

# Wildland-Urban Interface Code

Public Safety Commission

June 3, 2019





# The Current State of Austin's Interface

61% of Austin structures are Wildland Urban Interface

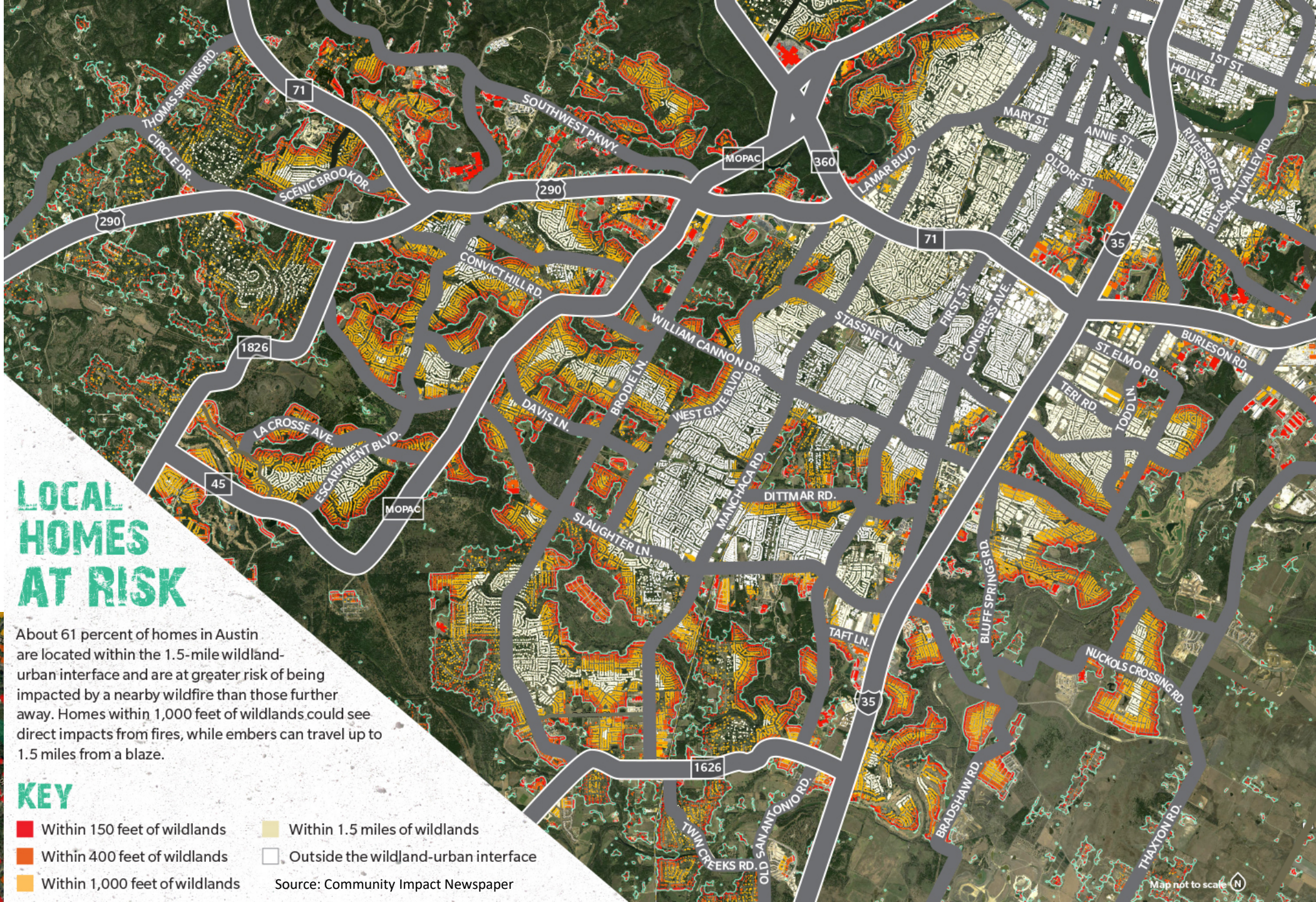
67% of Travis County Structures are Wildlands Urban Interface

## LOCAL HOMES AT RISK

About 61 percent of homes in Austin are located within the 1.5-mile wildland-urban interface and are at greater risk of being impacted by a nearby wildfire than those further away. Homes within 1,000 feet of wildlands could see direct impacts from fires, while embers can travel up to 1.5 miles from a blaze.

