

WFDSS Annual Refresher Training Recommendations

This document is intended to be a reference for individuals putting together annual WFDSS training refreshers for their unit. Refresher coordinators can utilize all or portions of this document to assist them in pulling together materials to meet the recommended/required WFDSS training for Agency Administrators (required for Forest Service Agency Administrators). The training recommendations provided in this document are not new but highlight the important topics and what is available. The training materials are hosted in various locations; this document provides links and directions on how to access these materials. Much of this information can be utilized as self-study but a scenario is strongly encouraged to ‘tie it all together.’ Scenario emphasis can be found at the bottom of this document. A recording of the Agency Administrator WFDSS Refresher presented by RD&A personnel can be found in the [Decision Support Toolbox](#) on the Wildland Fire Management Research, Development & Application (WFM RD&A) Website at <https://wfmrda.nwcg.gov/>.

WFDSS Training Resources:

There are numerous trainings hosted on the [WFDSS Training](#) site. http://wfdss.usgs.gov/wfdss/WFDSS_Training.shtml). Consider which of the following would be most important for your Agency Administrator to review.

- **WFDSS 101 Lessons**

- Rationale
- Developing the Course of Action
- Objectives and Requirements
- Gathering Information to Support Relative Risk Decisions
- Situation Assessment and Map Features

Scenario Exercise Working through WFDSS:

These are topic areas to review as they relate to WFDSS, it is recommended to have an in-depth discussion of each item and what it means to your unit. Incorporating these topic areas into a scenario type exercise is highly recommended, highlights for an exercise are included below. [Appendix N](#) in the Red Book provides additional information regarding WFDSS.

Review key terminology – Strategic Objectives, Management Requirements, Course of Action, Incident Requirements, Incident Objectives and Management Action Points.

Strategic Objectives and Management Requirements – briefly review what is currently pre-loaded in WFDSS for your unit. Discuss if there is conflicting information within the same Fire Management Unit (FMU)/Strategic Objective (SO) shape. Evaluate what fire management options can be utilized within each FMU or SO. Determine if edits are needed to update information currently in WFDSS. Be sure that the information loaded to WFDSS Training matches what will be used in WFDSS Production during an actual incident to ensure training will prepare managers for what they will encounter in WFDSS on real incidents.

Boundary Fires – discuss, with interagency partners, how fires will be managed along boundaries. Utilize a fire scenario for this discussion if possible and work through the WFDSS process.

Fire Scenario:

Develop a scenario within WFDSS Training, this will help provide a basic WFDSS overview in addition to utilizing a fire scenario that is somewhat complex and includes interagency partners to help drive home important considerations or steps within the decision making process.

- [Incident Groups](#) – How to set them up and why it is beneficial for an Agency Administrator to set them when monitoring several incidents.
- [Planning Area](#) – draw a Planning Area and discuss how to draw it and what to include within it.
 - [Spatial Inventory](#) – review the information as provided in WFDSS from the Planning Area. http://wfdss.usgs.gov/wfdss_help/WFDSSHelp_Obtain_VI.html
- [Situation Map](#) – review information available on the Situation Map.
 - Based on the fire scenario, open the situation map and review the information available in the layer tree. Some items to key in on are: Analysis, Fire Environment/Safety, Disturbance History, Boundaries, Designated Areas, Infrastructure, Natural/Cultural Resources and Unit Fire Planning but don't limit yourself in exploring.
- [Relative Risk & Organizational Assessment](#)
 - Complete this process making notes of what various elements were rated, and why they were highlighted and documented within the notes.
 - Assess risk at the landscape level – evaluating risk associated to unit boundaries in addition to adjoining ownerships
 - When possible have partner agencies or stakeholders participate in the exercise to add perspective and reality to the scenario.
 - The [Wildland Fire Risk and Complexity Assessment](#) is a document to consider reviewing when completing the Relative Risk Assessment and Organizational Assessment.
- [Incident Objectives / Incident Requirements](#) – write them for the scenario. Review them to ensure they provide leader's intent and the "why" information.
- [Course of Action](#) – develop Course(s) of Action that further explains leader's intent, the priorities for the incident, and as needed, what not to do
- Take some time to complete the optional Course of Action 'slider bar' and discuss what it means to your unit.
 - Complete a [Management Action Point \(MAP\)](#) or at least discuss how and when they would be utilized.
- [Rationale](#) – draft the Rationale to include "My decision is..." and what was considered in the decision making process. This is the executive summary of the decision and is very important to relay the leader's intent. Review the tab in the WFDSS decision editor and discuss the suggested elements provided and what might be utilized.
- [Interagency partners](#) – if they were not involved in the scenario, discuss whom, when and how they would have been involved throughout the incident.
- [Agency Administrator IMT In-Briefing](#) – Provide an example in-briefing to an incoming team, from the Agency Administrator to the IMT, including the Leader's Intent, Delegation of Authority and Decision documentation ([Appendix D and G of the Red Book](#)). Emphasize the importance of these documents relaying the leader's intent (Incident Objectives, Incident Requirements, and Course of Action) from the WFDSS Decision. For more assistance on this refer to the [Incident Objectives and Incident Requirements Review](#) section below.
- [Fire Behavior Models](#) – include the fire behavior models within your scenario to help support the decision, or discuss the models and how they can assist with decision support as a standalone refresher. A reference document to help with this discussion can be found on the WFDSS training

