

## EAST <br> Incident Decision

## Published

06/26/19 18:28

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## 1. Decision

### 1.1. Decision Summary

Decision Information

| NAME | VALUE |
| :--- | :--- |
| Published | $06 / 26 / 2019$ 18:28 CDT |
| Estimated Cost | $\$ 2,500,000$ |
| Incident Owner(s) | Christopher Mallek, Frank Aebly, Joseph Rodriguez, Michael Beasley, Angela Chongpinitchai |
| Editor(s) |  |
| Reviewer(s) |  |
| Approver(s) | Frank Aebly |
| Natl Preparedness Level 2 |  |

Decision History
$\left.\begin{array}{|llll|}\hline \text { Editor Name } & \text { Action } & \text { Date (CDT) } & \text { Comment } \\ \text { Aebly, Frank } & \text { Published } & 06 / 26 / 2019 \text { 18:28 } & \\ \text { Aebly, Frank } & \text { Approved } & 06 / 26 / 2019 \text { 18:28 } & \\ \text { Aebly, Frank } & \begin{array}{l}\text { Review } \\ \text { Requested }\end{array} & 06 / 26 / 2019 & 18: 26\end{array}\right]$

### 1.2. Incident Information

## Incident Information

| NAME | VALUE |
| :--- | :--- |
| Incident Name | EAST |
| Unique Fire Identifier | 2019-CAMNF-000241 |
| Responsible Unit Name | Mendocino National Forest |
| FireCode | MA9X |
| P-Code |  |
| Point of Origin | $40.08413 \mathrm{~N} / 123.06382 \mathrm{~W}$ |
| Incident Size | 410 acres |
| Latest Perimeter Size | 376acres |
| Incident Cause | Unknown |
| Incident Type | Wildfire |
| Incident Discovery | $06 / 17 / 2019$ 15:40 |
| Contained |  |
| Controlled |  |
| Out | CAMNF - Mendocino National Forest |
| Jurisdictional Unit | USFS |
| Jurisdictional Agency(s) | Geographic Area (prep level) Northern California (2) |
| Owner Name(s) | Christopher Mallek, Frank Aebly, Joseph Rodriguez, Michael Beasley, Angela Chongpinitchai |



- Fire Perimeters - Planning Areas Point of Origin

Burned Area
Burned Area
Burned Area image from recon flight 06242019


Image shows minimal fire behavior in patch of high severity burn from the Yellow Fire (2008). Retardant can be seen from initial suppression activity along East Ridge. Photo was taken on June 24th. Currently, the fire is not spreading well into adjacent areas of lesser severity.

Fire Effects
Image showing surface fuels BEFORE fire entered the area
Fire Effects Before
Fire Effects Before


Fire Effects After
image showing the fire effects AFTER fire moved through the area.
Fire Effects After
Fire Effects After


Values
Values at risk, jurisdiction, and management action points
Values Map


### 1.3. Weather

Fire Weather Zone Forecast

000
FNUS56 KEKA 262123
FWFEKA
FIRE WEATHER PLANNING FORECAST FOR NORTHWEST CALIFORNIA
NATIONAL WEATHER SERVICE Eureka CA
223 PM PDT Wed Jun 262019
.DISCUSSION...Cool interior valley temperatures will occur
through Friday. The cooler temperatures will be accompanied by a relatively humid air mass as a cold upper-level storm system moves east across the region. In addition, scattered light showers will be possible over Del Norte and Humboldt Counties. Warmer and drier conditions will redevelop during the weekend into early next week.
CAZ277-271315-
W Mendocino NF/E Mendocino Unit-
223 PM PDT Wed Jun 262019
.TONIGHT...

* Sky/Weather...Mostly clear.
* Min Temperature......

Valleys/lwr slopes...40-47
Ridges/upr slopes....38-45

* Max Humidity.......

Valleys/lwr slopes...85-99 percent
Ridges/upr slopes....79-94 percent

* 20-Foot Winds...

Valleys/lwr slopes...West winds 5 to 10 mph .
Ridges/upr slopes....West winds 7 to 12 mph .

* LAL..... 1 .
* Chc of Wetting Rain... 0 percent.
.THURSDAY...
* Sky/Weather...Sunny.
* Max Temperature........

Valleys/lwr slopes...67-75
Ridges/upr slopes....56-64

* Min Humidity.......

Valleys/lwr slopes...40-50 percent
Ridges/upr slopes....48-58 percent

* 20-Foot Winds...

Valleys/lwr slopes...West winds 5 to 8 mph.
Ridges/upr slopes....West winds 5 to 9 mph .

* LAL..... 1 .
* Chc of Wetting Rain... 0 percent.
.THURSDAY NIGHT...
* Sky/Weather...Partly cloudy.
* Min Temperature.......

Valleys/lwr slopes...41-48
Ridges/upr slopes....41-47

* Max Humidity.......

