

WFDSS NextGen

Focus Group Session 6 –
Relative Risk (RR) & Organization
Assessment (OA)

WFDSS Next Gen – RR & OA follow PMS 236- NWCG Wildland Fire Risk and Complexity Assessment

- <https://www.nwcg.gov/sites/default/files/publications/pms236.pdf>



NWCG Wildland Fire Risk and Complexity Assessment, PMS 236

The NWCG Wildland Fire Risk and Complexity Assessment should be used to evaluate firefighter safety issues, assess risk, and identify the appropriate incident management organization. Determining incident complexity is a subjective process based on examining a combination of indicators or factors. An incident's complexity can change over time; incident managers should periodically re-evaluate incident complexity to ensure that the incident is managed properly with the right resources.

Instructions:

Incident Commanders should complete Part A and Part B and relay this information to the Agency Administrator. If the fire exceeds initial attack or will be managed to accomplish resource management objectives, Incident Commanders should also complete Part C and provide the information to the Agency Administrator.

Part A: Firefighter Safety Assessment

Evaluate the following items, mitigate as necessary, and note any concerns, mitigations, or other information.

Evaluate these items	Concerns, mitigations, notes
Lookouts, Communication, Escape Routes, and Safety Zones (LCES)	
Fire Orders and Watch Out Situations.	
Multiple operational periods have occurred without achieving initial objectives.	
Incident personnel are overextended mentally and/or physically and are affected by cumulative fatigue.	
Communication is ineffective with tactical resources and/or dispatch.	
Operations are at the limit of span of control.	
Aviation operations are complex and/or aviation oversight is lacking.	
Logistical support for the incident is inadequate or difficult.	

WFDSS Next Gen – Search for the incident. Once you hover over the name, it will turn blue to indicate it is a clickable link.

The screenshot displays the WFDSS Next Gen web application interface. At the top, there is a navigation bar with the WFDSS logo and menu items: My Home, Incidents (highlighted), Analysis, Reports, Resources, and Contact Us. On the right side of the navigation bar, there are notification and user icons, and a status indicator: GA Preparedness Level: XX | National Preparedness Level: XX.

Incidents

The main content area is split into two panels. The left panel shows a topographic map of a mountainous region. A red flame icon marks the location of 'Moose Meadows'. The map includes labels for various geographical features such as 'HOUSETOP MOUNTAIN', 'RENDZVOUS MOUNTAIN', 'TAYLOR MOUNTAIN', 'JACKSON HOLE', and 'Exhibition Pasture'. A scale of 1:144,448 is provided at the bottom left of the map.

The right panel, titled 'Results', displays search information for the incident. It states: 'Find records from IRWIN discovered within the last 6 months' and 'Search Current Map View'. The search term 'moose' is entered in the search box. A 'DOWNLOAD INCIDENT LIST' button is visible. Below this is a table with the following data:

INCIDENT NAME	LANDOWNER CATEGORY	DISCOVERED DATE/TIME	CURRENT SIZE (ACRES)
Moose Meadows	USFS	9/18/2022, 15:39	

At the bottom of the results panel, there is a pagination control showing 'Items per page: 10' and '1 - 1 of 1'.

WFDSS Next Gen – Click VIEW to access the decision process. If it is the first time an incident decision process has been entered, the user will need to INITIATE RECORD in order to proceed.

Incidents

Moose Meadows GBCC
Incident Info Fire Area Collaborators

Details

Incident Name: Moose Meadows
Discovery Date/Time: 9/18/2022, 15:39
Current Size: unknown acres
FS Job Code: P4
Fire Code: P2MB
Unique Fire ID: 2022-IDCTF-000191
Cause: Human
Dispatch Center: IDEIC - Eastern Idaho Interagency Fire Center
GACC: GBCC - Great Basin Coordination Center
Lat: 43° 33.287'
Long: -110° 55.687'
Protecting Unit at Origin: IDCTF - Caribou-Targhee National Forest
Jurisdictional Unit at Origin: IDCTF - Caribou-Targhee National Forest
Landowner Category: USFS
Collaborating Agency(s): None Added

ZOOM VIEW

WFDSS
My Home Incidents Analysis Report

FWF

INITIATE RECORD

WFDSS Next Gen – Click the Relative Risk Icon to access the relative risk inputs (located on the right-hand side)

