

Deep Space Exploration Society

SuperSID Observation Results August 2016

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AAVSO Observer ID: A147

Observation Methodology:

The observations were made with a standard SuperSID system at Dr. Russel's house at Colorado Springs, CO.

The results were analyzed using SidGrabber software.

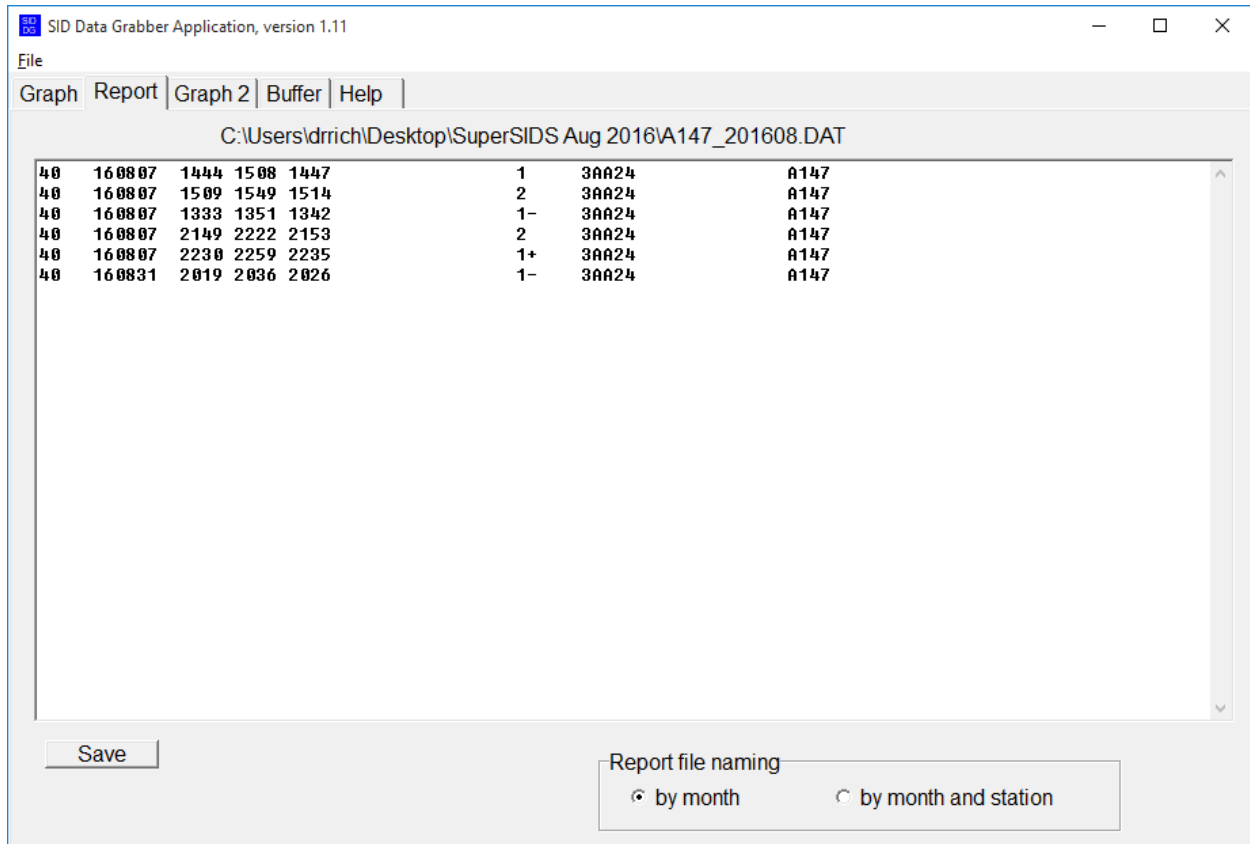
The stations observed were NAA and NML.

SidGrabber Report Results:

Example...

Date	Start	End	Max	Station	Observer
160709	1603	1620	1609	3AA24	A147

Results Report:



The Importance is related to the duration of event by:

<u>Duration</u>	<u>Importance</u>
< 19 minutes	1-
19-25	1
26-32	1+
33-45	2
46-85	2+
86-125	3
>125	3+

The Confidence is based on the observer:

<u>Confidence</u>	<u>Definition</u>
Questionable	0
Possible	1
Fair	2
Reasonable	3

Reasonably Definite	4
Definite	5

Summary:

The SuperSID radio telescope at Dr. Russel's house in Colorado Springs, CO has good reception on the NAA broadcast station and only fair reception for the NML broadcast station. The NML station did not register any activity during the daylight hours, even though it looked normal at night.

The results this month had the most significant events on August 7 with a M1.3 and numerous C flares. August 31 produced a SID with a C2.2 flare.

It appears that the minimum flare that the NAA channel can detect is a C2.2.

There was a significant amount of lightning storms in the daylight hours near Colorado Springs this month. A lot of spikes showed up on the SIDS data that made it hard to determine if the detection was real or not.

The results from the Radio Jove system at the Plishner Radio Astronomy and Space Science Center have been included. Radio Jove was monitoring at 20.1 MHz.

The Radio JOVE system showed very poor or no correlation with solar activity during this period, even with a type M1.3 flare. There was also significant interference and lightning storm activity, so it was hard to pick out any correlations.

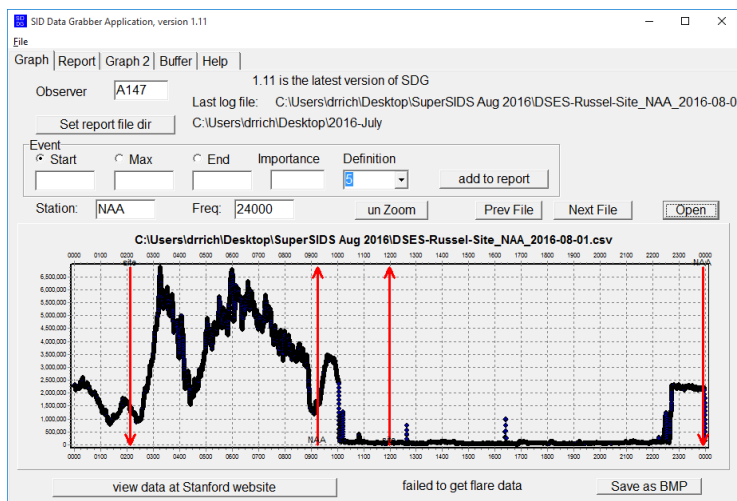
Improvements Planned:

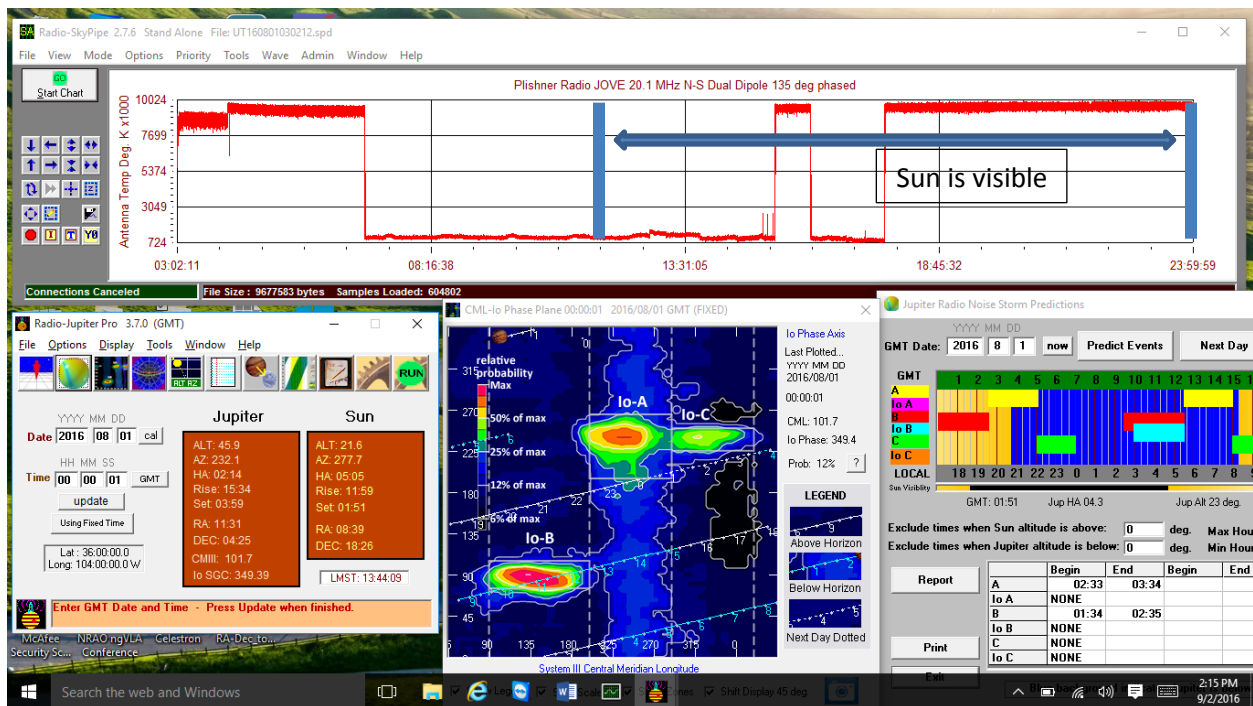
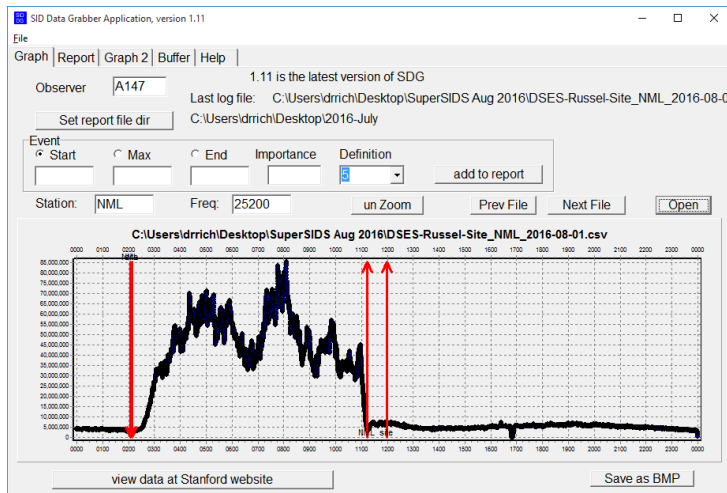
- Move the SuperSID system to Plishner to limit spurious signals
- Raise the SuperSID antenna to a high point to attempt to improve gain
- Calibrate the Radio Jove to standardize the outputs

Observations:

August 1, 2016

Results: No activity noted

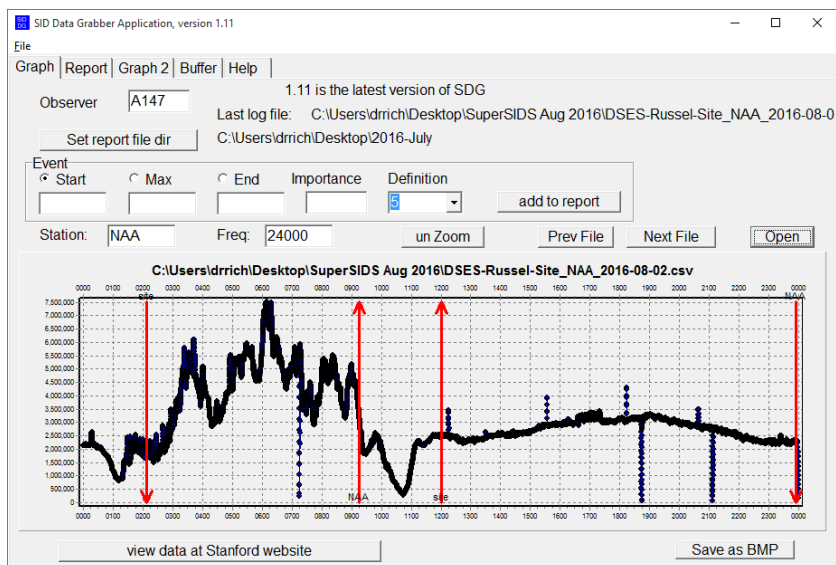


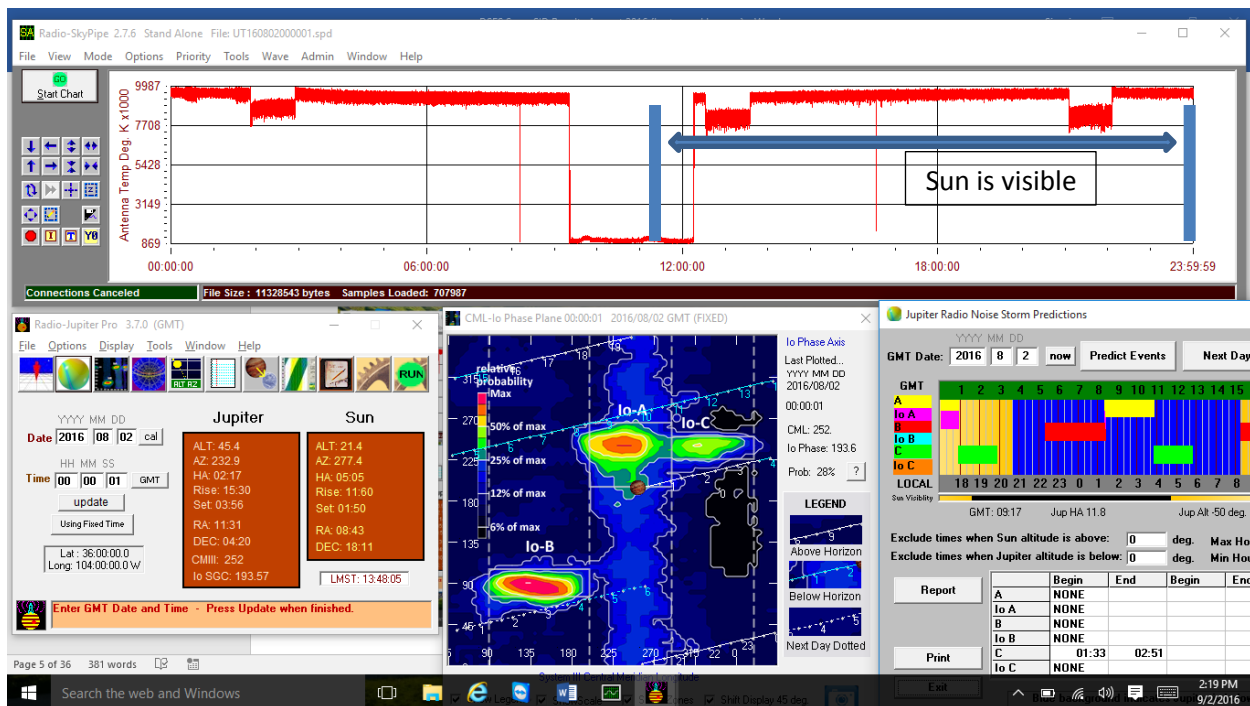
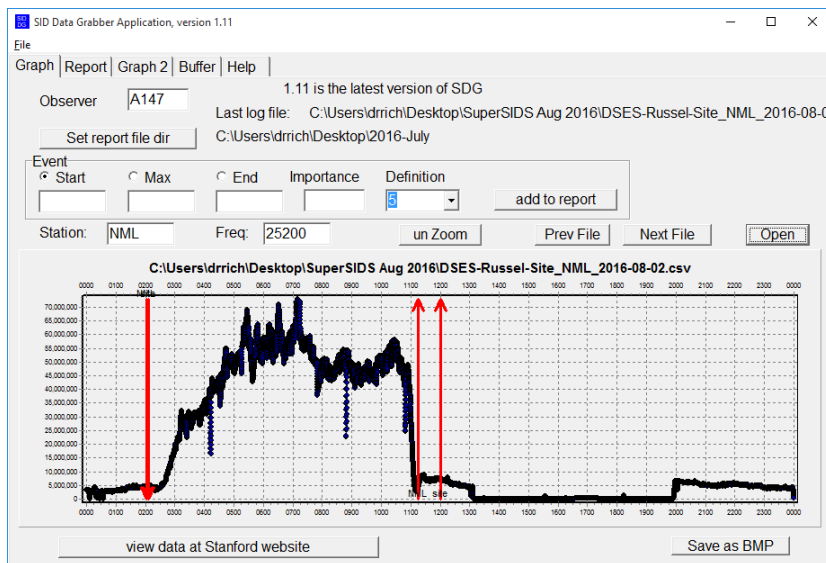