Valleys/lwr slopes...82-97 percent
Ridges/upr slopes....74-89 percent

* 20-Foot Winds...

Valleys/lwr slopes...Northwest winds 5 to 8 mph .
Ridges/upr slopes....Northwest winds 5 to 10 mph .

* LAL..... 1 .
* Chc of Wetting Rain... 0 percent.
. FRIDAY...
* Sky/Weather...Sunny.
* Max Temperature........

Valleys/lwr slopes...72-80
Ridges/upr slopes....61-69

* Min Humidity.......

Valleys/lwr slopes...31-39 percent
Ridges/upr slopes....35-45 percent

* 20-Foot Winds...

Valleys/lwr slopes...Northwest winds 5 to 8 mph .
Ridges/upr slopes....Northwest winds 5 to 8 mph .

* LaL.....1.
* Chc of Wetting Rain... 0 percent.
\$
.EXtENDED FORECAST FOR DAYS 3 through 5...
...Northwest California Coast...
.SATURDAY...Mostly clear. Patchy fog. Lows in the mid 40s to lower 50s. Highs 59 to 67 . Northwest winds 5 mph .
.SUNDAY...Partly cloudy. Lows near 50. Highs 60 to 68. North
winds 5 mph .
.MONDAY...Partly cloudy. Lows near 50. Highs 60 to 68. North winds 10 mph .
.TUESDAY...Mostly clear. Lows near 50. Highs 61 to 69.
.WEDNESDAY...Mostly clear. Patchy fog after midnight. Lows 49 to 54. Highs 63 to 71 .
...Northwest California Interior...

```
.SATURDAY...Mostly clear. Lows 43 to 50. Highs 67 to 80
Northwest winds 5 mph.
.SUNDAY...Partly cloudy. Lows 45 to 53. Highs }69\mathrm{ to 82. Northwest
winds 5 mph.
.MONDAY...Mostly clear. Lows 47 to 54. Highs 70 to 83. Northwest
winds 5 mph.
.TUESDAY...Mostly clear. Lows 49 to 57. Highs 73 to 81.
.WEDNESDAY...Mostly clear. Lows 50 to 57. Highs 75 to 83
. }6\mathrm{ to 10 DAY OUTLOOK...Tuesday July 2 THROUGH Saturday July 6, 2019...
FOR NW CALIF...BELOW NORMAL TEMPERATURES AND NEAR NORMAL PRECIPITATION.
$$
visit us at www.weather.gov/eureka
```



ERC at or near average

### 1.4. Modeling

FSPro (0619_FSPro 7day 3000 fires_convert_gs1 - Started on 06-20-2019)
FSPro General Information
NAME VALUE
Analysis Name 0619_FSPro 7day 3000 fires_convert_gs1
Analysis Start 06/20/2019
Duration 7 days
Simulations 3000 fires

| Time (CDT) | User | Note |
| :--- | :--- | :--- |
| $06 / 21 / 2019$ | Beasley, | I replaced gs1 with sb2 to reflect primary carrier of the fire being in dead and down. Fire is burning |
| $19: 40$ | Michael | in high severity patch from 2008 Yellow Fire. |

FSPro Analysis '0619 FSPro 7day 3000 fires convert_gs1'


7-day FSProfor June 20-26 analysis shows very low probability of fire escaping planning area. Higher likelyhood or remaining within 1,200 acre primary confinement boundary.

Near Term (0620_NTFB_YB_Finney_8hr_convert_gs1_0.04 - Started on 06/20/19 12:00 ended on 06/27/19 20:00)
Near Term Fire Behavior Analysis Information
NAME VALUE

Analysis Name 0620_NTFB_YB_Finney_8hr_convert_gs1_0.04

Burn Periods

| Date | Start Hour | End Hour | Acres |
| :--- | ---: | ---: | ---: |
| $06 / 20 / 2019$ | 12 | 20 | 96.2 |
| $06 / 21 / 2019$ | 12 | 20 | 85.6 |
| $06 / 22 / 2019$ | 12 | 20 | 146.9 |
| $06 / 23 / 2019$ | 12 | 20 | 112.2 |
| $06 / 24 / 2019$ | 12 | 20 | 126.2 |
| $06 / 25 / 2019$ | 12 | 20 | 126 |
| $06 / 26 / 2019$ | 12 | 20 | 145.6 |
| $06 / 27 / 2019$ | 12 | 20 | 170.2 |


| Time (CDT) | User | Note |
| :--- | :--- | :--- |
| $06 / 21 / 2019$ | $21: 40$ | Beasley, Michael | Seems to fit best, giving crews time to complete west indirect line

Near Term Analysis '0620 NTFB YB Finney 8hr convert_gs1 0.04'


8-day Near-Term Analysis for June 20-27 shows low likelihood of fire reaching Haynes Delight Trail. Fire is exiting area of ample available fuels (high severity from '08) under cooler, moist conditions. Much of active perimeter may self-extinguish in the short-term, since surface fuels are sparse and live fuel moisture is high $\mathrm{w} /$ better shading in areas of lower severity.