page under the Modeling Learning Resources "[Spatial Fire Behavior Model Comparison Chart](#)". Review fire models that can help provide decision support (Fire Spread Probability - FSPro, Near Term Fire Behavior - NTFB, Short Term Fire Behavior - STFB), and when it is appropriate to use the various tools. Discuss how the models might be utilized to answer what types of questions. (Note: Fire Behavior requests go through your Geographic Area Editor. If requests are not being fulfilled, contact your Geographic Area Editor.)

- Review the [Values at Risk](#) information provided in FSPro and how it varies from the Values Inventory from a Planning Area, or other fire behavior model.
- Review products previously utilized by the unit to evaluate risk on a fire or where products assisted with decision making.

Additional References for Refresher Material:

Review of Decision Examples:

The following decision examples are provided as training aids to assist users in understanding how WFDSS can be used as a risk decision-making tool. The [Gold Pan Fire](#) of 2013 was an actual fire (located in WFDSS Production). The Gold Pan Fire was a long duration event that varied in IMT organization throughout the life of the fire. The [Salt Springs Fire](#) of 2013 is an RD&A created fire (located in WFDSS Training) and is an example of a short duration Type 3 fire. Reviewing incident example decisions pre-season will assist managers in preparing more thorough decisions during active incidents.

Incident Objectives & Incident Requirements Review:

Examination of wildland fire incident decisions revealed that most Incident Objectives are written general enough that they could apply to any fire in the country. This makes them of little use to incident management teams in developing strategies and tactics to achieve an agency administrator's intent for managing a specific fire and for agency administrators seeking to clarify the objectives they want accomplished. Similarly, Strategic Objectives and Management Requirements, established from forest plans, are the basis for Incident Objectives and Incident Requirements but are rarely written with wildland fire specificity. This decreases the likelihood that NEPA-based management direction is adequately implemented on a wildfire or as intended. It also increases the likelihood of additional risk to firefighters with marginal benefit.

A systematic evaluation of wildfire incident decisions was undertaken during the 2014 fire season, to better understand the situation and recommend solutions. This included site visits to 23 fires and interviews with agency administrators, incident commanders and WFDSS authors. An analysis of all Incident Objectives in the WFDSS database as of May 2014 was also conducted. Findings from this work are summarized in a briefing paper while more explanation and detail can be found in the documents "[Improving WFDSS Incident Objectives & Requirements and Relaying Leader's Intent](#)" and "[Creating Incident Specific Objectives in WFDSS](#)". More information regarding this topic can be found under the "[Incident Objectives Project](#)" heading on the WFMEDA [Technology Transfer](#) page.

Local Leaders Intent and Delegation Letters:

Provide a review of the Unit Leader's Intent and Delegation Letters, including what information should be included within each document, additionally discussing how this information should be complimented within the WFDSS Decision Documentation. Additional findings to the Incident Objectives Project noted that many Delegation of Authority (DOA) letters, Leaders Intent, Briefing Packages and the WFDSS decision documentation were inconsistent (and at times in conflict of each other), resulting in unclear direction to Incident Management Teams. It was challenging for the IMTs to interpret and implement the expectations from all of these documents since they had priorities or expectations which

differed. In response to these inconsistencies, the Wildland Fire Management Research, Development & Application program (WFM RD&A) developed several example documents to use as templates for the DOA, Leaders Intent and Briefing Package for field use. These documents can be downloaded from the [Decision Support Toolbox](#) and are also found in Appendix D and Appendix G of the [2019 Red Book](#). To help support these discussions and emphasize the roles Agency Administrators play with local incident fire management consider referencing [Improving WFDSS Incident Objectives & Requirements and Relaying Leaders Intent](#).