The screenshot displays the WFDSS Next Gen interface. At the top, the navigation bar includes 'My Home', 'Incidents', 'Analysis', 'Reports', 'Resources', and 'Contact Us'. The 'Incidents' tab is active, and the incident title is 'Moose Meadows'. A red circle highlights the 'Relative Risk' icon in the top navigation bar. Below the navigation bar, a horizontal menu contains icons for 'Incident Info', 'Analysis', 'Relative Risk', 'Strategy', 'Elaborations', 'OA', 'Rationale', 'Periodic Assessment', and 'MORs'. The main content area is split into two panels. The left panel shows a topographic map of the Moose Meadows area, with a red fire icon indicating the incident location. The right panel is titled 'Relative Risk' and contains the following sections:

- Probability**
 - Time of Season
 - Seasonal Severity
 - Barriers to Fire Spread
- Hazards**
 - Fuel Conditions
 - Fire Behavior
 - Potential Fire Growth
- Values**
 - Infrastructure/ Natural/ Cultural Concerns
 - Proximity & Threat to Fire Values

At the bottom of the right panel, there is a checkbox labeled 'Mark as Complete' and two buttons: 'SAVE' and 'CANCEL'. The map scale is 1:144,448, and the map is powered by Esri.

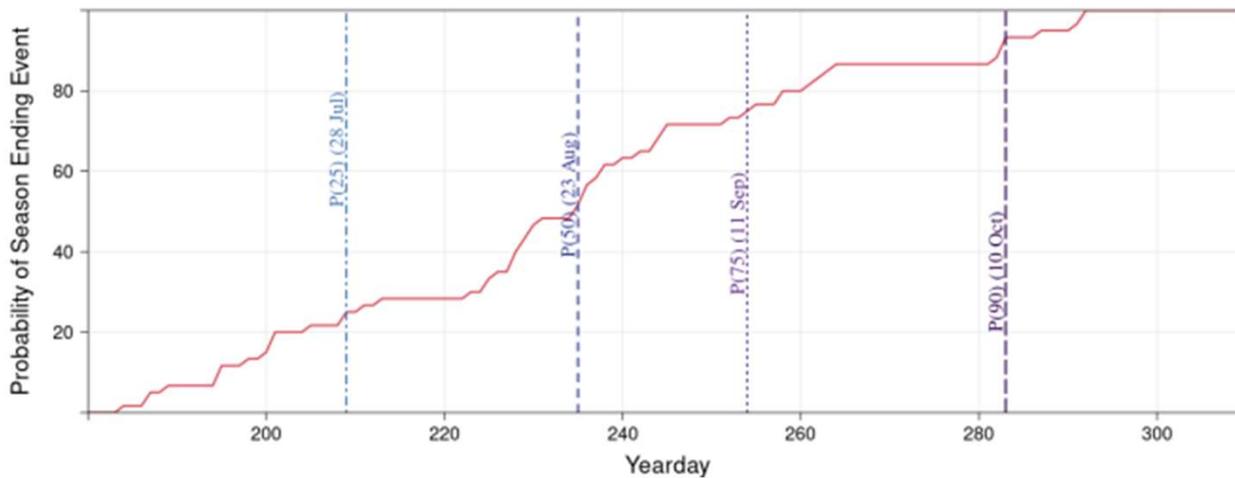
WFDSS Next Gen – The user can step through the inputs to the RR. WFDSS is working on providing onscreen help/guidance from PMS 236. The RR will start with the Probability inputs to ensure that the Time of Season, Seasonal Severity and Barriers to Fire Spread are considered for the remaining inputs.

The screenshot displays the WFDSS Next Gen web application interface. At the top, the navigation bar includes the WFDSS logo, a user profile icon, and a notification bell. The main navigation menu contains 'My Home', 'Incidents', 'Analysis', 'Reports', 'Resources', and 'Contact Us'. The current page title is 'Moose Meadows' with an 'Incident Log' link. A secondary navigation bar shows various analysis steps: Incident Info, Analysis, Relative Risk (selected), Strategy, Elaborations, OA, Rationale, Periodic Assessment, and MORs. The main content area is split into a map and a configuration panel. The map shows a topographic view of the 'Moose Meadows' area with a red fire icon. The configuration panel on the right is titled 'Relative Risk' and contains the following sections:

- Probability**
 - Time of Season**
 - Time Of Season: Early Middle Late
 - Time of Season Narrative: Testing Time of Season. WFDSS will provide a Season Ending Analysis to assist in determining the Time of Season. The analysis is currently found in the RMA dashboard. WFDSS will automatically run the analysis based on an automated fire planning area.
 - Seasonal Severity**
 - Seasonal Severity: Low / Moderate High Very High / Extreme
 - Seasonal Severity Narrative:
- Buttons: 'Mark as Complete', 'SAVE', and 'CANCEL'.