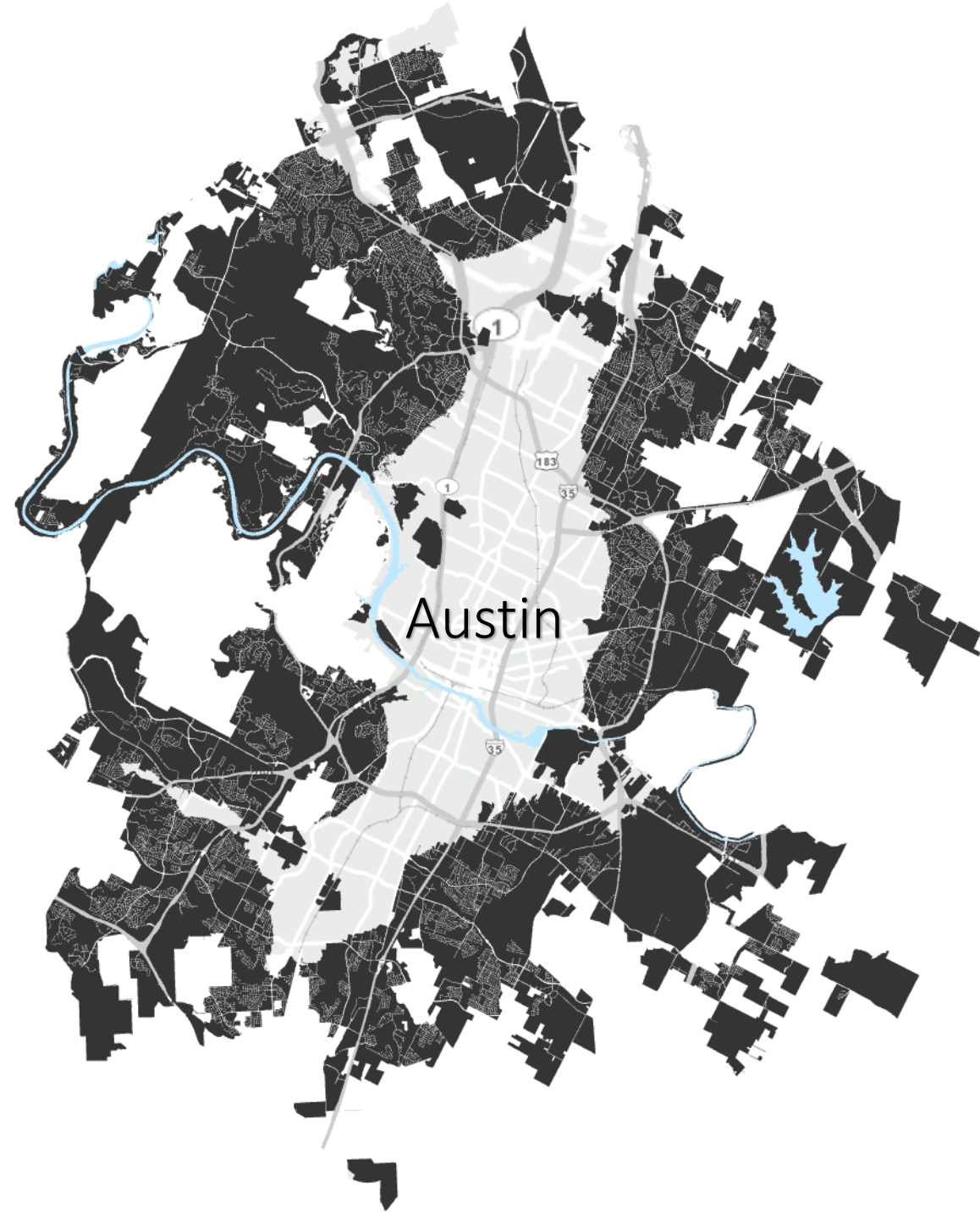
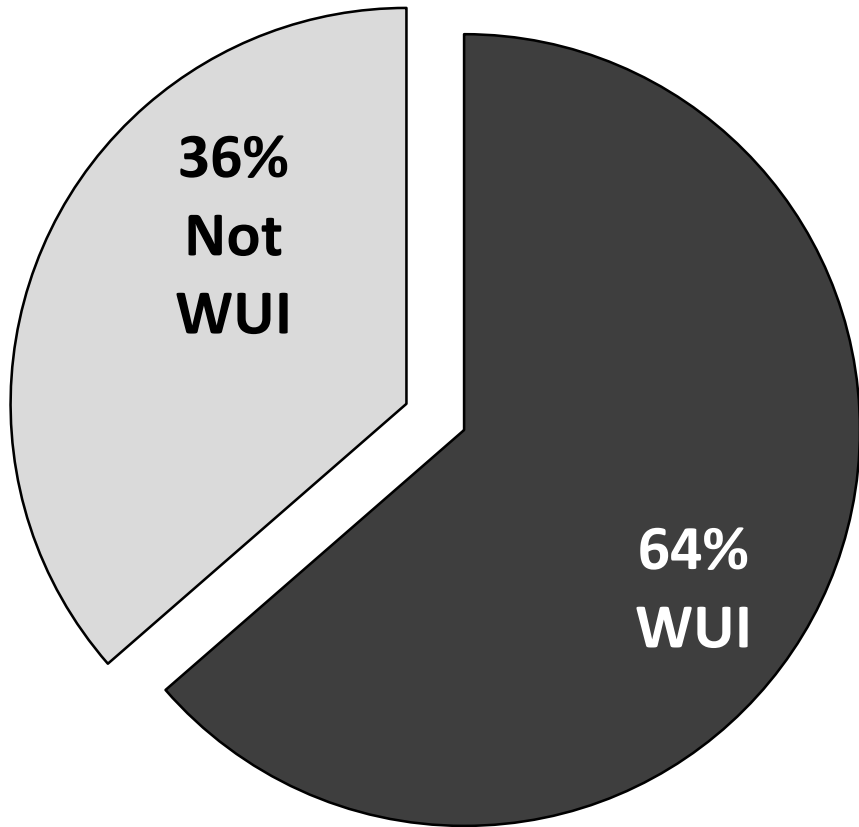
### KEY