### 1.5. Risk

Relative Risk

| NAME | VALUE |
| :--- | :--- |
| Relative Risk Moderate |  |
| Duration | High |
| Saved By | Rodriguez, Joseph |
| Completed | $06 / 26 / 2019$ 11:41 CDT |

## Relative Risk Notes

Significant decrease in fire behavior from moderating weather and other minor changes to relative risk rating. Overall, rating remains moderate.

## Values Notes

NATURAL/CULTURAL: Nearby values include anadromous fish (steelhead) habitat, trail system, landscape recovery from 2008 Yellow Fire. Threats from fire to these values can be mitigated. Nearest structures are more than 5 miles away (Vann Cabin, Hoaxie Crossing, Indian Dick). Nearest occupied residence is more than 15 miles away. Community of Covelo is 23 mi SSW of incidents. NSO Activity centers are located within the planning area, but it is currently unknown if they have been active since they burned in the 2008 Yellow Fire. PROXIMITY/THREAT: Fire located where it is highly unlikely that it would reach structures, residences, or major infrastructure. SOCIAL/ECONOMIC: Potential impact to nearby trails (Haynes Delight, Buck Ridge, Wrights Ridge). Local support for the use of wildland fire and its ecological role of fire is uncertain. Incident is approximately 3.5 mi from nearest Mendocino NF boundary (Shasta-Trinity NF), over 5 mi . to nearest non-FS jurisdiction. Fires burning in Class 1 airshed. Potential air quality impacts for North Coast Unified and Mendocino Air Quality Management Districts.

## Hazards Notes

FUEL CONDITION: Fire burning in areas of grass, brush, and fire-killed timber, as well as areas of relatively open pine forest. Fuels relatively continuous. Significant moisture in live fuels. FIRE BEHAVIOR: Fire activity is currently limited to high severity sections of 2008 Yellow Fire, as season progresses adjacent fuels will be more available to burning. FIRE GROWTH: Moderate potential for fire growth. Control efforts to-date have been successful. Given the seasonality, potential for growth will persist.

## Probability Notes

TIME OF SEASON: In the first third of the historic fire season. BARRIERS: Few barriers in the area. Eel River has significant water. Nearby fire footprints have sufficient regrowth to support fire spread. SEASONAL SEVERITY: ERC at Mendocino Pass and Yolla Bolla RAWS are average for the time of year. National PL = 2, Geographic Area PL = 2. Relatively cool, wet spring. 7-day significant fire potential for the Predictive Services Area is lowering.

Relative Risk Chart



Organization Assessment

| NAME | VALUE |
| :--- | :--- |
| Unit Recommended Org Type 3 |  |
| Saved By | Beasley, Michael |
| Completed | $06 / 26 / 2019$ |

## Organization Assessment Notes

Type 3 organization remains relevant to the East Fire due to logistical concerns of managing a wildfire in remote wilderness.

## Relative Risk Notes

Significant decrease in fire behavior from moderating weather and other minor changes to relative risk rating. Overall, rating remains moderate.

## Implementation Difficulty Notes

INCIDENT STRATEGIES: Mix of air and ground resources. Haynes fire is at $100 \%$ containment, and the East Fire utilizes an indirect suppression strategy. Advisories to be posted at relevant trailheads, but no trail closures planned. Firefighter exposure to snags being
mitigated by locating confinement lines to areas with few or no snags. FUNCTIONAL CONCERNS: Safety hazards have been identified and mitigated (snags, aviation). Existing management organization is adequate. Resources readily available.

## Socio/Political Concerns Notes

OBJECTIVE CONCERNS: Low. Objectives are conventional, straightforward to communicate, and easily implementable. EXTERNAL INFLUENCES: Moderate. Several press releases has been made. Media and social media interest has been continuous but confined to the local area. Current air quality issues are minimal, but Fire Management is in communication with North Coast Unified and Mendocino Air Quality Management Districts. OWNERSHIP CONCERNS: Very low. Fire burning well within single jurisdiction and expected to remain within that jurisdiction for duration of incident.

Organization Assessment Chart


Unit Recommended Org:Type 3


Socio/Political Concerns


Planning Area Values Inventory Generated at 06/24/2019 21:16
NAME

## VALUE

Planning Area Name 06/26/2019 18:28
Incident Name EAST
Planning Area Size 21,500 acres

| Category | Value | Data Source | Currency | Coverage |
| :--- | :--- | :--- | :--- | :--- |
| BLM Admin Boundaries: Arcata | 21,499 | BLM National Operations Center (NOC) | 03/11/2018 | CONUS, AK |
| Building Clusters: Trinity, CA | 0 | US Counties / FGDC Cadastral <br> Subcomm. |  | Available counties |
| CAMNF - Resources / NSO Pts | 4 | CAMNF |  | Unit |
| Covelo | 21,499 | NPS Air Resources Division | Various | National |
| Class 1 Airsheds | acres | US Census Bureau, TIGER/Line | 2018 | National |
| County: Trinity, CA | 21,499 | acres |  |  |
| Est Ground Evac Time: 1-2 Hrs | 15 acres | National Park Service NIFC | $11 / 01 / 2012$ | CONUS |