At the bottom of the map, the map scale is 1:144,448 and the map is powered by Esri. The URL at the bottom left is <https://wfdssnextgen.org/my/home>.

WFDSS Next Gen – The user will be provided links, map bookmarks or displays of pertinent information to inform the various inputs for Relative Risk and Org Assessment. Below is the Probability of Season ending event graph that currently can be calculated in the Risk Management Dashboard (RMA). WFDSS will automatically calculate the graph for the user.



GA Preparedness Level: XX | National Preparedness Level: XX

Incident Log

Rationale Periodic Assessment MORs

Relative Risk

Probability

Time of Season

Time Of Season

Early Middle Late

Time of Season Narrative

Testing Time of Season. WFDSS will provide a Season Ending Analysis to assist in determining the Time of Season. The analysis is currently found in the RMA dashboard. WFDSS will automatically run the analysis based on an automated fire planning area.

Seasonal Severity

Seasonal Severity

Low / Moderate High Very High / Extreme

Seasonal Severity Narrative

Mark as Complete

SAVE CANCEL

WFDSS Next Gen – Continuation of Probability inputs

 **WFDSS**

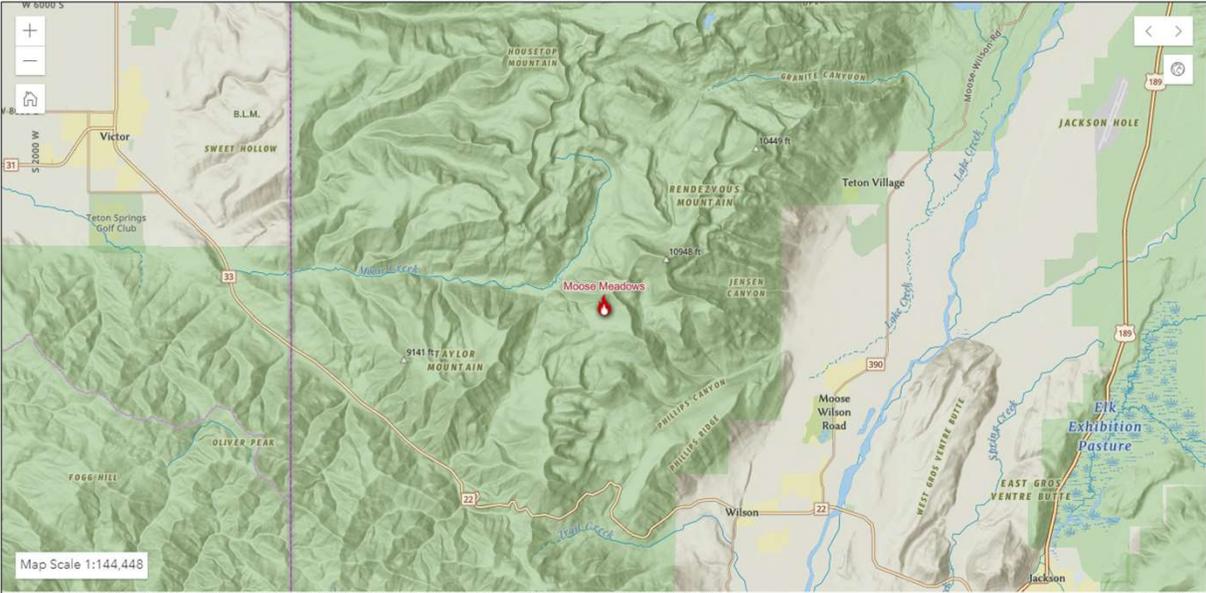
[My Home](#) [Incidents](#) [Analysis](#) [Reports](#) [Resources](#) [Contact Us](#)

GA Preparedness Level: XX | National Preparedness Level: XX

Moose Meadows

[Incident Log](#)

 Incident Info Analysis **Relative Risk** Strategy Elaborations OA Rationale Periodic Assessment MORs



Map Scale 1:144,448

Esri, NASA, NGA, USGS | Esri, HERE, Garmin, SafeGraph, GeoTechnologies, Inc. METI/NASA, USGS, Bureau of Land Management, EPA, NPS, USDA

Relative Risk

Seasonal Severity

Seasonal Severity

Low / Moderate High Very High / Extreme

Seasonal Severity Narrative

Evaluate fire danger indices and rank this element low/moderate, high, or very high/extreme. Considerations: energy release component (ERC); drought status; live and dead fuel moistures; fire danger indices; adjective fire danger rating; preparedness level.

Barriers to Fire Spread

Barriers to Fire Spread

Few Moderate Many

Barriers to Fire Spread Narrative

If many natural and/or human-made barriers are present and limiting fire spread, rank this element low. If some barriers are present and limiting fire spread, rank this element moderate. If no barriers are present, rank this element high.