- |                                |                                      |
|--------------------------------|--------------------------------------|
| Within 150 feet of wildlands   | Within 1.5 miles of wildlands        |
| Within 400 feet of wildlands   | Outside the wildland-urban interface |
| Within 1,000 feet of wildlands |                                      |
- Source: Community Impact Newspaper

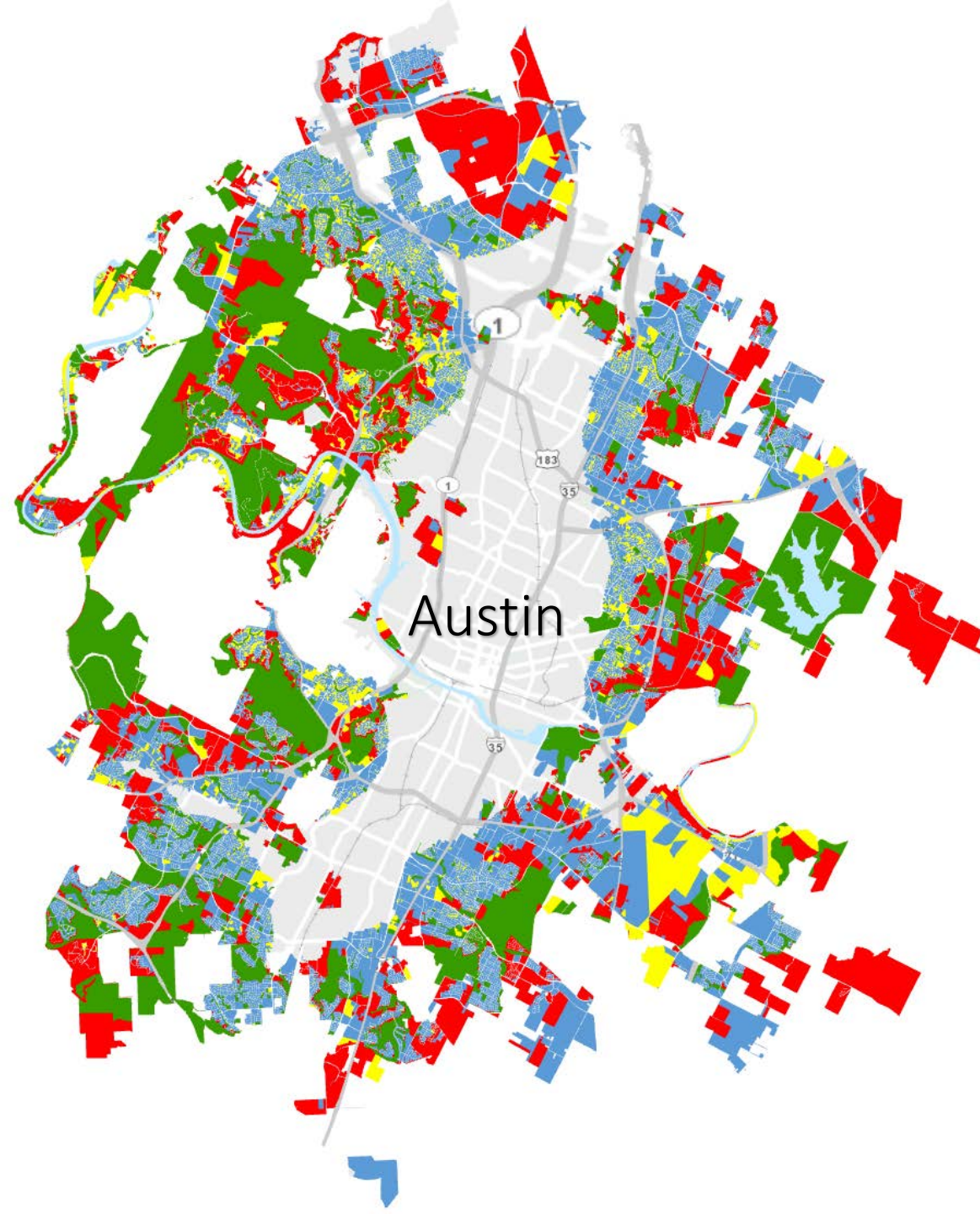
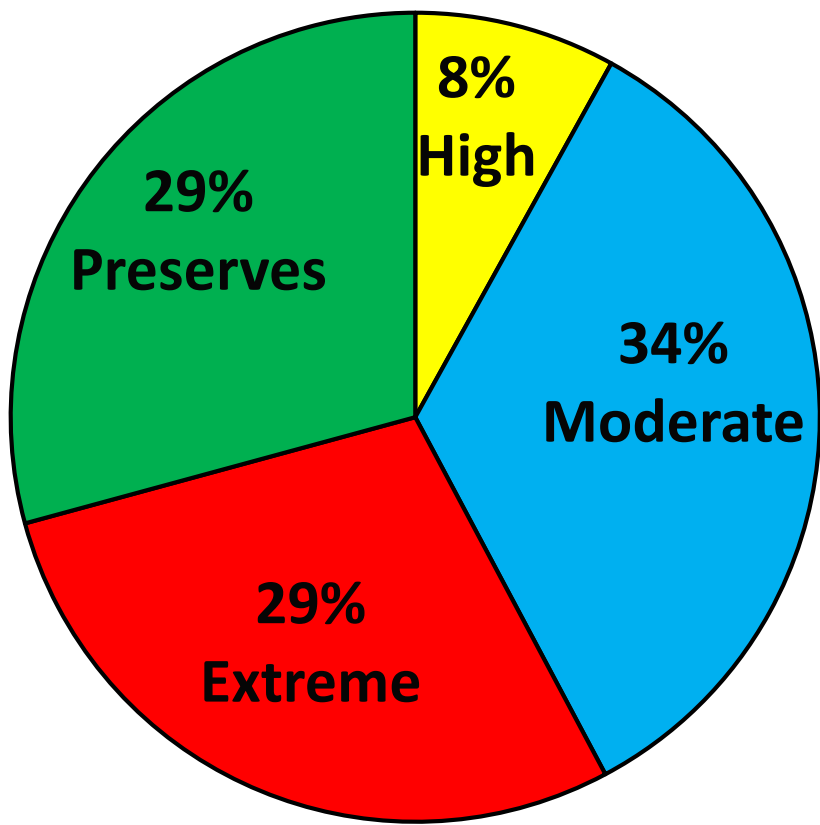