Note: No correlation noted

August 2, 2016

Results: No activity noted

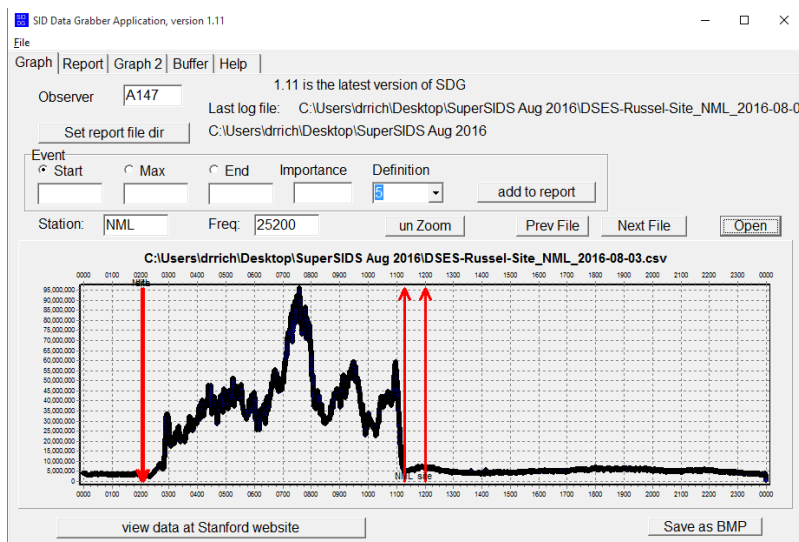
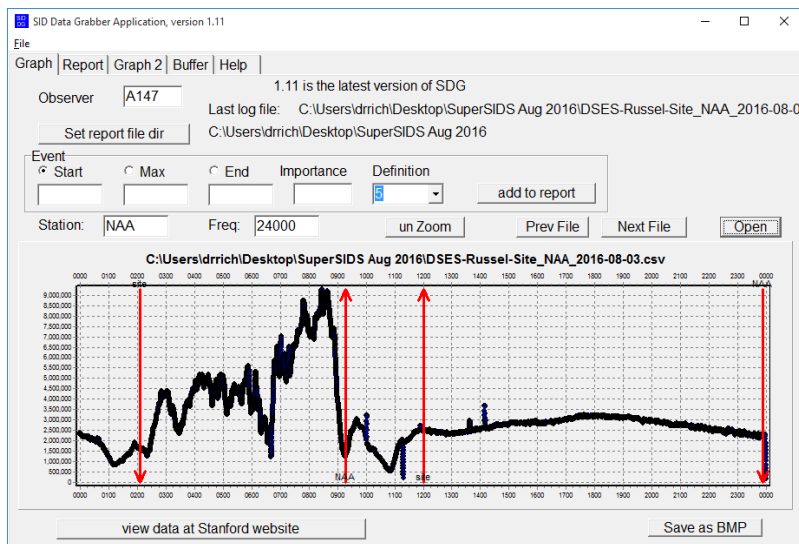


