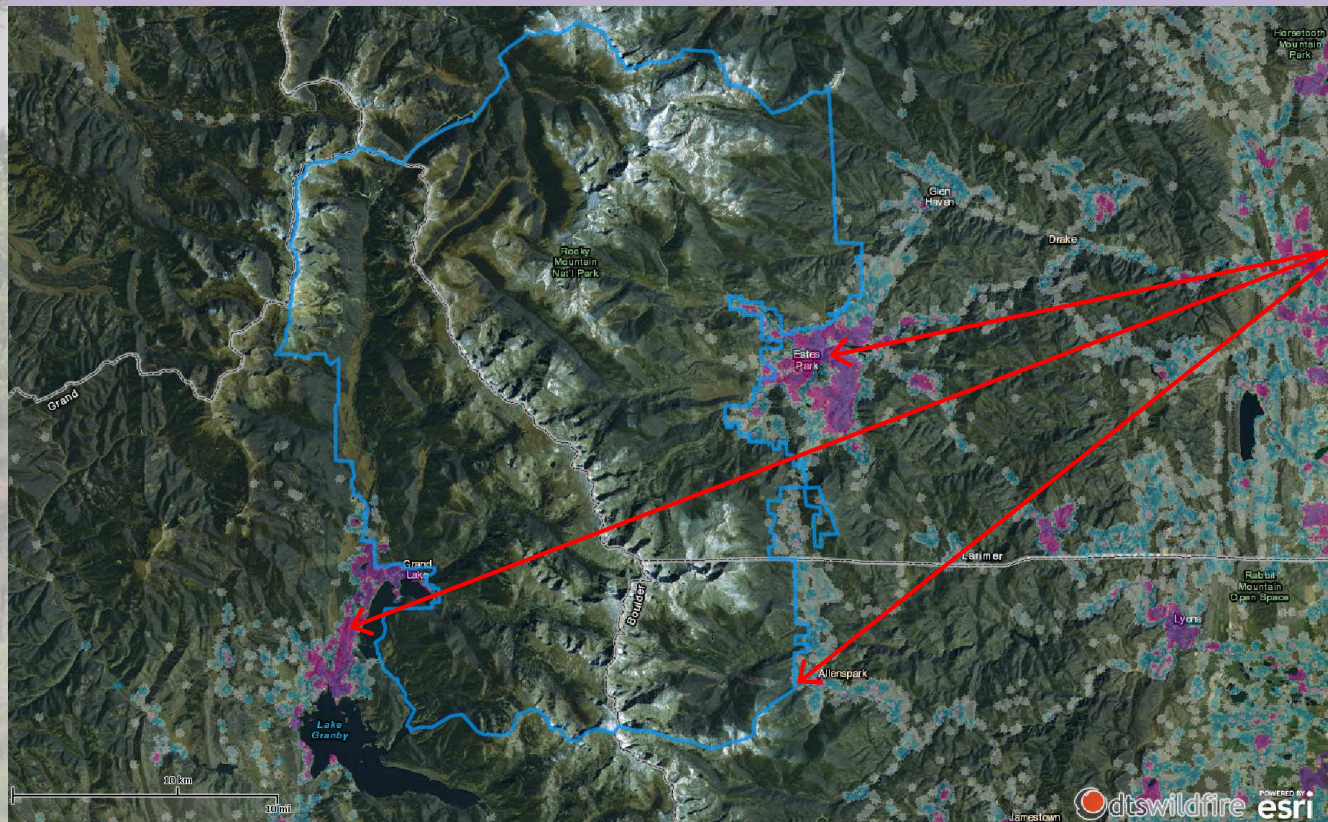
Fire Type



# Utility of CO-WRAP

## ➤ Restoration of Resilient Landscapes

Rocky Mountain National Park:  
Housing Density Adjacent to Park



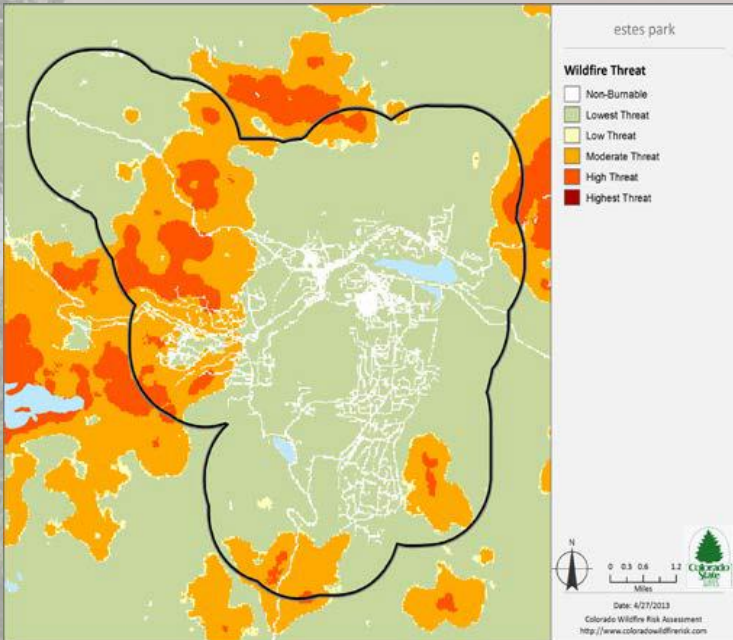