# WUI Area Footprint



# WUI Hazard Severity Zones



# WUI Code and SD 2023





# Applicability

## Future Development

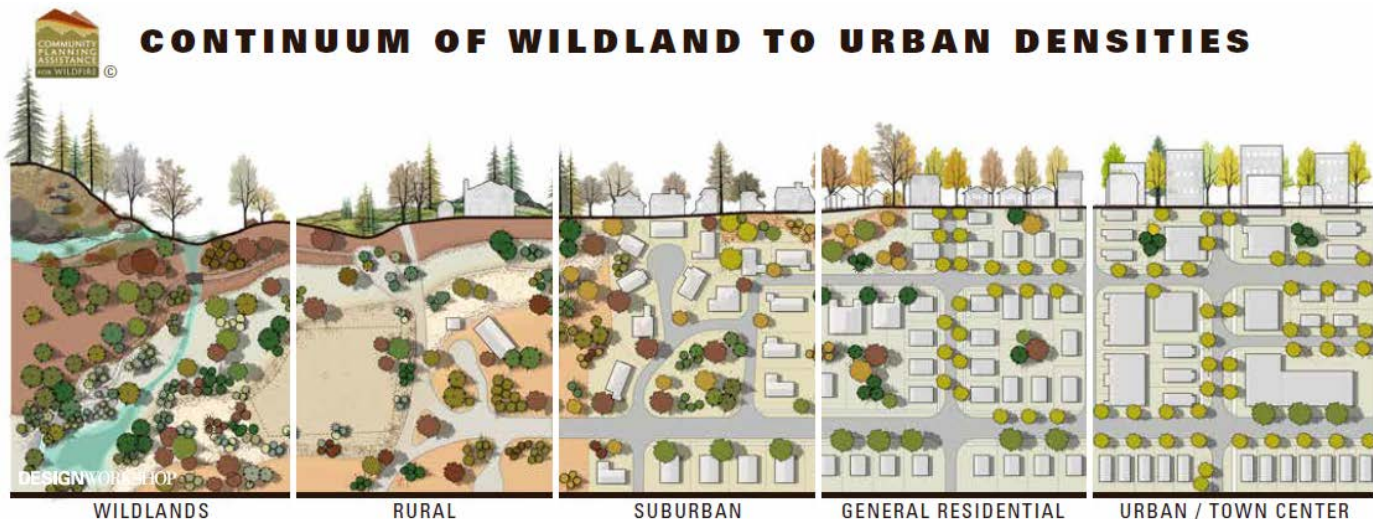
New homes and remodels in WUI Areas

- Ember protection
- Structure hardening

## Existing Development

Defensible space for distinct hazards

- No water supply
- Limited access
- Heavy fuel loading
- Steep slopes
- Adjacent to 40 acre or larger wildland area
- Vulnerable structure
- High community risk



# WUI Code and other City codes

## Stand Alone Technical Code

- Fire code
  - Access
  - Water Supply
  - Permitting and Inspection
- Land Development Code
  - Subdivision – access points
  - Transportation – driveway standards, WUI code will add standards for private driveways longer than 150'
- City code title 10 – Public Health Services and Sanitation
  - “An owner, occupant, or other person in control of real property shall maintain the property in a safe, sanitary condition.”

# WUI Code Timeline

- Today – Public Safety Commission
  - Final stakeholder engagement
- August 2019 – Building and Fire Code Board of Appeals
  - Public review and comment period
- October 2019 – City Council Public Hearing and Request for Action
- October 2019 to March 2020
  - Administrative rules finalization
  - Public education
  - Staffing
  - Implementation



# Estimated Costs to Implement

- Personnel \$1.2 million
  - 4 plan reviewers, civilian engineers
  - 4 inspectors, AFD Lieutenants
  - 1 Supervisor, AFD Captain
  - 1 Wildfire Compliance Specialist
- One Time \$300K
- On-going operations \$50K
- Estimated Outreach & Education \$100K

# Fees (to be determined)

- Plan reviews \$\_\_\_\_\_
- Residential
- Commercial
- Inspections/ re-inspections \$\_\_\_\_\_

## From current residential permit application:






**Fire Review** – There is additional review of a project if the square footage of a structure exceeds 3,600 square feet in area. The 3,600 sq. ft. includes the total gross building area: all first, second, and additional floor areas; attached covered porches, patios, decks, and balconys; attached garages; and any other attached roofed areas. The review ensures adequate proximity to fire hydrants and sufficient water supply to the hydrants based on the total gross area of the structure. Properties within 200 feet of a hazardous pipeline may also require additional review.

WUI code would add language such as: Properties in Wildland-Urban Interface areas may require review for above standards plus building and defensible space standards.