National or Regional Direction specific to fire agency:

Review the current guidance and discuss as needed. (Can be found in the WFM RD&A [Decision Support Toolbox](#).)

- Forest Service 2016 Wildland Fire Risk Management Protocols
- 2019 FS Chief's Letter of Intent
- 2019 DOI Leader's Intent for Wildland Fire Season

Additional References in Support of Decision Making:

The below are good references to review periodically and to have ready as a reference throughout the fire season. They may be part of the self-study to meet the annual refresher requirements.

- [Decision Making for Wildland Fire Incidents](#)
 - Decision Making for Wildfires: A guide for applying a risk management process at the incident level. This document was written to explain the risk decision process for wildland fire. There is a crosswalk in the document related to how it fits in WFDSS. Consider downloading the *Decision making for wildfires: A guide for applying a risk management process at the incident level*.
- [Line Officer/ Agency Administrator's Desk Reference For Fire Program Management \(Forest Service only\)](#)
 - Created to aid line officers who oversee fire management from the preseason through the life of a fire and thereafter.
- [Complexing of Incidents](#)

The recommended method for managing multiple interconnected incidents is with the use of an Incident Group within WFDSS with each incident having its own separate published decision. Complexing is not recommended. The following papers expand on this topic

 - [WFDSS Incident Groups and Decisions](#)
 - [Data Management For Incidents Managed As A Complex And Wildfires That Merge](#).
- [Relative Risk & Complexity Analysis Guidance](#)
 - This document brings all elements of the Relative Risk Assessment and Complexity Analysis completed in WFDSS into one document.
- [Wildland Fire Decision Support Tools Document](#)
 - There are numerous support tools for intelligence gathering and analyses readily available to aid fire managers and administrators in making risk informed decisions that are summarized in one document.
- [Risk Assessment](#) video series
 - A Six part video on Strategic-Level Risk Assessment - Although the videos indicate they are for Fire Behavior Specialists, the information contained in the videos is applicable to Incident Owners, Editors, Approvers, and fire managers wanting to know more about or include

strategic level risk assessment on their fires.

- [USFS Fire Response Protocol's 7 Standards for Managing Incident risk and Wildland Fire Decision Support System \(WFDSS\)](#)
 - This document is designed to in understanding the processes that exist within WFDSS and how they cross-walk to the Seven Standards for Managing Incident Risk. The Seven Standards for Managing Incident Risk were identified in the 2015 Wildland Fire Risk Management Protocols.

Other Training to Consider

Resource Advisor:

Review the role of the Resource Advisor, and how they should be integrated in support of wildland fire management. Many non-fire resources staff fills roles as acting Agency Administrators, providing a review of expectations for their involvement in preseason planning and throughout the duration of an incident will be helpful to achieve success.

- [NWCG Resource Advisor's Guide to Wildland Fire](#)
- [Fire Management Toolbox](#) - This toolbox contains resources for managing fire in wilderness. It provides information on managing agency policy and strategies, wilderness fire planning, fire resource advisor training, research, and other references. The toolbox also includes wilderness fire management aids such as guidelines for MIST and BAER and sample FS forms and guides for determining the need and requesting approval for motorized equipment and tractors or dozers in wilderness.

Printable Hyperlink Reference

Red Book

https://www.nifc.gov/policies/pol_ref_redbook.html

Agency Administrator WFDSS Refresher

https://www.youtube.com/watch?time_continue=20&v=4eWJ_zINQ9E

Decision Support Toolbox

https://wfmrda.nwcg.gov/line_officer_resources.php

WFDSS Training

http://wfdss.usgs.gov/wfdss/WFDSS_Training.shtml

Quantifying a Qualitative Relative Risk Assessment

http://wfdss.usgs.gov/wfdss/pdfs/Quantifying_a_Qualitative_Relative_Risk_Assessment.pdf