Communities adjacent to  
treatments



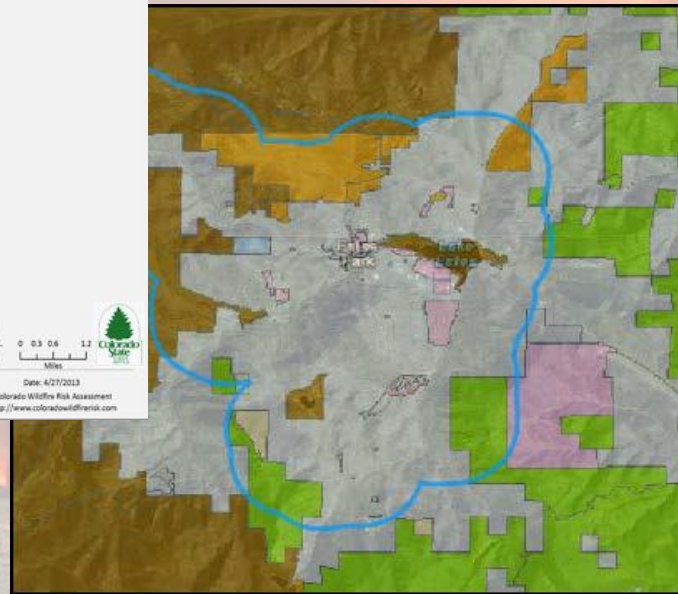


# Utility of CO-WRAP

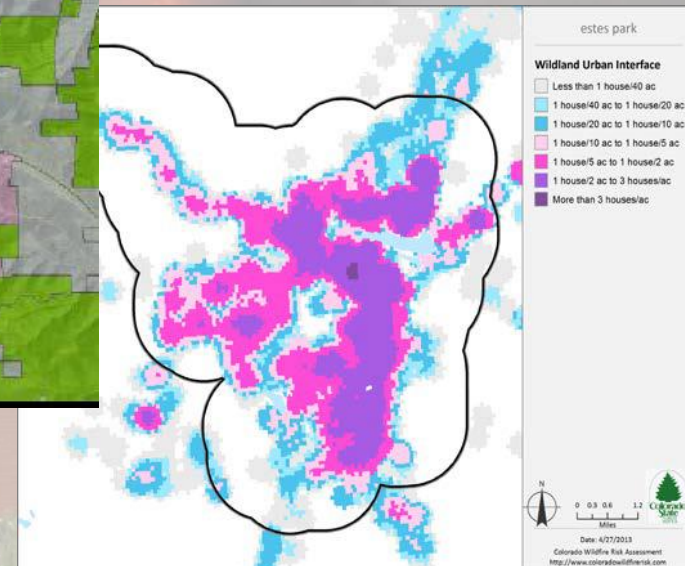
- Fire Adapted Communities
- Community Wildfire Protection Plans