# Benefit-Cost Ratio

National analysis based on:

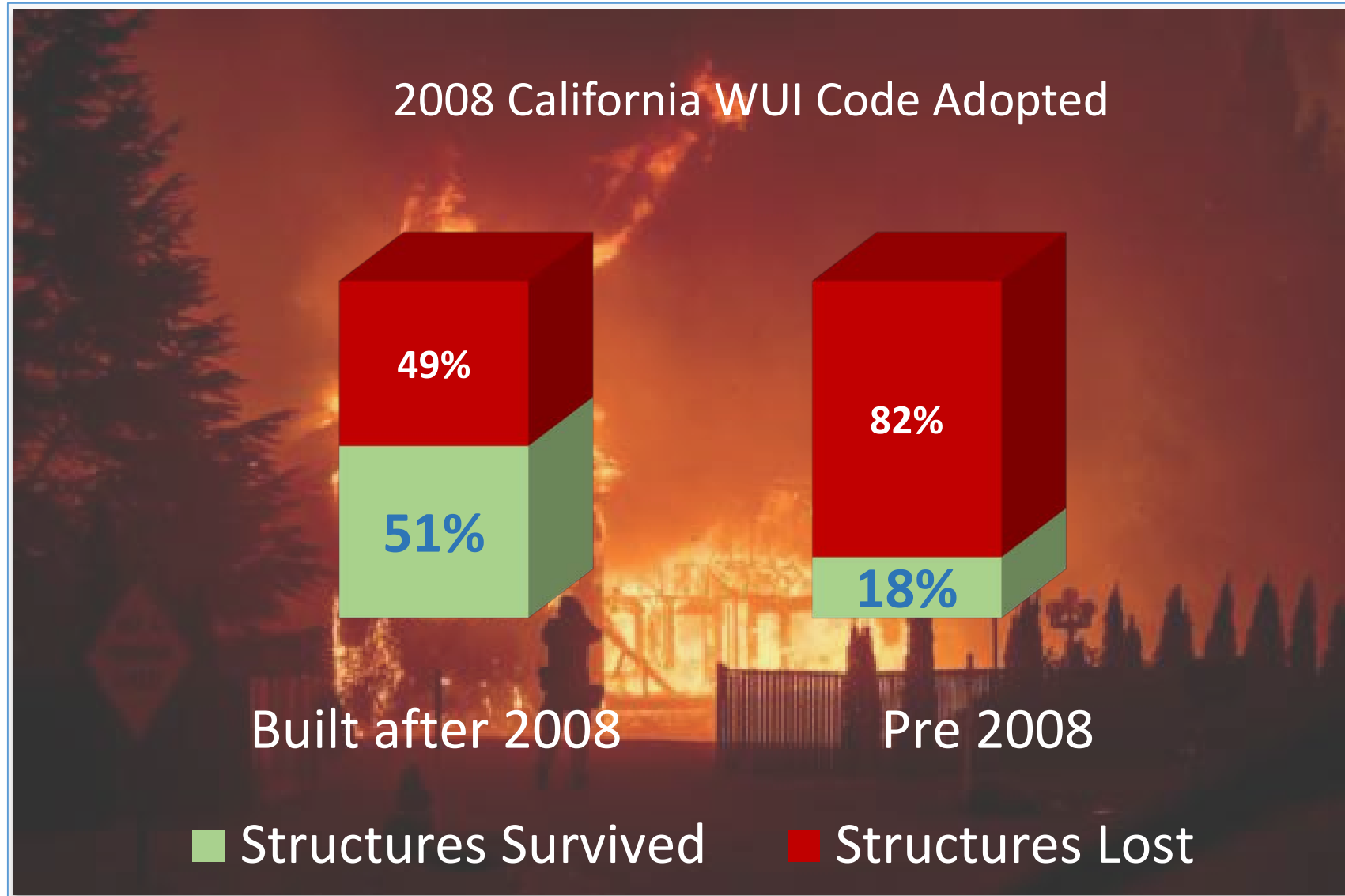
- federal grant funded projects
- building to full suite of codes including the WUI code

National Benefit-Cost Ratio Per Peril <small>*BCR numbers in this study have been rounded</small>		Federally Funded	Beyond Code Requirements
Overall Hazard Benefit-Cost Ratio		6:1	4:1
 Riverine Flood		7:1	5:1
 Hurricane Surge		Too few grants	7:1
 Wind		5:1	5:1
 Earthquake		3:1	4:1
 Wildland-Urban Interface Fire		3:1	4:1

Natural Hazard Mitigation Saves: 2017 Interim Report, prepared by National Institute of Building Sciences, Multi-hazard Mitigation Council, December 2017



# Lesson from the California Camp Fire



# Wildland-Urban Interface Code

Public Safety Commission

June 3, 2019