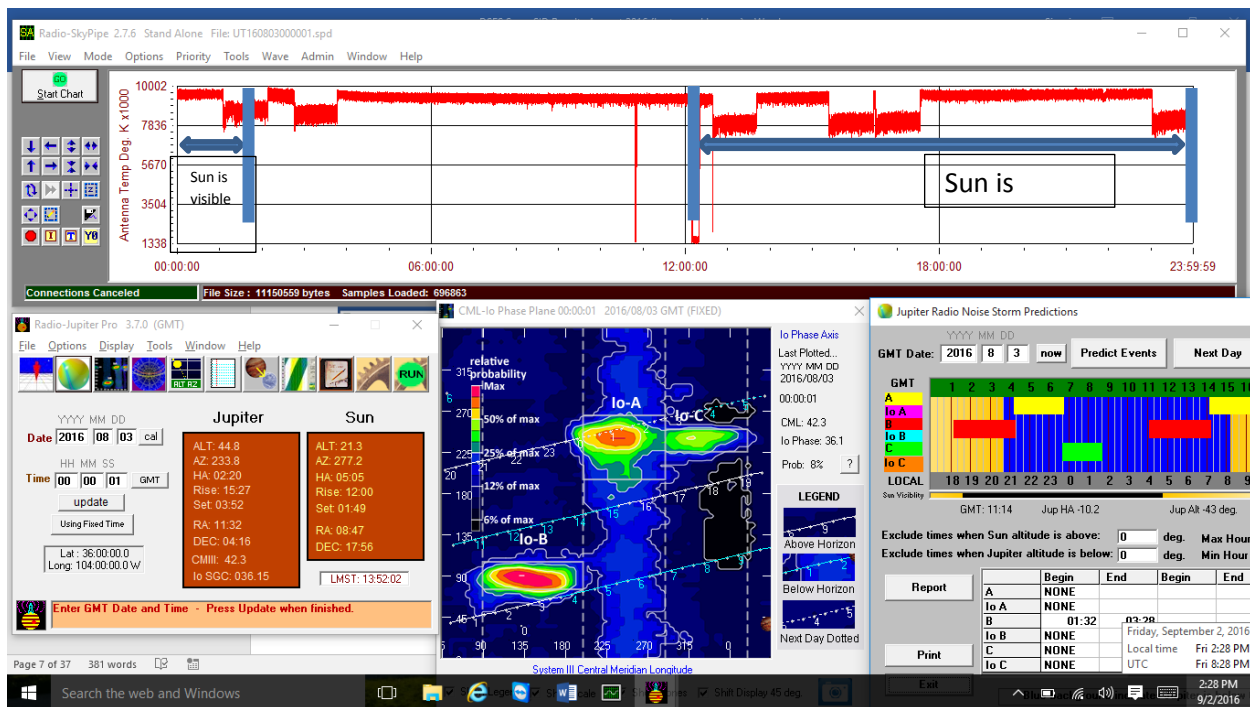


Note: No correlation to SuperSID noted

August 3, 2016

Results: No activity noted

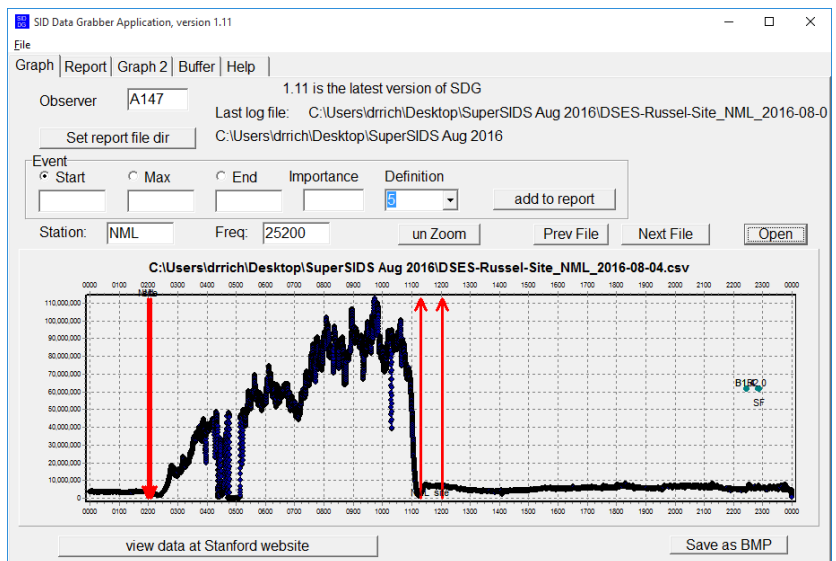
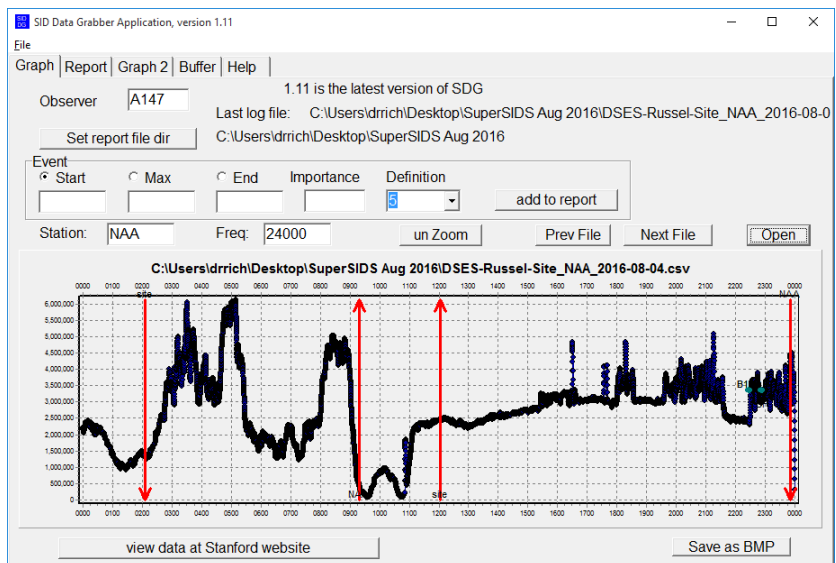