Mark as Complete

SAVE CANCEL

WFDSS Next Gen – Hazard Assessment

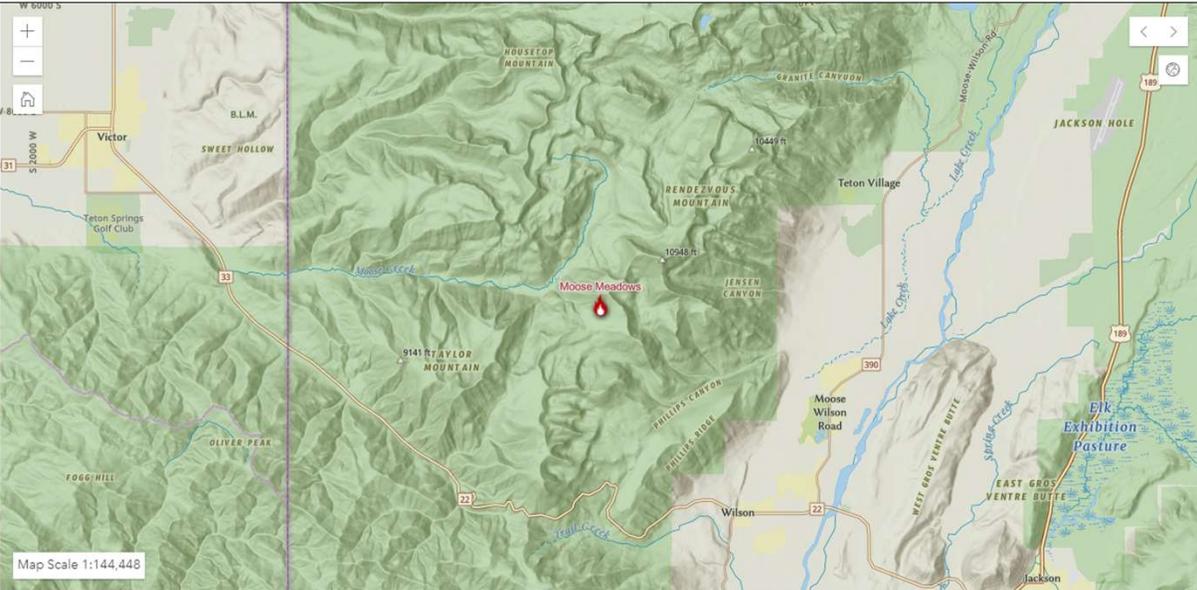
 **WFDSS**

[My Home](#) [Incidents](#) [Analysis](#) [Reports](#) [Resources](#) [Contact Us](#)

GA Preparedness Level: XX | National Preparedness Level: XX

Moose Meadows [Incident Log](#)

[Incident Info](#) [Analysis](#) [Relative Risk](#) [Strategy](#) [Elaborations](#) [OA](#) [Rationale](#) [Periodic Assessment](#) [MORs](#)



Map Scale 1:144,448

Etri, NASA, NSA, USGS | Etri, HERE, Garmin, SafeGraph, GeoTechnologies, Inc, METI/NASA, USGS, Bureau of Land Management, EPA, NPS, USDA

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Relative Risk

Hazards

Fuel Conditions

Fuel Conditions

Low Moderate High

Fuel Conditions Narrative

Consider fuel conditions ahead of the fire and rank this element low, moderate, or high. Evaluate fuel conditions that exhibit high rate of spread (ROS) and intensity for your area, such as those caused by invasive species or insect/disease outbreaks; continuity of fuels; low fuel moisture

Fire Behavior

Fire Behavior

Low Moderate High

Fire Behavior Narrative

Evaluate the current fire behavior and rank this element low, moderate, or high. Considerations: intensity; rates of spread; crowning; profuse or long-range spotting.

Mark as Complete

[SAVE](#) [CANCEL](#)

WFDSS Next Gen – Continuation of Hazard assessment and moving into Values assessment

WFDSS

My Home **Incidents** Analysis Reports Resources Contact Us

GA Preparedness Level: XX | National Preparedness Level: XX

Moose Meadows

Incident Log

Incident Info Analysis **Relative Risk** Strategy Elaborations OA Rationale Periodic Assessment MORs

Relative Risk

^ **Potential Fire Growth**

Potential Fire Growth

Low Moderate High

Potential Fire Growth Narrative

Evaluate the potential fire growth, and rank this element low, moderate, or high. Considerations: Potential exists for extreme fire behavior (fuel moisture, continuity, winds, etc.); weather forecast indicating no significant relief or worsening conditions; resistance to control.

