



Data Rights and Sharing National Mesonet Paradigm

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Background – National Mesonet Program



- NRC released the "From the Ground Up" report in early 2009, outlining a comprehensive strategy for designing, deploying, and operating a CONUS-wide and truly mesoscale observing system, in a "Network of Networks" (NoN) paradigm
- Consequently, Congress established the NWS's National Mesonet Program to procure non-federal surface data and apply that data in all facets of NWS operations
- The program began with 8 other non-federal mesonets located mostly in the south-central U.S.
- The program has now grown to nearly 3 dozen networks operating across all 50 states, operating a broad variety of hydrometeorological observing systems
- The Meteorological Assimilation Data Ingest System (MADIS) is the IT system through which NWS obtains data from participating networks and redistributes it to the broader community

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Before (NWS Obs Only) and After

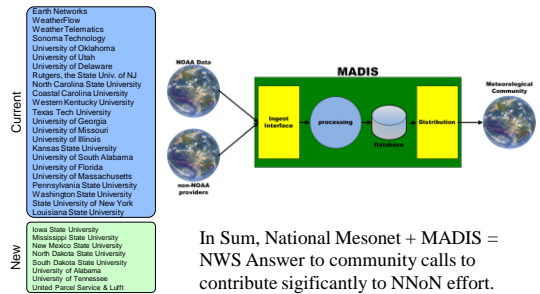


NWS Assets (before) and Mesonet (after)

- As of FY15, National Mesonet supports 8000 surface observing sites, 4000 of which have soil moisture and 1400 have solar radiation measurements
- National Mesonet now includes the TAMDAAR data set, which provides approximately 3500 aircraft soundings per day in the vicinity of 300 regional airports, and the GSD GSP-Met data feed
- The program also supports 68 fixed location vertical profiling systems (mostly SODARS and radiometers), and the CASA network in the DFW region



How the Program Functions with MADIS



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Data Rights and MADIS Tiers



- Mesonet involves direct purchase of data by government contract (not grants – a big legal difference)
- To facilitate optimized cost sharing, our contract recognizes *limited data rights*
- In Mesonet, we recognize three overarching categories of data rights:
 1. Distribution to government, research, and educational organizations
 2. Public - full distribution
 3. Distribution to NOAA only
- Consistent with federal law and FAR
- A Mesonet contributor's distribution category is the same as its access category
- Managed in IT framework via MADIS

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Data Rights: Additional Thoughts



- Mesonet is not the only NWS data purchase program to recognize limited data rights... we did not set the precedent
- Once upon a time, we all strove for full and open, but we don't live in the ideal barter economy paradigm this often requires in order to be realistic
- As non-federal observations occupy an increasing share of the overall pie, this may not be realistic, if it is to remain advantageous to the taxpayer in a cost-sharing paradigm
- At the extremes, we pay full freight for full rights, thereby supplying entire revenue stream for non-federal partner, or we insist on redistributing data freely and openly, thereby putting non-federal partners out of business
- Outstanding issues: purchase of data sources in international domain and compliance with applicable WMO agreements

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