| Category | Value | Data Source | Currency | Coverage |
| :--- | :--- | :--- | :--- | :--- |
| Est Ground Evac Time: 2-4 Hrs | 17,715 | National Park Service NIFC | $11 / 01 / 2012$ | CONUS |
|  | acres |  |  |  |
| Est Ground Evac Time: 4-6 Hrs | 3,769 acres | National Park Service NIFC | $11 / 01 / 2012$ | CONUS |
| Habitat: Steelhead | 59.0 miles | US Fish and Wildlife Service | $02 / 05 / 19$ | National |
| Jurisdictional Agency: USFS | 21,499 | Various | $05 / 29 / 2015$ | National |
|  | acres |  |  |  |
| Other Areas: Eel, California | 495 acres | USGS PADUS 1.4 | $03 / 13 / 2019$ | National |
| Responsible Agency: USFS | 21,499 | Various | $07 / 2015$ | AK, CA, ID, MT, |
|  | acres |  | NM, MN |  |
| USFS Admin Boundaries: Mendocino | 21,499 | USFS | $02 / 11 / 2019$ | National |
| National Forest | acres |  | $01 / 31 / 19$ | National |
| Wilderness: Yolla Bolly-Middle Eel | 21,499 | Wilderness.net |  |  |
| Wilderness | acres |  |  |  |

## Coverage of Values Queried that Produced No Results

BIA Admin Boundaries (National), BLM Buildings (BLM Lands), BLM Horse and Burro (National), BLM Oil / Gas Leases (National), BLM Range Allotments (National), Campgrounds (National (BLM and USFS only)), Communication Towers (National), Electric Power Plants (National), Electric Sub Stations (National), Electric Transmission Lines (National), IRA (National), Mines (National), NPS Admin Boundaries (National), NPS Buildings (All NPS), NRA (National), Natl Historic Trails (National), Natl Recreation Trails (National), Natl Scenic Byways (National), Natl Scenic Trails (National), Oil and Gas Pipelines (National), Ozone Non-Attainment (National), Particulates Non-Attainment (National), Roads (National), Sage Grouse Habitat (National), TNC Lands (National), USFS Buildings (National), USFWS Admin Boundaries (National), USFWS Trails (National), WSA (National)

### 1.6. Objectives

Incident FMU/Strategic Objective Code List

| Unit | FMU/Strat Obj Code | Acres |
| :--- | :--- | :--- |
| CAMNF | WLD - Wilderness | 21,499 |

Spatial Fire Planning Inventory

| Category | Value | Data Source | Currency | Coverage |
| :--- | :--- | :--- | :--- | :--- |
| Mgmt Req: GEN | 21,499 acres | CAMNF | Current | Unit Level |
| Mgmt Req: WLD | 21,499 acres | CAMNF | Current | Unit Level |
| Mgmt Req: WSR | 398 acres | CAMNF | Current | Unit Level |
| Retardant Avoidance | 4,664 acres | USFS Enterprise Data Warehouse | $04 / 01 / 2018$ | National (USFS Units <br> only) |

Incident Objective List

## Activated Incident Objective

06/20/2019 Tribal and Cultural Resources

- Minimize fire impacts to protect historic and prehistoric aspects of Fluornoy Cabin.

06/26/2019
Understand the role of fire on the landscape in order to integrate fire, as a critical natural process, into land and resource management plans, and develop achievable and sustainable Land and Resorce Management Plan (LRMP) objectives that provide for landscapes which are resilient to fire related disturbances and climate change. FSM 5140.2

06/20/2019

## Natural Resource Protection

- Minimize high-severity fire effects, ground disturbance, and retardant application in areas immediately upslope of the Middle Fork Eel River to protect anadromous fish (steelhead) habitat.
- Firing operations are to utilize firing tactics that favor low-moderate severity fire effects in forest and woodland vegetation.
- Utilize READ to ensure that tactics are in alignment with Wilderness management guidance in the LRMP.
- Utilize minimum impact suppression tactics (MIST).

06/20/2019

## Smoke Management

- Coordinate with North Coast Unified Air Quality Management District and Mendocino Air Quality Management District including considerations for deployment of smoke monitors.
- Participate in daily 1300 smoake management calls.

06/20/2019

## Relationships and Information

- Implement a communication strategy to inform public, cooperators, and key stakeholders on current fire status and planned actions.

