

Standards for Weather Stations from Non-Fire Agency Networks

The following standards will apply to groups of weather stations not historically used in the calculation of National Fire Danger Rating System (NFDRS) outputs. This would include such networks as the Florida FAWN, the National Weather Service's Automated Surface Observation System (ASOS), and the Oklahoma Mesonet.

Data will be ingested into the Weather Information Management System (WIMS) for processing by NFDRS algorithms by following these [protocols](#) for use of the *Alternate Gateway*. They are processed the same as observations from the RAWS network (via the Wildland Fire Management Information (WFMI) system) or manual observations entered by users. As such they are archived in WIMS and available via the standard data access tools (e.g. Data Warehouse, FAMWEB Fire & Weather Web Page).

1. A consistent set of quality observations for at least the past 5 years from which the necessary climatological inputs and percentiles necessary for the calculation of key NFDRS outputs such as Staffing Levels and Adjective Fire Danger can be determined.
2. There is a well-documented maintenance schedule/program for the station or network.
3. The stations in the network comply with [Fire Weather Stations Standards](#) for weather elements collected for NFDRS. A 10 meter 2 minute wind may be used but it must be documented in the station catalog.
4. Acceptable conversion factors are used to format data in English units.
5. Data are formatted in the published [1998 FW9 format](#). Hourly and once-daily observations are supported and will use the existing WIMS “R” and “O” record type conventions. If an “O” type observation is ingested, the record must contain State of Weather and Wet Flag; if these are present, NFDRS “O” type records will be automatically computed without user intervention.
 - Note: This infers that additional sensors or processing is required by alternate networks (as is the case for NWS ASOS stations).
6. Metadata for each station will be included in a station catalog on WIMS. Sensor heights will be included in the station catalog.
7. Station’s numbers will adhere to the standard number scheme used for WIMS stations.
8. There will be a 1 to 3-month evaluation period in the WIMS Test Environment before a network is moved operationally in WIMS Production.
9. Either the network owner or a collaborating land management agency will be the “station owner” in WIMS and provide for NFDR model management and oversight.
10. The Fire Danger Subcommittee will provide oversight and approval of the alternative network. Fire Danger Subcommittee contact information can be found [here](#).