

# Complexing Fire Decision Documentation is Not Recommended

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**The Main Point:** Complexing fires for decision document purposes and deliberative risk assessment is not a recommended practice.

## Introduction:

Fires are sometimes combined into a Fire Complex when two or more fires are within close proximity and are being managed as one incident. Complexing can assist managers in assigning incident management teams and/or resources, however *it is not recommended* for the purposes of deliberative risk assessment and decision documentation. When incidents are complexed/combined in, for example the Wildland Fire Decision Support System (WFDSS), it creates many challenges for the local unit *and* upward reporting that result in vast and long term affects and for this reason it is not recommended.

## Issue:

The practice of complexing fires for decision documentation and/or for ease or simplification is a fallacy when it comes to the risk assessment process, incident planning, and the effects on tracking and reporting systems. When fires are combined in for example WFDSS, it impacts the ability to enter, report, and use incident data in an accurate and useful manner. Impacts can be seen within WFDSS, ROSS, I Suite, ICS-209, and fire reporting, that make documentation challenging and complicated.

## Challenges Specific to WFDSS when Incident

### Documentation is Combined

Complexing creates these documentation challenges in the WFDSS application:

### What do I do if two fires burn together?

When a fire burns over another the incidents can be merged. When this occurs managers can choose one fire (Fire A) to remain as the active fire, and call the second fire (Fire B) out. If doing this, update Fire B's acreage to the best estimate available prior to the fires merging on the WFDSS Incident Information page and declare Fire B out. Consider documenting that Fire A and B have merged and that Fire B was declared out. This can be documented in the WFDSS Periodic Assessment for Fire A and the WFDSS Validation for Fire B.

- ▶ Confusing or incomplete decision support documentation for the incident(s)
- ▶ Incomplete incident decision history
- ▶ Vague Incident Objectives and Course of Action that may or may not be relevant to all incidents being managed within that decision
- ▶ Difficulty providing accurate and relevant fire behavior analysis
- ▶ Upward reporting issues – true fire sizes, cost accounting, fire reports, and so forth
- ▶ Data sharing issues amongst fire applications
- ▶ If incidents need to be separated, it can be very difficult to split them back out

### The Importance of Maintaining Incident Data Integrity

Data integrity for long term statistical and reporting requirements is critical. In the future, more data sharing across systems will lead to reduced data input requirements, and it will become more critical to maintain incident data integrity. [Appendix A, Data Sharing Between Incident Tracking and Reporting Systems](#), describes which systems share fire data and provide a glimpse in to what the future might hold. This underscores the need to maintain incident data integrity.

**Idea!** If tracking multiple incidents is the priority, consider grouping incidents into a defined filter within WFDSS or utilize the new map Bookmark feature to quickly jump between incidents.

### Conclusion

Complexing fires for decision documentation purposes and deliberative risk assessment is not a recommended practice. Managers should carefully examine the ramifications of combining fires for this purpose. Following the paradigm that each fire requires an individual record and tracking allows current and future fire applications to share data and provide accurate upward reporting of incident information and risk.

For information regarding Wildland Fire Data and Fiscal Management for Complexes, Mergers, and Splits see [NWCG Memo #014 2011](#).

## Appendix A: Data Sharing Between Incident Tracking and Reporting Systems

### Introduction

Technology continues to advance the ability for incident systems to share information, thereby reducing data entry and potential errors for the field. Web services for information sharing will become easier to use in the future. The intent of this paper is to define how data within the Wildland Fire Decision Support System (WFDSS) is currently being shared and provide a glimpse into what the future of incident data sharing may look like. The iRWIn project continues to expand data sharing between systems.

### How WFDSS Currently Informs Other Systems:

WFDSS is currently providing data to the following systems:

- ▶ **Situation Report** (ICS 209) – Basic incident information can be populated into an initial 209 report from WFDSS if the reporting unit chooses: Discovery Date & Time, Incident Number, Incident Name, Cause, Latitude, Longitude, Ownership, State, and Unit.
- ▶ **Incident Risk Console** (RisC) –RisC is a recently developed tool within the Wildland Fire Dashboard that provides insight into the complexities of an incident and enhances dialogue opportunities by displaying potential incident risk data for Washington Office Fire & Aviation Management (USFS) and Regional Offices. Currently RisC pulls WFDSS values data from the Spatial Inventory based on a radius from the origin, the Planning Area, and soon from the Values at Risk from completed FSPro analysis. It also pulls the WFDSS Relative Risk rating and completed Near Term Fire Behavior modeled predicted burn by day and burn type.

### What the Future Holds:

Potential future system integration could reduce errors and workload for fire managers.

- ▶ Situation Report – Imagine a day when the Situation Report is always current and units have the ability to update a fire situation at any time because relevant fire information was constantly being pulled in from other systems such as iRWIn, WFDSS, ROSS, FireCode, and EGP.
- ▶ Enterprise Geospatial Portal (EGP) –As development of this tool continues, more information from various wildland fire systems can be aggregated and displayed. It could provide the foundational geospatial data for reports or WFDSS or other systems. In the future WFDSS analysis may be provided for display.
- ▶ Integrated Reporting of Wildland-Fire Information (iRWIn) –iRWIn is being developed to integrate several fire systems’ information into one place and reduce disparate information. As this program is developed, envision a time when data starts with one point of entry and is fed to

### The Integrity of Data

No matter how systems are currently sharing data or will in the future, the integrity of individual fire data is critical. When incidents or data is combined, this integrity is compromised. For these reasons “Complexing” or combining incidents for decision documentation or deliberative risk assessment is not recommended. [For more information see “Complexing Fire Decision Documentation is Not Recommended”](#)

the various systems, reducing entry errors and workload. A fire situation report could be available at a touch of a button, and provide all relevant information in one place. See the DOI [iRWIn](#) OWF webpage for more information.

- ▶ Fire Reports – As systems are interconnected in the future, fire reporting could be more efficient. A prepopulated agency specific template with accurate and current fire information could automatically be emailed to the unit fire managers for completion when a fire is declared out. This report could be finalized with notes and comments and filed electronically with all pertinent data that is consistent across all systems including relevant shape files.
- ▶ Prescribe Fire & Fuels Reporting Systems – As units continue to implement treatments on the landscape and report their accomplishments, ideally this information would be shared to the various systems displaying data for decision making such as WFDSS, EGP, iRWIn to mention a few.
- ▶ InciWeb – As systems are integrated and data shared could this system be another reporting system from the integrated information? Information that could be shared with the public at various stages of incident management could be pre-identified and loaded in to database. Incident Information Officers could then supplement that key information with fire specific information.
- ▶ Other reports – As fire managers identify needs for reports at the unit, regional, and national levels integrated systems would allow simplified queries, consistency of data, and ease in accessing information.

### **Why Individual Incident Data is Important:**

It is imperative that as technology continues to advance the fire community follows in their thinking and processes used to collect, analyze and report fire information. The interconnectivity between systems will lead to reduced workload, minimized recording errors. It also ensures the maintenance of long term fire data integrity, resulting in improved record keeping. Maintaining individual fire information is critical to this process for the following reasons:

- ▶ Fire reporting
- ▶ Acreage burned
- ▶ Land ownership or unit fire statistics