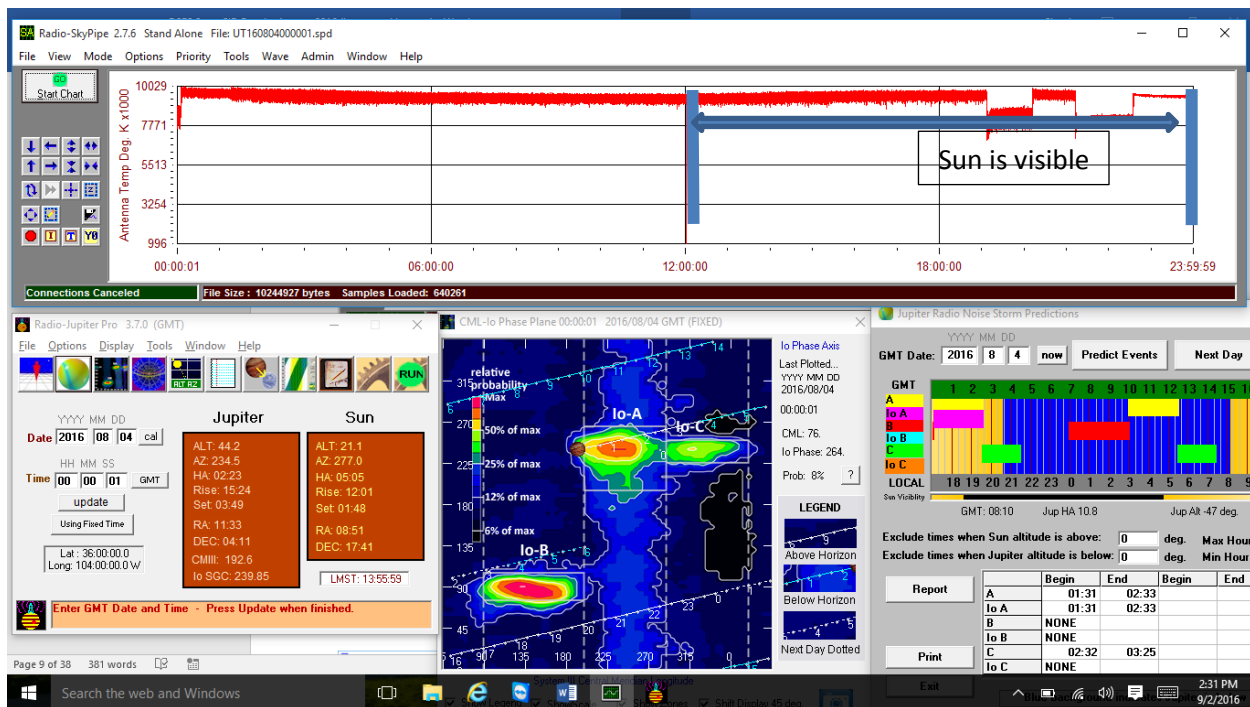


Note: No correlation to SuperSIDS noted

August 4, 2016

Results: No activity noted

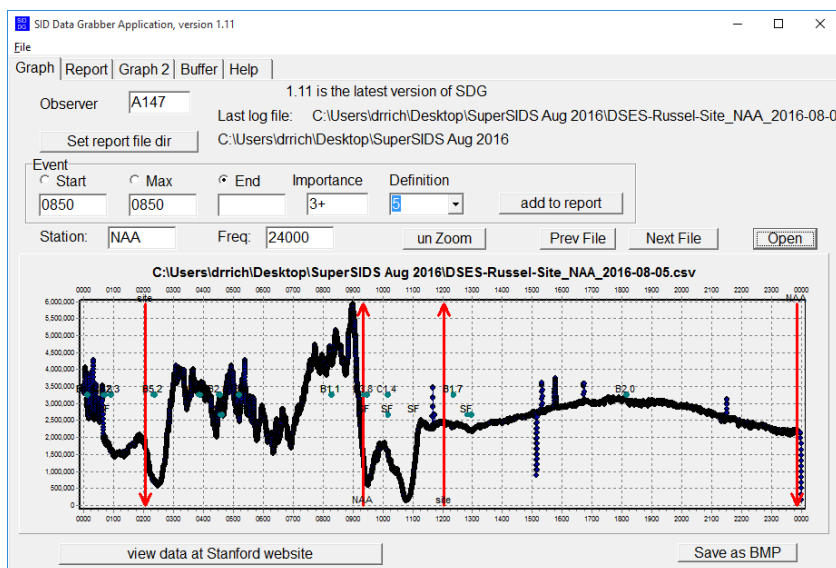


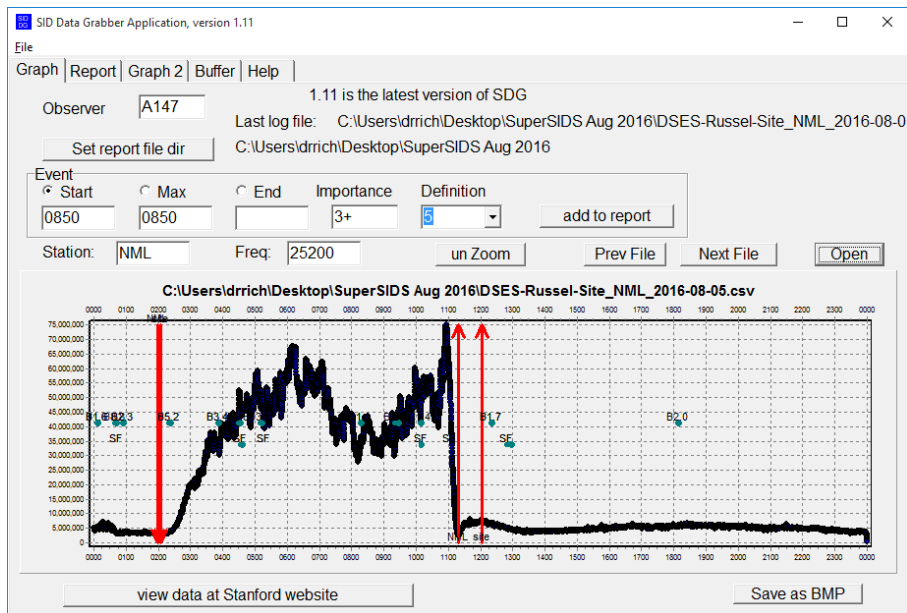


Note: No correlation to SuperSIDS noted

August 5, 2016

Results: No activity noted

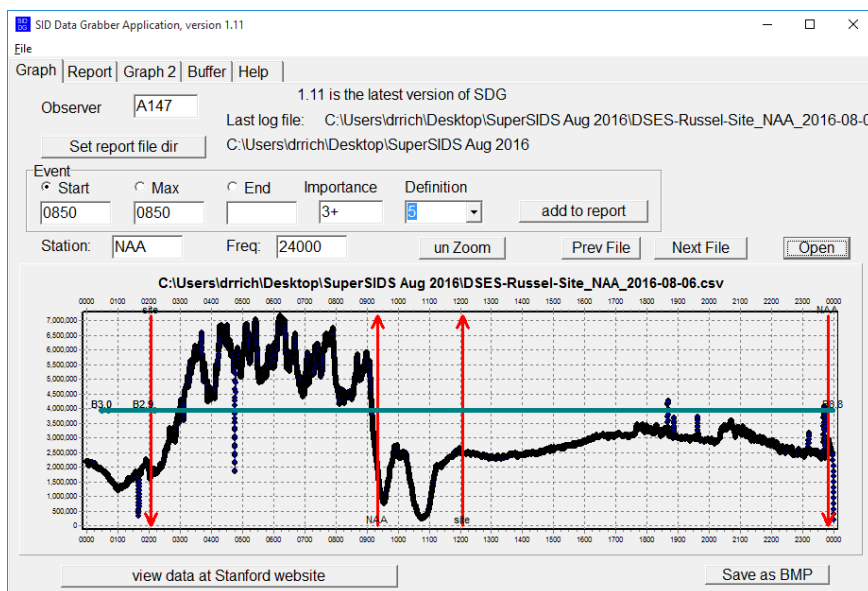


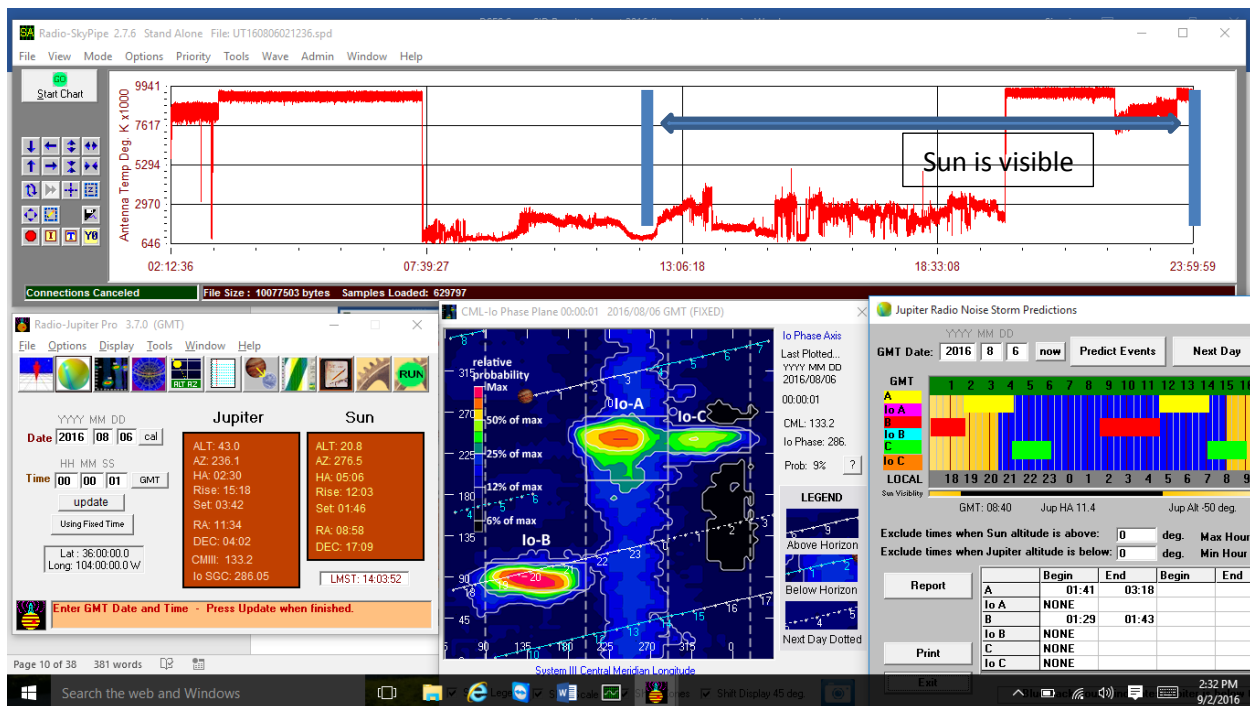
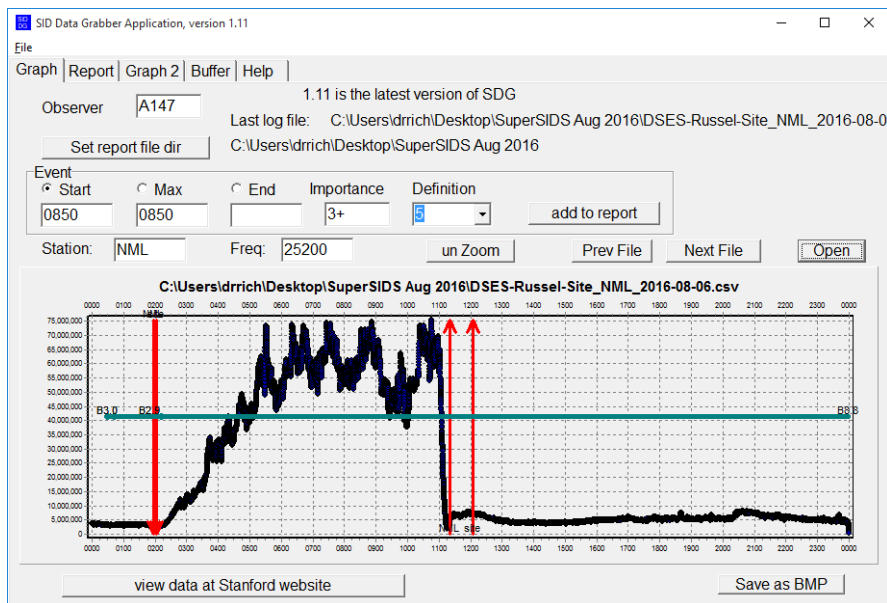


No Radio Jove file for August 5.

