

## OKLAHOMA MESONET / ARS QUALITY ASSURANCE REPORT

November 2011

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- Mesonet technicians performed scheduled rotations of 2 Barometers (PRES), 4 Temperature and Relative Humidity Sensors (RELH), 11 Pyranometers (SRAD), 3 Raingauges (RAIN), 13 Wind Monitor Nose Cones (WSPD) and 17 Windsentries (WS2M).
- Tipton (TIPT) Mesonet Site was struck by a tornado on 7 November 2011, appropriate data flagged as erroneous. Data missing from 7 November 2011 to 16 November 2011.
- Fort Cobb (FTCB) Mesonet site was struck by tornado debris on 7 November 2011, appropriate data flagged as erroneous. Data missing from 7 November 2011 to 10 November 2011.

### Mesonet QA Report for Standard Variables

Variable	Status	Ticket	Site	Remarks
<b>TAIR</b>	Resolved	22355	TIPT	Site struck by tornado
<b>RELH</b>	Resolved	22326	COPA	Sensor has a low bias during high humidity
	Resolved	22327	SKIA	Sensor has a low bias during high humidity
	Resolved	22330	FTCB	Site struck by tornado debris
	Resolved	22353	TIPT	Site struck by tornado
	Current	22430	PAWN	Sensor has a low bias during high humidity
<b>WSPD</b>				
<b>WDIR</b>	Resolved	22348	TIPT	Site struck by tornado
<b>PRES</b>				
<b>SRAD</b>	Resolved	22328	CHER	Sensor had a low bias
	Resolved	22329	WEBR	Sensor had a low bias
	Resolved	22349	TIPT	Site struck by tornado
	Current	22431	NEWK	Sensor has a low bias

<b>RAIN</b>	Resolved	22347	TIPT	Site struck by tornado
	Resolved	22367	WILB	Rain gauge malfunctioned during rain event
<b>TA9M</b>	Resolved	22291	WIST	Sensor had a high bias
	Resolved	22356	TIPT	Site struck by tornado
<b>WS2M</b>	Resolved	22311	SLAP	Sensor had a starting threshold problem
	Resolved	22334	FTCB	Site struck by tornado debris
	Resolved	22346	TIPT	Site struck by tornado
	Resolved	22379	WEST	Sensor had a starting threshold problem
<b>TS10</b>	Resolved	22293	GRA2	Sensor reporting errant spikes in data
	Resolved	22352	TIPT	Site struck by tornado
<b>TB10</b>	Resolved	21785	BUTL	Sensor had a low bias
	Resolved	22344	TISH	Sensor had a low bias
	Resolved	22377	CHER	Sensor had a bias
	Current	22434	SKIA	Sensor has a low bias
<b>TS05</b>	Resolved	21620	ALV2	Sensor had a low bias
	Resolved	21808	GRA2	Sensor had a low bias
	Resolved	22292	BROK	Sensor had a low bias
	Resolved	22351	TIPT	Site struck by tornado
	Current	22436	APAC	Sensor has a low bias
<b>TB05</b>	Resolved	21764	CHER	Sensor had a low bias
	Resolved	22322	WALT	Sensor had a low bias
	Resolved	22343	TISH	Sensor had a low bias
	Resolved	22437	BUTL	Sensor had a bias
	Current	22294	CAMA	Sensor has a low bias
	Current	22345	ELRE	Sensor has a low bias
	Current	22433	WILB	Sensor has a low bias

<b>TS30</b>	Resolved	21809	GRA2	Sensor reported errant spikes in data
	Resolved	22298	ALTU	Sensor reported errant spikes in data
	Resolved	22350	TIPT	Site struck by tornado
	Resolved	22371	WEAT	Animal damaged sensor cable
<b>TR05</b>	Resolved	21770	BESS	Sensor reporting errant values
	Resolved	22313	ADAX	Sensor did not respond to rainfall
	Resolved	22316	FOR A	Sensor did not respond to rainfall
	Resolved	22331	FTCB	Sensor damaged by lightning strike
	Resolved	22342	CHAN	Soil moisture reporting erroneous values
<b>TR25</b>	Resolved	22314	WEBR	Sensor reporting erroneous values
	Resolved	22332	FTCB	Sensor damaged by lightning strike
	Current	22378	ALTU	Sensor reporting errant data after lightning strike
	Current	22432	MRSB	5cm and 25cm sensors may be cross wired
<b>TR60</b>	Resolved	22333	FTCB	Sensor damaged by lightning strike

### ARS Little Washita Watershed QA Report

Variable	Status	Ticket	Site	Remarks
<b>RAIN</b>				
<b>VW05</b>				
<b>VW25</b>				
<b>VW45</b>				
<b>V05T</b>				
<b>V25T</b>				
<b>V45T</b>				

### ARS Ft. Cobb Watershed QA Report

Variable	Status	Ticket	Site	Remarks
<b>RAIN</b>				
<b>VW05</b>				
<b>VW25</b>	<b>Resolved</b>	<b>22286</b>	<b>F115</b>	<b>Errant spikes in soil moisture data</b>
<b>VW45</b>				
<b>V05T</b>				
<b>V25T</b>				
<b>V45T</b>				

Current” tickets are the unresolved tickets as of the last day of the month OR those tickets added based on the Monthly QA analysis.

“Resolved” tickets are the sensor problems that were fixed during the entire month.

<b>Variable</b>	<b>Description</b>
TAIR	Air temperature measured at 1.5 meters
RELH	Relative humidity measured at 1.5 meters
WDIR	Wind direction measured at 10 meters
WSPD	Wind speed measured at 10 meters
PRES	Pressure
SRAD	Incident solar radiation
RAIN	Rainfall
TA9M	Air temperature measured at 9 meters
WS2M	Wind speed measured at 2 meters
TS10	Soil temperature measured at 10 cm under native sod
TB10	Soil temperature measured at 10 cm under bare soil
TS05	Soil temperature measured at 5 cm under native sod
TB05	Soil temperature measured at 5 cm under bare soil
TS15	Soil temperature measured at 15 cm under native sod
TS30	Soil temperature measured at 30 cm under native sod
TR05	Soil moisture: Calibrated DeltaT measured at 5 cm under native sod
TR25	Soil moisture: Calibrated DeltaT measured at 25 cm under native sod
TR60	Soil moisture: Calibrated DeltaT measured at 60 cm under native sod
VW05	Soil moisture: Volumetric water content measured at 5 cm under native sod
VW25	Soil moisture: Volumetric water content measured at 25 cm under native sod
VW45	Soil moisture: Volumetric water content measured at 45 cm under native sod
V05T	Soil Temperature measured at 5 cm under native sod
V25T	Soil Temperature measured at 25cm under native sod
V45T	Soil Temperature measured at 45cm under native sod