Threat



Ownership



Housing Density

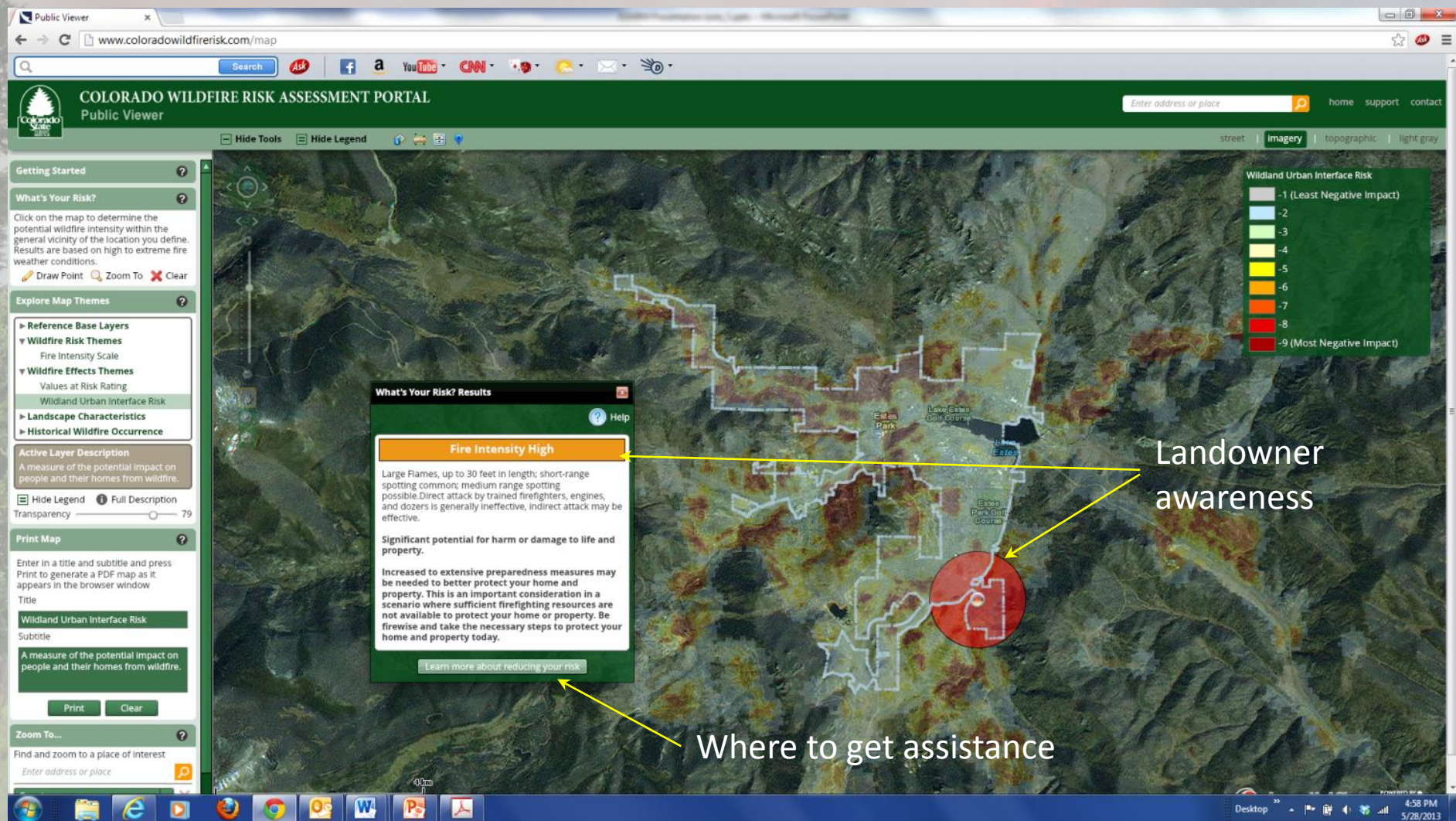




# Utility of CO-WRAP



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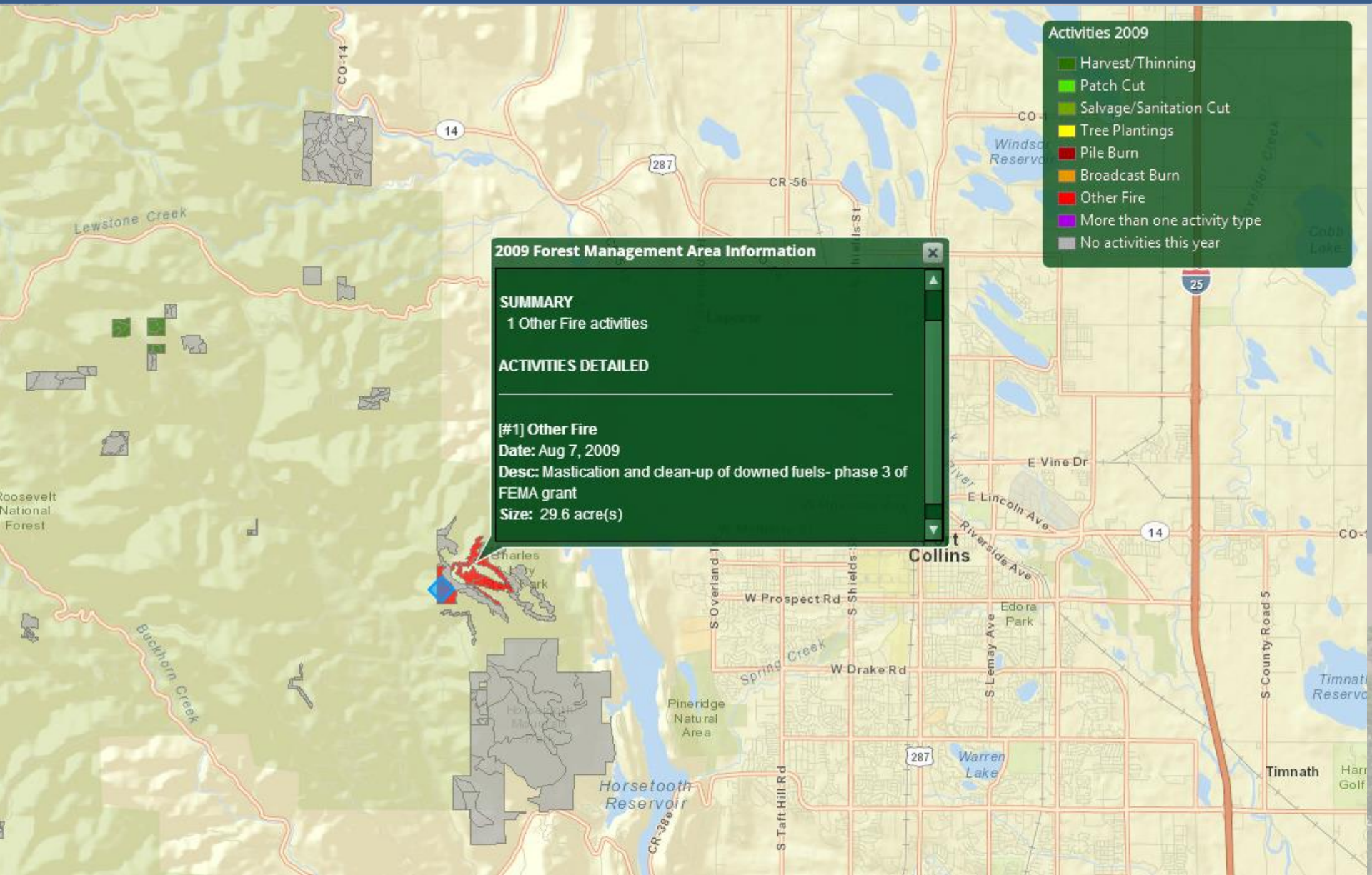




# The Colorado Wildfire Risk Assessment



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# Links



Colorado  
State  
University

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A large, intense wildfire is burning in a forest, with thick black smoke rising into the sky. In the foreground, a red fire truck and two firefighters are visible on a dirt road. To the right, a large wooden building with a green roof is partially visible.

<http://csfs.colostate.edu/>  
[www.ColoradoWildfireRisk.com](http://www.ColoradoWildfireRisk.com)



# CO-WRAP



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