06/20/2019
Haynes Fire Only

- Suppress Haynes Fire at the smallest practical size, utilizing minimum impact suppression tactics that minimize firefighter exposure and have a high probability of success.
06/26/2019
Reduce, to an acceptable level, the risks and consequences of wildfire within wilderness or escaping from wilderness. FSM 2324.21


## Incident Requirement List

## Activated Incident Requirement

06/26/2019 Conduct all fire management activities within wilderness in a manner compatible with overall wilderness management objectives. Give preference to using methods and equipment that cause the least:

1. Alteration of the wilderness landscape.
2. Disturbance of the land surface.
3. Disturbance to visitor solitude.
4. Reduction of visibility during periods of visitor use.
5. Adverse effect on other air quality related values.

## Activated Incident Requirement

Locate fire camps, helispots, and other temporary facilities or improvements outside of the wilderness boundary whenever feasible. Rehabilitate disturbed areas within wilderness to as natural an appearance as possible. FSM 2324.23

06/26/2019 Participate in daily one o'clock statewide AQ coordination call when fire is active. Advise AQ regulators on degree of activity, fuels involved and estimated daily acres burned.

Strategic Objective List

| Unit | Shape/ <br> FMU | Activated | Strategic Objective |
| :--- | :--- | :--- | :--- | | CAMNF | WLD | $04 / 05 / 2018$ |
| :--- | :--- | :--- |
|  | Permit Lightning fires to play, as nearly as possible their natural and ecological role within the <br> wilderness, to reduce unnatural accumulations of fuels. While reducing to an acceptable level, <br> the risks and consequences of wildfire within wilderness or escaping from wilderness. LRMP <br> IV-72 RX-9, FSM 2324.21 |  |

Management Requirement List

| Unit | Shape/FMU | Activated | Management Requirement |
| :---: | :---: | :---: | :---: |
|  | Retardant Avoidance | 05/31/2012 | The aerial application of fire retardant is allowed for fighting fires. Aerially delivered fire retardant should not be applied to any mapped terrestrial avoidance area, waterway or buffer. The only exception to using aerially applied fire retardant in avoidance areas is for the protection of human life or public safety. The Incident Commander is the decision maker. |
|  |  |  | Information concerning the Record of Decision for the Aerial Application of Fire Retardant is available at https://www.fs.fed.us/fire/retardant/index.html |
| CAMNF | GEN | 04/05/2018 | Cultural Resources: Utilize technical specialists to identify archaeological sites and recommend appropriate protection prior to engagement, and in the planning process. Use local agency cultural specialists and local tribal cultural specialists when possible. FSM 2360, National Historic Preservation Act Sec. 106 |
| CAMNF | GEN | 04/05/2018 | Minimize disturbance of riparian ground cover and vegetation. Locate and manage water drafting sites so as to minimize adverse effects. Locate incident bases, camps, staging areas, and other incident facilities outside riparian reserves. If the only suitable location for such facilities is within a riparian reserve, a resource advisor will determine the location, use conditions and rehabilitation requirements. LRMP Chapter IV Page 20-21 |
| CAMNF | GEN | 04/05/2018 | Aerial retardant drops are not allowed in mapped avoidance areas. This national direction is mandatory and would be implemented except in cases where human life or public safety is threatened and retardant use within avoidance areas could be reasonably expected to alleviate that threat. The Forest Service will report to FWS and NOAA fisheries (as appropriate) all misapplications of aerially applied fire retardant (on National Forest system lands). Nationwide Aerial Application of Fire Retardant on National Forest System Land; Record of Decision; December 2011; page 2-4 |
| CAMNF | WLD | 04/05/2018 | Fire will be restored to the ecosystem to meet LRMP resource objectives through the selection of the appropriate management response to wildland fire occurrence. The use of planned and unplanned ignitions will be considered. The use of natural barriers, topography, or watercourses, and low impact techniques will be favored. Avoid the use of chemical retardants in the Wilderness whenever possible. Where possible, locate helispots, staging areas, and spike camps outside the Wilderness or so as to have the least impact to Wilderness values. LRMP Chapter IV Page 72 |
| CAMNF | WLD | 04/05/2018 | Conduct all fire management activities within wilderness in a manner compatible with overall wilderness management objectives. Give preference to using methods and equipment that cause the least alteration of the wilderness landscape, disturbance of the land surface, and adverse effects on air quality including visibility. FSM 2324.23 |
| CAMNF | WLD | 04/05/2018 | Utilize minimum impact suppresion methods in accordance with guidelines for reducing risks of large-scale disturbances withing the LSR. Provide protection and promote connectivity with adjoining LSR's and wilderness. Consult with resource specialists, to assure that habitat damage is minimized. LRMP IV-66 RX-6, Buttermilk LSR current conditions report. |
| CAMNF | WSR | 04/05/2018 | Conduct fire management activities so as to minimize landscape alteration and land disturbance, but otherwise manage fire in a manner compatible with adjacent National Forest System lands. LRMP Chapter IV Page 76. FSM 2354.42n |