Values

^ **Infrastructure/ Natural/ Cultural Concerns**

Natural/Cultural Resource and Infrastructure Values

Low Moderate High

Infrastructure/Natural/Cultural Concerns Narrative

Considerations: key resources potentially affected by the fire such as urban interface, structures, critical municipal watershed, commercial timber, developments, recreational facilities, power/pipelines, communication sites, highways, potential for evacuation, unique natural resources, special-designation areas, T&E species habitat, cultural sites, and wilderness.

Mark as Complete

SAVE **CANCEL**

Map Scale 1:144,448

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WFDSS Next Gen – Continuation of the Values Assessment

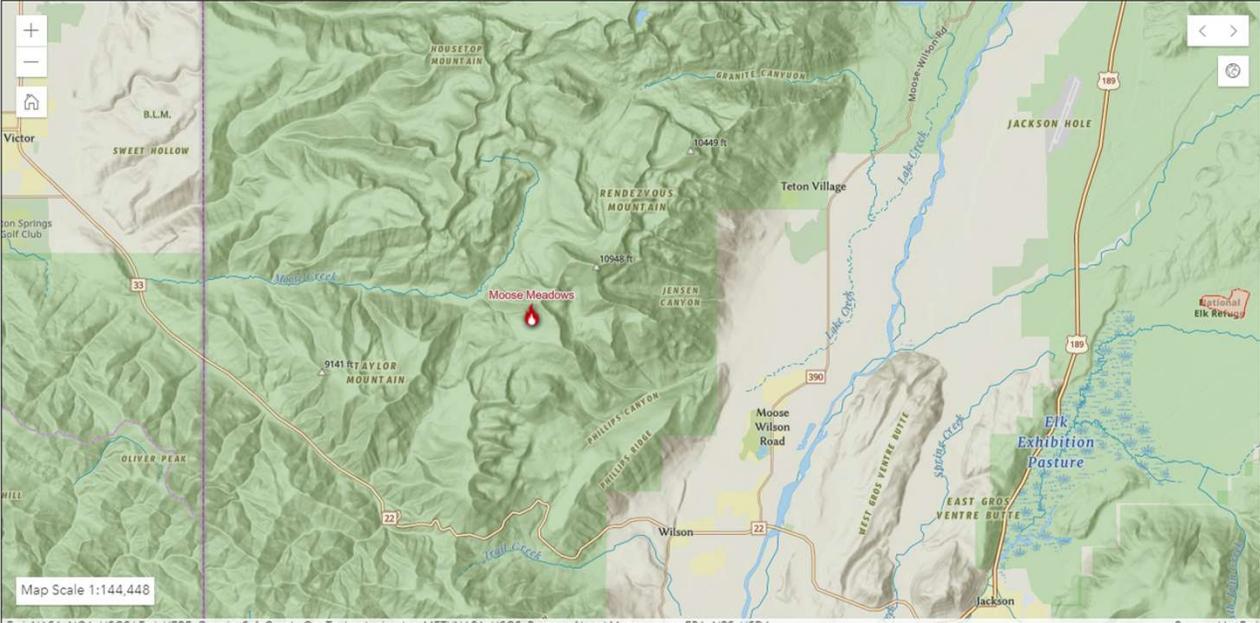
 **WFDSS** 🔔 👤

[My Home](#) | **Incidents** | [Analysis](#) | [Reports](#) | [Resources](#) | [Contact Us](#) GA Preparedness Level: XX | National Preparedness Level: XX

Moose Meadows 🔗

Incident Log

Incident Info | Analysis | **Relative Risk** | Strategy | Elaborations | OA | Rationale | Periodic Assessment | MORs



Map Scale 1:144,448

Esri, NASA, NGA, USGS | Esri, HERE, Garmin, SafeGraph, GeoTechnologies, Inc., METI/NASA, USGS, Bureau of Land Management, EPA, NPS, USDA Powered by Esri

Relative Risk

Proximity & Threat to Fire Values

Proximity and Threat of Fire to Values

Low Moderate High

Proximity and Threat of Fire to Values Narrative

Evaluate the potential threat to values based on their proximity to the fire, and rank this element low, moderate, or high.