August 6, 2016

Results: No activity noted

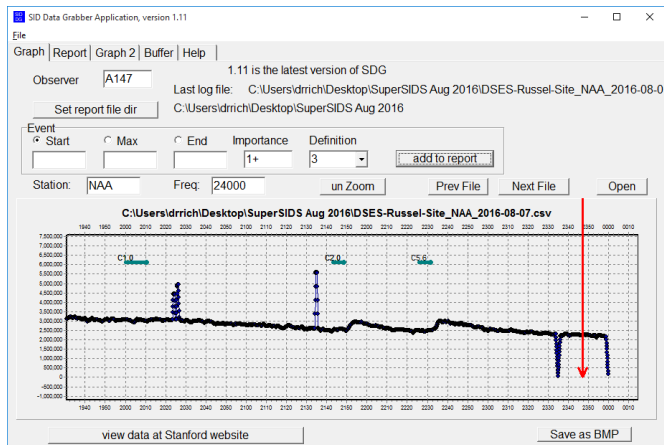
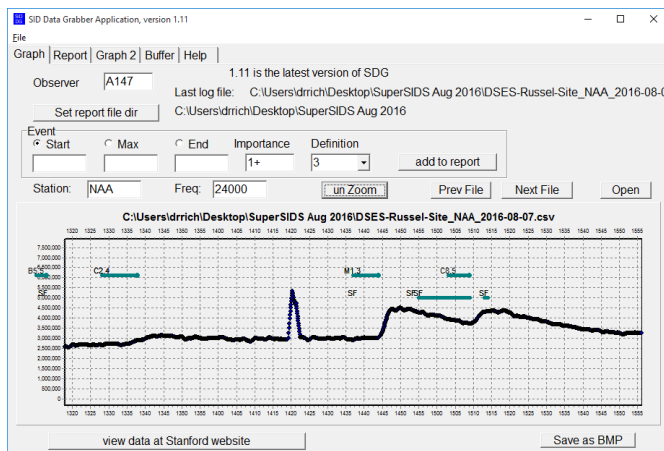
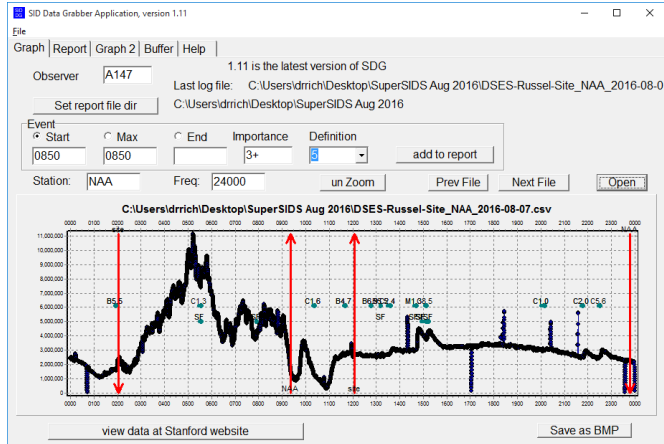