### 1.7. Course of Action

## Course of Action

| Active | InactiveAction Item <br> $06 / 26 / 2019$ |
| :--- | :--- |
| $06 / 26 / 2019$ | Utilize pack animals in lieu of the helicopter for crew resupply and support at spike camp. <br> Open existing roads including the M1 Rd. up through the "Whales Tail" and the road to Hopkins Camp for <br> easier access to trailheads leading into the East Fire. Open up trail access from the Whales Tail to the fire to <br> allow local patrol of the fire. |
| $06 / 26 / 2019$ | Construct control line on East Ridge between Buck Ridge and the Middle Fork of the Eel River to prevent fire <br> spread into the Schoolmarm Creek drainage. |
| $06 / 26 / 2019$ | Open up the Buck Ridge Trail between East Ridge and the Haynes Delight Trail to confine the East Fire and <br> prevent spread to the north. |
| $06 / 26 / 2019$ | Evaluate the Middle Fork of the Eel River for the purpose of confining the East Fire north of the river. |
| $06 / 26 / 2019$ | Open the Haynes Delight Trail from Buck Ridge to the Middle Fork of the Eel River, or consider the no- <br> named ridge just east of the Haynes Delight Trail to confine westerly spread of the East Fire. |
| Conduct suppression repair activities on control lines, as the active fire edge cools and lines are no longer |  |
| needed to check fire spread. |  |

M.A.P.s Image


## Management Action Point 3

| NAME | VALUE |
| :--- | :--- |
| Incident Name EAST |  |
| Cost |  |
| Shape | MAP 3 |
| Activated | $06 / 26 / 2019$ |
| Deactivated |  |
| Status | Active |

## Condition

## Description:

Slop-over / Spot Fire occurs on primary containment line on East Ridge, threatens to spread to Schoolmarm Creek.

## Value to protect:

Action associated to this MAP mobilizes modules and crews to secure slop-overs and/or spots to keep fire west of Schoolmarm Creek. If successful, this action prevents the need to prep the final planning area boundary along Long Ridge.

## Actions

## Location of Actions:

Extend primary handline along East Ridge to encompass slopovers and surround spot fires.

## Associated Actions:

Utilize Type 2 helicopter bucket work to hold fire spread. Consider Blevet support to mop up spot fires.

## Resources

TBD by Incident Commander

## Management Action Point 4

| NAME | VALUE |
| :--- | :--- |
| Incident Name EAST |  |
| Cost |  |
| Shape | MAP 4 |
| Activated | $06 / 26 / 2019$ |
| Deactivated |  |
| Status | Active |

## Condition

## Description:

Fire crosses to the north of Schoolmarm and/or Uhl Creek and slop-over cannot be contained.
Value to protect:
Action associated to this MAP requires the installation of handline along areas of planned contingency and emergency containment lines, and threaten to exceed the planning area. MNF boundaries with the SRF and SHF would be threatened.

## Actions

## Location of Actions:

Extend primary handline from East Ridge to Buck Ridge, then North to Dead Puppy Ridge. From here, construct handline along the Long Ridge Trail to Windy Mountain. Notify SRF and SHF Duty Officers.

## Associated Actions:

Utilize Type 2 helicopter bucket work to hold fire spread. If applicable, consider the construction of containment lines down Schoolmarm Ridge or South Mickey Ridge to the River.

## Resources

TBD by Incident Commander

## Management Action Point 5

| NAME | VALUE |
| :--- | :--- |
| Incident Name EAST |  |
| Cost |  |
| Shape | MAP 5 |
| Activated | $06 / 26 / 2019$ |
| Deactivated |  |
| Status | Active |

## Condition

## Description:

Fire crosses Buck Ridge Trail moving West. Fire Crosses Wrights Valley Trail moving South.

## Value to protect:

Action associated to this MAP prevents the fire from exceeding the planning area, which would threaten private lands.

## Actions

Location of Actions: to the south, Install handline / trail improvement along Wrights Ridge to the Middle Fork Eel River. To the west, utilize the Yellow Fire footprint along the North Fork of Middle Fork Eel to install control lines.

## Associated Actions:

Utilize Type 2 helicopter bucket work to hold fire spread.
If MAP 5 is activated, consider opening 11W05 trail.
Consider utilizing interior ridges for northern containment lines between Buck Ridge and the North Fork of Middle Fork Eel.

## Resources

TBD by Incident Commander

## Management Action Point 6

| NAME | VALUE |
| :--- | :--- |
| Incident Name EAST |  |
| Cost |  |
| Shape | MAP 6 |
| Activated | $06 / 26 / 2019$ |
| Deactivated |  |
| Status | Active |

## Condition

## Description:

Fire moves south, crossing the Middle Fork Eel River between Wrights Valley Trail and Uhl Creek.
Value to protect: Action associated to this MAP prevents fire from exceeding the planning area

## Actions

Location of Actions: Construct handline from the Middle Fork Eel along Wrights Valley Trail to Wrights Ridge. Continue containment line along the planning area boundary along Wrights Ridge Trail to Windy Mountain.