Social/Economic Concerns

Social/Economic Concerns

Low Moderate High

Social/Economic Concerns Narrative

Evaluate the potential impacts of the fire to social and/or economic concerns, and rank this element low, moderate, or high. Considerations: impacts to social or economic concerns of an individual, business, community, or other stakeholder; other fire management jurisdictions; tribal subsistence or gathering of natural resources; air quality regulatory requirements; public tolerance of smoke, and restrictions and/or closures

Mark as Complete

SAVE **CANCEL**

WFDSS Next Gen – Summary Results of the RR based on the PMS 236 process. User will need to choose a Relative Risk Rating and provide a narrative. Users will need to SAVE. Users can Mark as Complete to use results in the Organization Assements (OA).

Incident Log

Rationale Periodic Assessment MORs

Relative Risk

Relative Risk Rating

Relative Risk Rating

Probability	Time of Season	Barriers to Fire Spread	Seasonal Severity
	Late	Few	High
Hazard	Fuel Conditions	Fire Behavior	Potential Fire Growth
	Moderate	Moderate	Moderate
Values	Infrastructure/ Natural/ Cultural Concerns	Proximity and Threat of Fire to Values	Social/ Economic Concerns
	Moderate	Moderate	Moderate

Mark as Complete

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Incident Log

Rationale Periodic Assessment MORs

Relative Risk

Values	Natural/ Cultural Concerns	Threat of Fire to Values	Concerns
	Moderate	Moderate	Moderate

Rating	Tally	Relative Risk Rating Recommendation
Low	1	Majority of the items are Low, with a few items marked Moderate and/or High
Moderate	7	Majority of the items are Moderate, with a few items marked Low and/or High
High	1	Majority of the items are High, with a few items marked Low or Moderate

Relative Risk Rating

Low Moderate High

Relative Risk Rating Narrative
Document why the relative risk rating was selected

Mark as Complete

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WFDSS Next Gen – NOTE: The process icons become dark once the user has visited them. The greyed-out icons still need to be visited/entered.

WFDSS

My Home Incidents Analysis Reports Resources Contact Us

GA Preparedness Level: XX | National Preparedness Level: XX

Moose Meadows

Incident Log

Incident Info Analysis Relative Risk Strategy Elaborations OA Rationale Periodic Assessment MORs

Map Scale 1:144,448

Current Org Assessment

Relative Risk Rating

Relative Risk Rating

Probability	Time of Season	Barriers to Fire Spread	Seasonal Severity
	Late	Few	High
Hazard	Fuel Conditions	Fire Behavior	Potential Fire Growth
	Moderate	Moderate	Moderate
Values	Infrastructure/ Natural/ Cultural Concerns	Proximity and Threat of Fire to Values	Social/ Economic Concerns
	Moderate	Moderate	Moderate

Rating Tally Relative Risk Rating Recommendation

Mark as Complete **SAVE**

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WFDSS Next Gen – Organization Assessment – begins with a summary of the Relative Risk Assessment. The image below is still in development. The RR does not currently populate the OA. Buttons are for testing the OA. The RR will be displayed with the results and justification. User will proceed to other inputs.

Incident Log

Rationale Periodic Assessment MORs

Current Org Assessment

Relative Risk Rating

Relative Risk Rating

Probability	Time of Season	Barriers to Fire Spread	Seasonal Severity
	Late	Few	High
Hazard	Fuel Conditions	Fire Behavior	Potential Fire Growth
	Moderate	Moderate	Moderate
Values	Infrastructure/ Natural/ Cultural Concerns	Proximity and Threat of Fire to Values	Social/ Economic Concerns
	Moderate	Moderate	Moderate

Mark as Complete **SAVE** **CANCEL**

Powered by Esri

Incident Log

OA Rationale Periodic Assessment MORs

Current Org Assessment

Rating	Tally	Relative Risk Rating Recommendation
Low	1	Majority of the items are Low, with a few items marked Moderate and/or High
Moderate	7	Majority of the items are Moderate, with a few items marked Low and/or High
High	1	Majority of the items are High, with a few items marked Low or Moderate

For testing purposes only. Use the following buttons to change the read-only Relative Risk Selection

MAKE LOW **MAKE MEDIUM** **MAKE HIGH**

Relative Risk Rating

Low Moderate High

Relative Risk Rating Narrative

updated justification value

Mark as Complete **SAVE**

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WFDSS Next Gen – OA Implementation of Difficulty Assessment

The screenshot displays the WFDSS Next Gen web application interface. At the top, the navigation bar includes 'My Home', 'Incidents', 'Analysis', 'Reports', 'Resources', and 'Contact Us'. The 'Incidents' tab is active, and the page title is 'Moose Meadows'. The right side of the navigation bar shows 'GA Preparedness Level: XX | National Preparedness Level: XX' and an 'Incident Log' link.