Appendix N

https://www.nifc.gov/policies/pol_ref_redbook.html

Incident Groups

http://wfdss.usgs.gov/wfdss_help/WFDSSHelp_about_groups.html

Planning Area

http://wfdss.usgs.gov/wfdss_help/WFDSS_Help_about_planning_areas.html

Spatial Inventory

http://wfdss.usgs.gov/wfdss_help/WFDSSHelp_Obtain_VI.html

Situation Map

http://wfdss.usgs.gov/wfdss_help/WFDSS_Help_situation_map.html

Relative Risk

http://wfdss.usgs.gov/wfdss_help/4373.htm

Organizational Assessment

http://wfdss.usgs.gov/wfdss_help/WFDSSHelp_ONA_Ref.html

Wildland Fire Risk and Complexity Assessment

https://www.nwcg.gov/sites/default/files/publications/pms210_rca.pdf

Incident Objectives / Incident Requirements

http://wfdss.usgs.gov/wfdss_help/WFDSSHelp_About_Obj_Reqs.html

Course of Action

http://wfdss.usgs.gov/wfdss_help/4365.htm

Management Action Point (MAP)

http://wfdss.usgs.gov/wfdss_help/WFDSS_Help_MAP.html

Rationale

http://wfdss.usgs.gov/wfdss_help/WFDSSHelp_About_Rationale.html

Appendix D and G of the Red Book

https://www.nifc.gov/policies/pol_ref_redbook.html

Spatial Fire Behavior Model Comparison Chart

https://wfdss.usgs.gov/wfdss/pdfs/FBTools_v3.pdf

Values at Risk

http://wfdss.usgs.gov/wfdss_help/WFDSSHelp_values_at_risk_info.html

Gold Pan Fire

https://wfmrda.nwcg.gov/docs/_Objectives_&_Example_Fires/Gold_Pan_Long_Duration_Decision_White_Paper.pdf

Salt Springs Fire

https://wfmrda.nwcg.gov/docs/_Objectives_&_Example_Fires/Salt_Springs_Type_3_Decision_White_Paper.pdf

Improving WFDSS Incident Objectives & Requirements and Relaying Leader's Intent

https://wfmrda.nwcg.gov/docs/_Objectives_&_Example_Fires/Writingincidentobjectives_LeadersIntentWhitePaper_201507.pdf

Creating Incident Specific Objectives in WFDSS

https://wfmrda.nwcg.gov/docs/_Objectives_&_Example_Fires/CreatingIncidentSpecificWFDSSObjectives_201510.pdf

WFMRD&A Technology Transfer

https://wfmrda.nwcg.gov/technology_transfer.php

Decision Support Toolbox

https://wfmrda.nwcg.gov/line_officer_resources.php

2019 Red Book

https://www.nifc.gov/policies/pol_ref_redbook.html

Improving WFDSS Incident Objectives & Requirements and Relaying Leaders Intent

https://wfmrda.nwcg.gov/docs/_Line_Officer_Guide/Writingincidentobjectives_LeadersIntentWhitePaper_July2015.pdf

Decision Making for Wildland Fire Incidents

<https://wfmrda.nwcg.gov/decision-reference-guide.php>

Line Officer Desk Guide

https://wfmrda.nwcg.gov/docs/Line_Officer_Guide/FINAL_LOG_04302018.pdf

WFDSS Incident Groups and Decisions

https://wfmrda.nwcg.gov/docs/Reference_Materials/WFDSS_Incident_Groups_6-22-16.pdf

Data Management For Incidents Managed As A Complex And Wildfires That Merge

<https://www.nwcg.gov/sites/default/files/memos/eb-m-16-024b.pdf>

Relative Risk & Complexity Analysis Guidance

https://wfmrda.nwcg.gov/docs/Objectives_&_Example_Fires/RR_ON_Complete_Doc_FINAL.pdf

Wildland Fire Decision Support Tools Document

https://wfmrda.nwcg.gov/docs/Objectives_&_Example_Fires/WildlandfireDecisionSupportTools.pdf

Risk Assessment video series

<https://www.youtube.com/playlist?list=PLQOp517UPvtAeMCxmt00BfDzeVqwmDGIG>

USFS Fire Response Protocol's 7 Standards for Managing Incident risk and Wildland Fire Decision Support System (WFDSS)

https://wfmrda.nwcg.gov/docs/Reference_Materials/USFS_Protocol_WFDSS.pdf

NWCG Resource Advisor's Guide to Wildland Fire

<https://www.nwcg.gov/publications/313>

Fire Management Toolbox

<https://www.wilderness.net/index.cfm?fuse=toolboxes&sec=fire>

WFMRD&A Decision Support Toolbox

https://wfmrda.nwcg.gov/line_officer_resources.php