## Associated Actions:

Consider Type 2 helicopter bucket work where needed to hold fire spread. Consider ridges interior to the planning area to place containment lines.

If MAP 6 is activated, consider all natural barriers in the area to install containment lines.

## Resources

TBD by Incident Commander

## Management Action Point 7

| NAME | VALUE |
| :--- | :--- |
| Incident Name EAST |  |
| Cost |  |
| Shape | MAP 1a |
| Activated | $06 / 26 / 2019$ |
| Deactivated |  |
| Status | Active |

## Condition

## *** FORMERLY MAP 1 - IDENTIFIED AS MAP 1 IN STRATEGIC OPERATIONS PLAN ***

## Description:

Fire crosses the Haynes Delight Trail to the west of the current fire perimeter and can't be contained.
Value to protect: Action associated to this MAP prevents the fire from moving west beyond the primary containment line which limits fire size, associated smoke, exposure, and duration of the incident. Further, this action prevents the need to prep the final planning area boundary.

## Actions

Location of Actions: Construct contingency line along the Buck Ridge trail, extending previously constructed primary line on Buck Ridge south to the Wrights Valley Trail intersection. Continue handline to the Middle Fork Eel River.

## Associated Actions:

Utilize Type 2 helicopter bucket work to hold fire spread in the drainage bottom. Consider extending handline along the Wrights Valley Trail from the River to the planning area boundary. As well, consider extending handline along the Haynes Delight Trail from the river to the planning area boundary.

## Resources

TBD by Incident Commander

Management Action Points
Management Action Points


Primary Alternate Contingency Escape (P.A.C.E.) Map
PACE Map


PACE Map referenced in Rational Section of this Decision and used to derive MAPs

### 1.8. Cost

Estimated Final Cost

| NAME $\quad$ VALUE |
| :--- |
| Estimated Final Cost $\$ 2,500,000$ |
| Method(s) Used Other |

## Comments

Estimate is based on aviation costs and incident duration associated with wildfire in a remote wilderness setting.

## Stratified Cost Index Results

| Acres <br> Burned | $25 \%$ | $50 \%$ | $75 \%$ | $90 \%$ |
| ---: | :--- | :--- | :--- | :--- |
| $\mathbf{4 1 0}$ | $\$ 164$ | $\$ 539$ | $\$ 1,777$ | $\$ 5,202$ |
| $\mathbf{8 2 0}$ | $\$ 136$ | $\$ 447$ | $\$ 1,473$ | $\$ 4,311$ |
| $\mathbf{1 2 3 0}$ | $\$ 122$ | $\$ 400$ | $\$ 1,319$ | $\$ 3,862$ |
| $\mathbf{2 0 5 0}$ | $\$ 106$ | $\$ 349$ | $\$ 1,149$ | $\$ 3,363$ |

25 percent of historical fires with similar characteristics had a cost per acre less than the value displayed in the $25 \%$ column of the table. Likewise, 50, 75 , and 90 percent of fires with similar characteristics had a cost per acre less than the values displayed in their respective columns.

Stratified Cost Index Parameters

| NAME | VALUE |
| :--- | :--- |
| SCI Name | System Generated |
| Editor | system |
| SCI Model | USFS Western Model |
| Latitude | 40.0841 N |
| Longitude | 123.0638 W |
| Ignition Date | $06 / 17 / 2019$ |
| Fuel Model | F or Q (Brush) |
| Aspect | Southwest |
| Slope | $38 \%$ |
| ERC Station Name | $41018-$ MENDOCINO PASS |
| ERC Percentile | 67 |
| USFS Region | 5 |
| Housing Value | $\$ 41,735,500$ |
| Distance out to Wilderness Boundary 3.3 miles |  |
| Elevation | 1706 meters |
| Distance to Nearest Town | 20.9 miles |

### 1.9. Rationale

10 Question Rationale
Risk Assessment
I. What are the critical values at risk?

The critical values at risk include Wilderness, Class 1 Air shed, Anadromous habitat (steelhead), heritage resources, trail systems, Northern Spotted Owl (NSO) activity centers (although it is unknown if they have been active since the 2008 Yellow fire). We continue to emphasize keeping the fire in the primary confinement lines within the planning area as the values at risk and values to be protected become more apparent if the fire were to expand outside of the designated area.
2. What is the chance the critical values will be impacted, and if so what are the consequences?