Below the navigation bar is a horizontal menu with icons for 'Incident Info', 'Analysis', 'Relative Risk', 'Strategy', 'Elaborations', 'OA' (highlighted), 'Rationale', 'Periodic Assessment', and 'MORs'. The main content area is split into two panels. The left panel is a topographic map of the Moose Meadows area, showing terrain, roads, and a red fire icon. The right panel is titled 'Current Org Assessment' and contains the following sections:

- Implementation Difficulty**
 - Potential Fire Duration**
 - Radio buttons: Low, Moderate, High
 - Potential Fire Duration Narrative**

Evaluate the estimated length of time that the fire may continue to burn if no action is taken and amount of season remaining. Rank this element low, moderate, or high. Note: This will vary by geographic area.
- Incident Strategies (Course of Action)**
 - Radio buttons: NA, Low, Moderate, High
 - Incident Strategies Narrative**

Evaluate the level of firefighter and aviation exposure required to successfully meet the current strategy and implement the course of action. Rank this element as low, moderate, or high. Considerations: Availability of resources; likelihood that those resources will be effective; exposure of firefighters; reliance on aircraft to accomplish objectives; trigger points clear and defined.
 - Mark as Complete
 - SAVE** button

At the bottom of the map, there is a 'Map Scale 1:144,448' and a 'Powered by Esri' notice.

WFDSS Next Gen – Implementation of Difficulty and Socio/Political Concerns

WFDSS
My Home Incidents Analysis Reports Resources Contact Us
GA Preparedness Level: XX | National Preparedness Level: XX

Moose Meadows

Incident Info Analysis Relative Risk Strategy Elaborations OA Rationale Periodic Assessment MORs

Map Scale 1:144,448

Current Org Assessment

Functional Concerns

Functional Concerns

NA Low Moderate High

Functional Concerns Narrative

Evaluate the need to increase organizational structure to manage the incident adequately and safely, and rank this element low (adequate), moderate (some additional support needed), or high (current capability inadequate). Considerations: incident management functions (logistics, finance, operations, information, planning, safety, and/or specialized personnel/equipment) are inadequate and needed, access to emergency medical services (EMS) support, heavy commitment

Socio/Political Concerns

Objective Concerns

Objective Concerns

NA Low Moderate High

Objective Concerns Narrative

Evaluate the complexity of the incident objectives and rank this element low, moderate, or high. Considerations: clarity, ability of current organization to accomplish; disagreement among cooperators; tactical/operational restrictions; complex objectives involving multiple focuses; objectives influenced by serious accidents or fatalities.

Mark as Complete **SAVE**

WFDSS Next Gen – Continuation of Socio/Political Elements



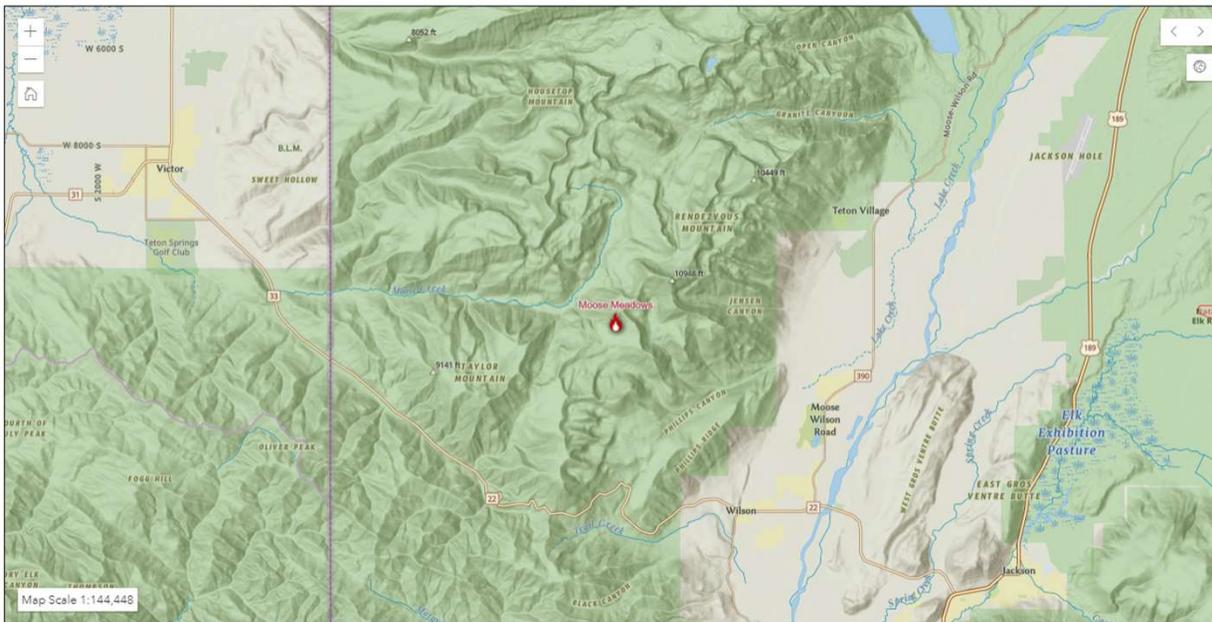
My Home Incidents Analysis Reports Resources Contact Us