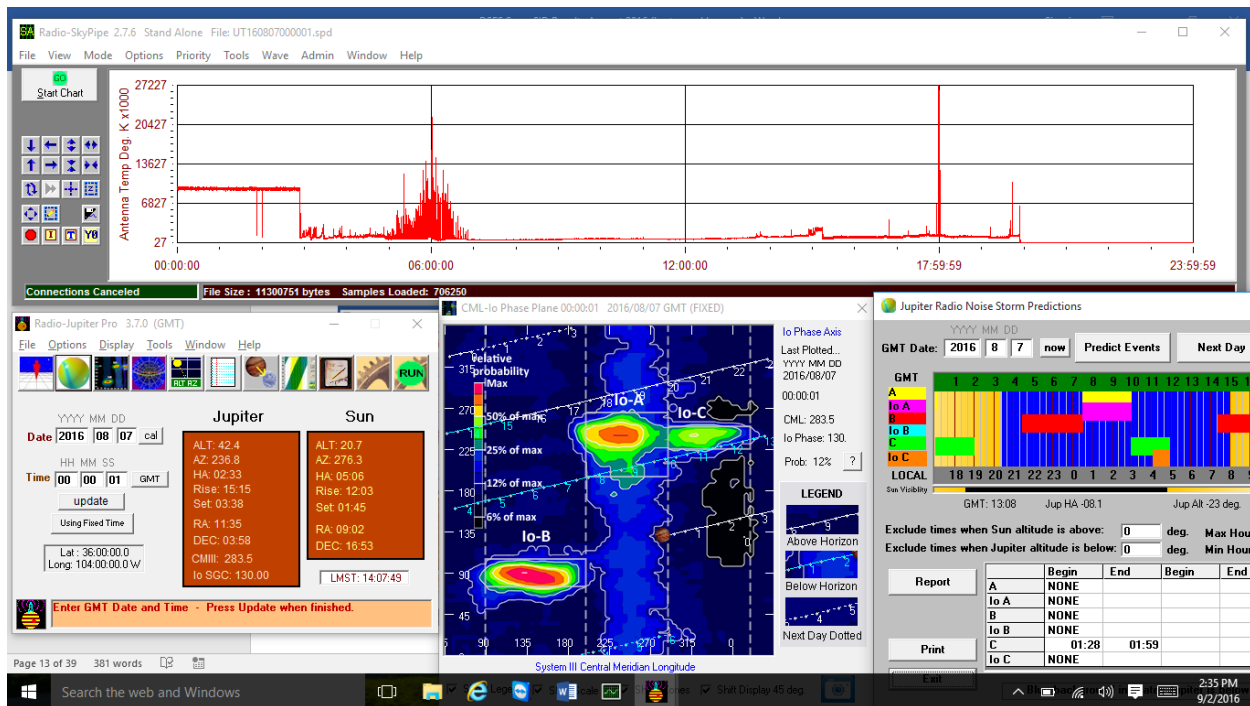


Note: No correlation to SuperSIDS noted

August 7, 2016

Results: Numerous noted: M1.0, B8.5, C2.0 and C5.6 SIDS

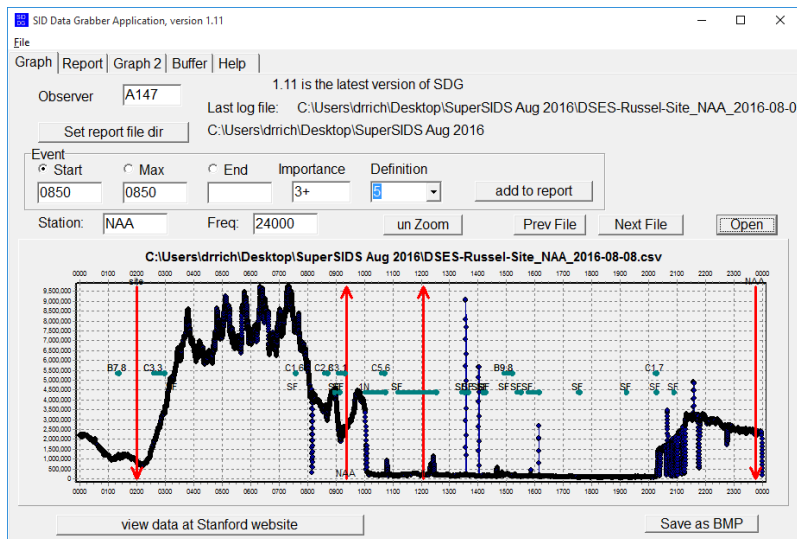


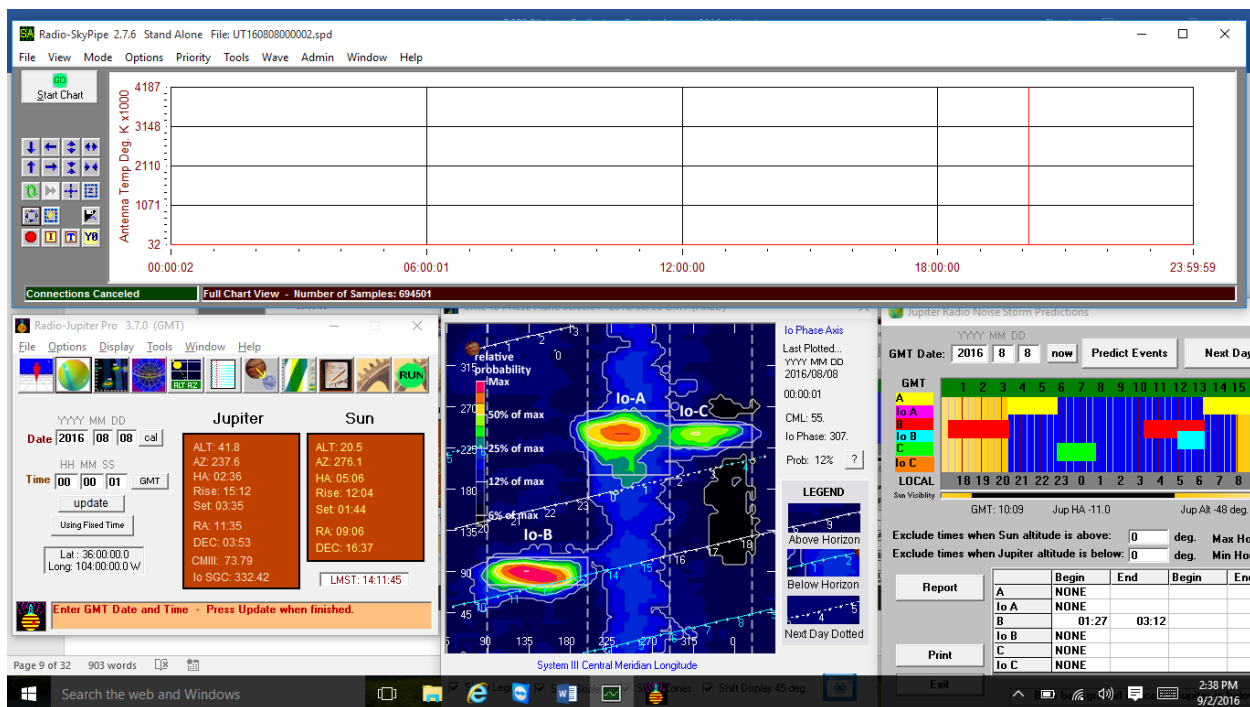
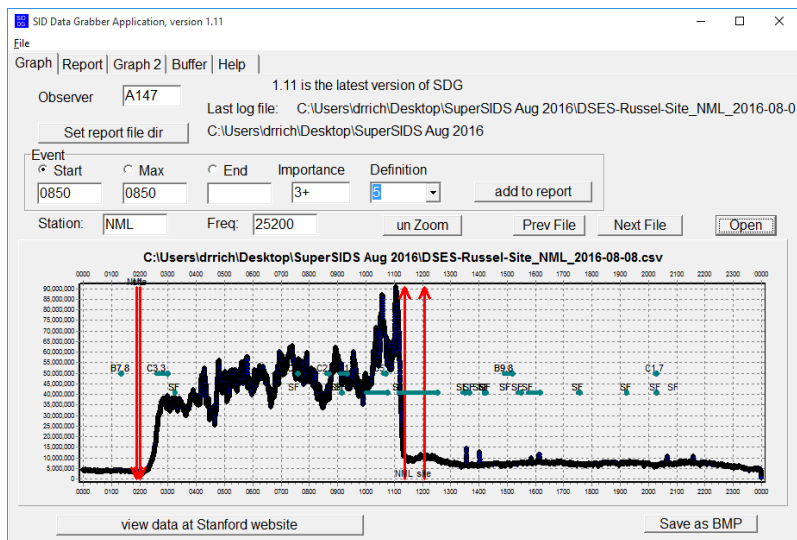


Note: Jove did not correlate with the SuperSID data even though there was a M1.3 event.

August 8, 2016

Results:

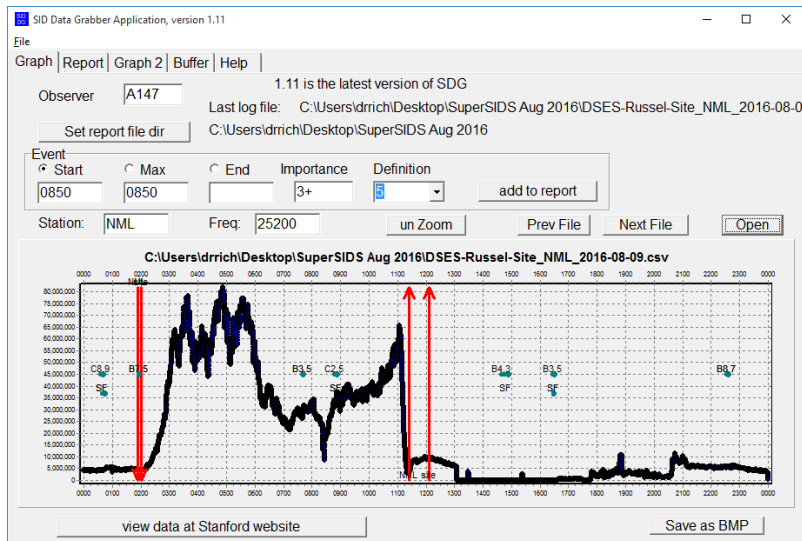
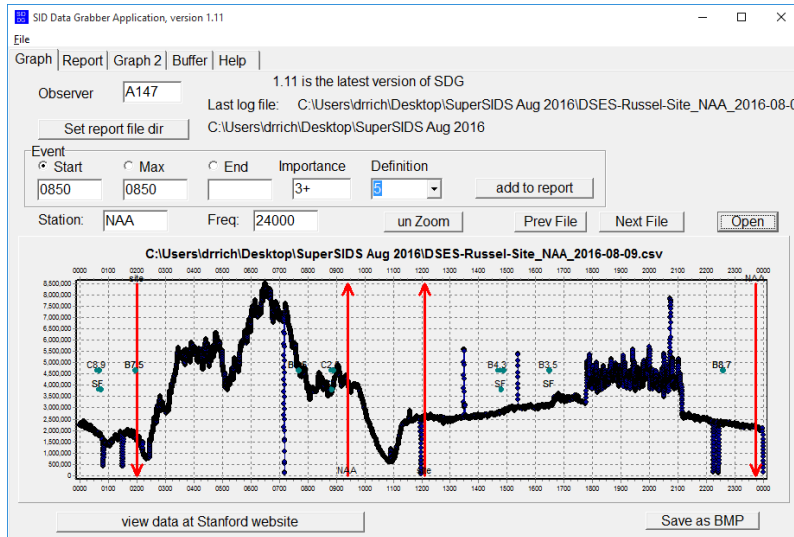