Wilderness values would be impacted by management activities, including ground disturbance and aircraft intrusions. Minimum impact techniques are being used and two Wilderness Resource Advisors have been assigned to develop a repair plan to restore trammeled activity as much as possible. This will preserve the Yolla Bolly Wilderness characteristics. Visitors along the trail system may notice stumps and line scrapes although these will be hidden as much as possible. Visitors may hear or observe aviation activity supporting the resources on the fires degrading primitive solitude. Introduction of aquatic or terrestrial invasive species would be detrimental to the wilderness character as well.
High burn severity could cause accelerated erosion and loss of shading, adversely impacting steelhead habitat. The NSO activity centers were burned in the 2008 Yellow fire. It is unknown if they are being utilized. Heritage resources may be impacted by ground disturbance associated with management actions. A Heritage Resource Advisors have been assigned to minimize this risk. If heritage sites are impacted, required reporting and evaluations would need to be completed.
3. What are the opportunities to manage the fire to meet land management plan objectives?

The East fire is being managed to meat LRMP objectives of reducing fuel loads and restoring fire to the ecosystem. However, the need to introduce fire into the ecosystem and reduce fuel loading must be balanced by the risk of firefighter exposure and the expected need for resources in the near future. Given the extreme fire activity of the past several summers and currently in the early part of the fire year it is expected that resources will be needed nationally in the following months and will become unavailable to manage these fires in the remote wilderness. There is a high probability of success to manage the East fire within the Primary confinement area. Managing the fire within the larger Alternate confinement area could extend the fire duration into warmer, drier months, making it more difficult to prevent it from escaping the wilderness and increasing firefighter exposure to hazards.
The Haynes fire is being suppressed at the smallest size possible. The decision to suppress the Haynes fire was made upon the recommendation of fire staff. They determined that its location and potential for rapid fire spread lowered the probability of managing it successfully with a confinement strategy.
4. What are the possible low probability/high consequence events?

If the East fire burns past the Primary or Alternate confinement lines and spreads outside the wilderness, the values at risk and values to be protected become more numerous and closer to the fire area. The use of natural barriers becomes less likely.
The inaccessible nature of the fire area could delay timely medical response if needed. Being in the early part of the summer season the fire effects may be undesirable as we move forward into
mid-summer.
5. Who are the stakeholders that should be consulted prior to making a decision?

Shasta Trinity and Six Rivers National Forests, North Coast Unified Air Quality Management District, and Northern California Geographic Area Coordination Center.

## Risk Decision

1. What alternatives (objectives, strategies and tactics) are being considered?

Forest Service manual 2324.21 sets forth the objective of letting fire play, as nearly as possible, its natural role in the Wilderness. The strategy to achieve this for the East fire is to manage the fire for multiple objectives within an approximate 1,200-acre Primary confinement area. The desired end state is improved forest health, decreased exposure and risk to fire personnel and reduced potential for a high severity wildfire in this area in the future. A combination of hand line and natural barriers are being used to construct the Primary confinement area. Minimum impact suppression techniques are being used. The strategy for the Haynes fire is to suppress and contain it as small as possible. For both fires, chainsaws and helicopter support have been authorized, however traditional pack string support will be brought in to minimize the use of helicopters and reduce intrusions. One objective of the incident is to switch to pack string support completely, but the trails need to be inspected and improved to facilitate this. The number and age of the snags in the fire area makes the use of cross-cut only methods too hazardous.
Other alternatives considered include: 1. Manage the East fire with the Alternate confinement area as the Primary area. This option was rejected due to the early seasonality of the fire and firefighter safety in the snag patches within the 2008 Yellow fire 2. Managing the East fire in the Contingency confinement area was rejected as well due to early seasonality, fire effects, and air quality 3. Managing the Haynes fire did not have any alternatives identified as the purpose was full suppression with an end state keeping the fire as small as possible.
2. What is the exposure to responders for the alternatives being considered?

Consider number of resources, time of exposure, and length of incident. Exposure to firefighter in all alternatives includes snags, steep terrain, heat, and high risk exposure in aviation operations. All of these increase with the size and duration of the fire. To minimize these risks the decision was made to manage the East fire within the 1,200 acre primary confinement area and to suppress the Haynes fire as small as possible.
3. What is the relative probability of success associated with the alternatives being considered?

The current course of action has the highest probability of success given the location of the fires and the seasonality. Full suppression on both fires has a high probability of success. Managing both fires for multiple objectives has a low probability of success given the seasonality and expected future resource availability. Managing the East fire within a larger confinement area (Alternate or Contingency) has a moderate probability of success, specifically if the weather conditions changed to be more conducive to allow fire behavior to remain at low to moderate.
4. What alternative provides for the best balance between the desired outcome and exposure to Responders?
The current course of action, managing the East fire within the Primary confinement area and suppressing the Haynes fire as small as possible, allows us to restore fire to its natural role in a manageable area, minimizing firefighter exposure. The other alternatives
would increase exposure and risk or would not meet management objectives.
5. What are the critical thresholds that will trigger reconsideration of the proposed alternative and
how will they be monitored?
Management action points (MAPs) have been developed within the current course of action to specify responses if the fire spreads beyond the Primary confinement area. With the trigger of each MAP, strategies and tactics will be reviewed and discussed. A new decision on objectives and course of action will be needed if fire spreads beyond the planning area.