GA Preparedness Level: XX | National Preparedness Level: XX

Moose Meadows

[Incident Log](#)

Incident Info Analysis Relative Risk Strategy Elaborations OA Rationale Periodic Assessment MORs



Current Org Assessment

External Influences

External Influences

NA Low Moderate High

External Influences Narrative

Evaluate the effect external influences will have on how the fire is managed and rank this element low, moderate, or high. Considerations: limited local resources available for initial attack; increasing media involvement, social/print/television media interest; controversial fire policy; threat to safety of visitors from fire and related operations; restrictions and/or closures in effect or being considered; pre-existing controversies/relationships; smoke management problems; sensitive political concerns/interests.

Ownership Concerns

Ownership Concerns

NA Low Moderate High

Ownership Concerns Narrative

Evaluate the effect ownership/jurisdiction will have on how the fire is managed and rank this element low, moderate, or high. Considerations: disagreements over policy, responsibility, and/or management response; fire burning or threatening more than one jurisdiction; potential for unified command; different or conflicting management objectives; potential for claims (damages); disputes over suppression responsibility.

Mark as Complete

[SAVE](#)

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WFDSS Next Gen – Result summary for the Organization Assessment

OA Rationale Periodic Assessment MORs

Current Org Assessment

Organization Assessment Results

Organization Assessment Results

Relative Risk Rating	Moderate		
Implementation Difficulty	Potential Fire Duration	Incident Strategies	Functional Concerns
	Moderate	Moderate	Low
Socio/ Political Concerns	Objective Concerns	External Influences	Ownership Concerns
	Low	Low	Low

Mark as Complete SAVE

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OA Rationale Periodic Assessment MORs

Current Org Assessment

Socio/ Political Concerns	Objective Concerns	External Influences	Ownership Concerns
	Low	Low	Low

Rating	Tally	Organization Recommendation
N/A	0	Type 5 - Majority of items rated as N/A; a few items may be rated in other categories.
Low	4	Type 4 - Majority of items rated as Low, with some items rated as N/A, and a few items rated as Moderate or High
Moderate	3	Type 3 - Majority of items rated as Moderate, with a few items rated in other categories.
High	0	Type 2 - Majority of items rated as Moderate, with a few items rated as High.
		Type 1 - Majority of items rated as High; a few items may be rated in other categories.

Unit Recommended Organization

Unit Recommended Organization

Mark as Complete SAVE

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WFDSS Next Gen – OA Final Assessment summary. User will need to choose a Recommended Organization and provide a narrative. Users will need to SAVE. Mark as Complete is in development and intended to push the SAVED content to other portions of the application.

OA Rationale Periodic Assessment MORs



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Current Org Assessment

Low	4	Type 4 - Majority of items rated as Low, with some items rated as N/A, and a few items rated as Moderate or High
Moderate	3	Type 3 - Majority of items rated as Moderate, with a few items rated in other categories. Type 2 - Majority of items rated as Moderate, with a few items rated as High.
High	0	Type 1 - Majority of items rated as High; a few items may be rated in other categories.

Unit Recommended Organization

^ Unit Recommended Organization

Unit Recommended Organization

Type 5
 Type 4
 Type 3
 Type 2
 Type 1

Unit Recommended Organization Narrative

Use this section to document the incident management organization for the fire. If the incident management organization is different than the Wildland Fire Risk and Complexity Assessment recommends, document why an alternative organization was selected. Use the Notes/Mitigation column to address mitigation actions for a specific element and include these mitigations in the rationale.

Mark as Complete
SAVE

WFDSS Next Gen – RR & OA Recap

- Process and inputs as described in PMS 236 NWCG Wildland Fire Risk and Complexity Assessment
- Onscreen guidance from the PMS 236
- Users select Relative Risk Rating and Organization Type based on summary of inputs
- Users provide a narrative for the selections
- Users SAVE and Mark as Complete
- RR/OA can NOT be updated independent of the decision
 - They can be updated prior to publishing
 - After publishing, they can be updated but will require a new decision.