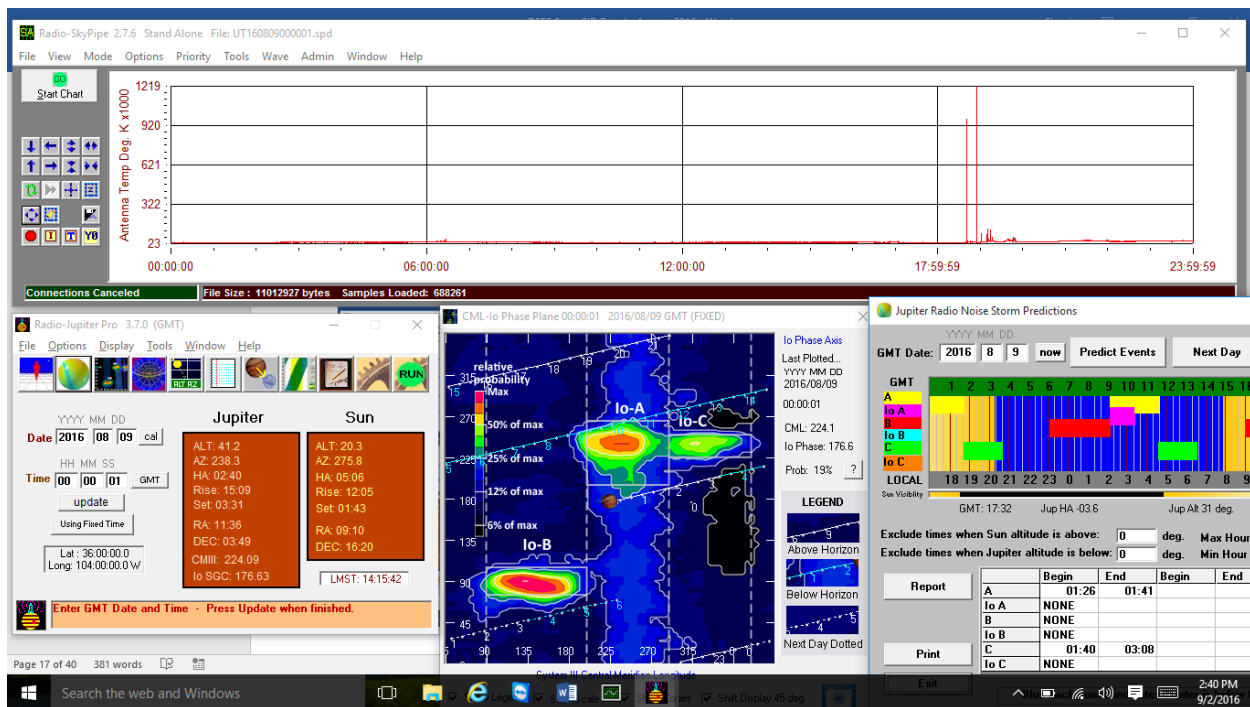


Note: Radio Jove appears to be offline today.

August 9, 2016

Results: No detection of expected flares noted

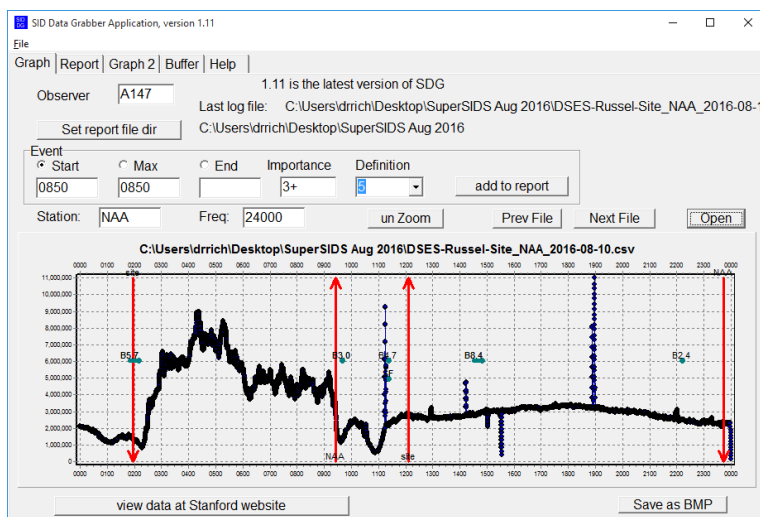


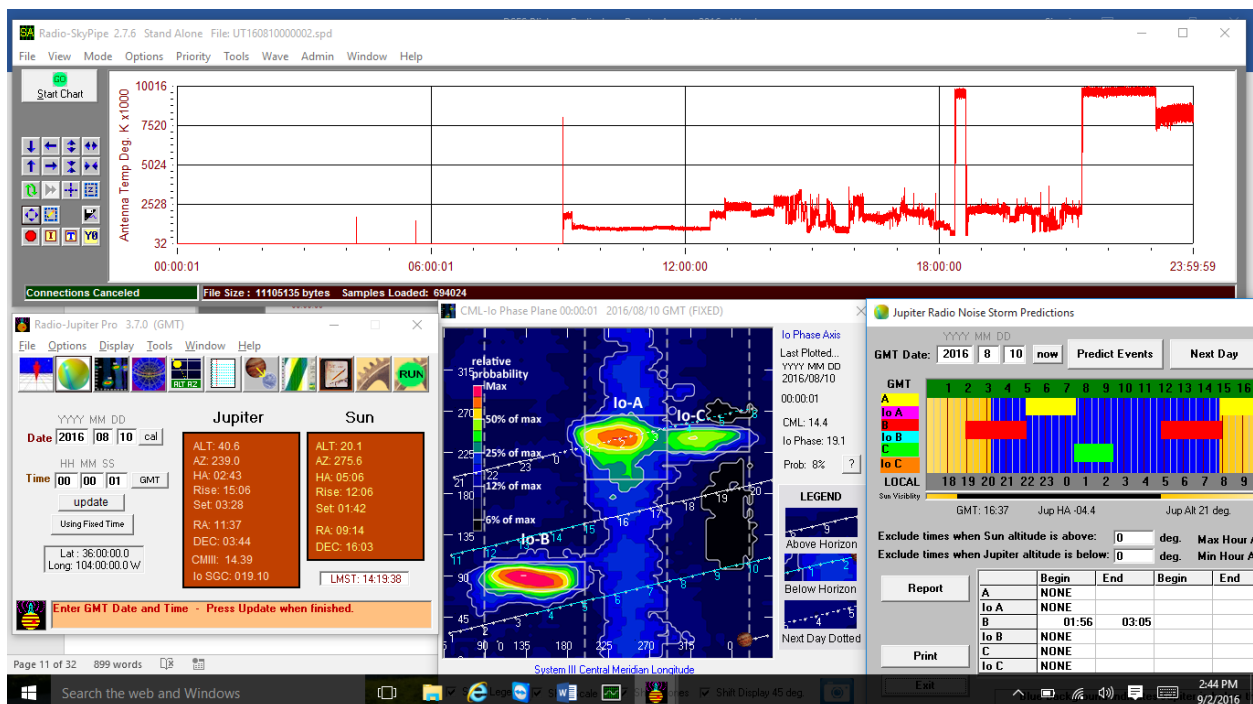
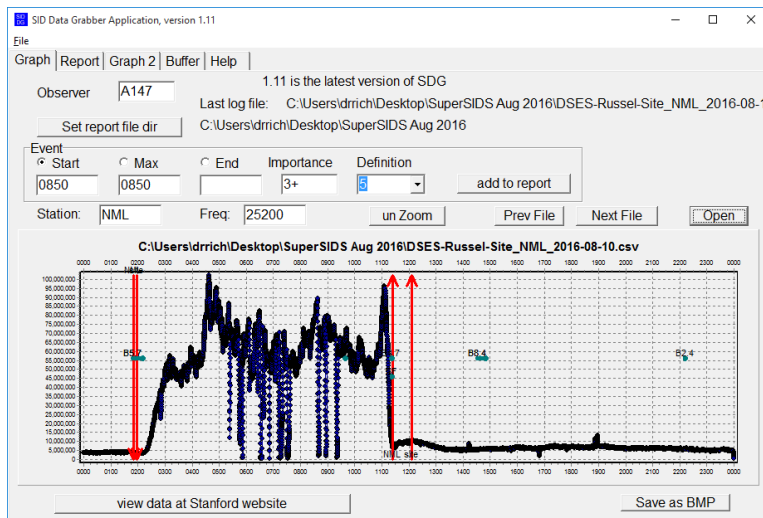


Note: Jove appears to be offline today

August 10, 2016

Results: No activity noted

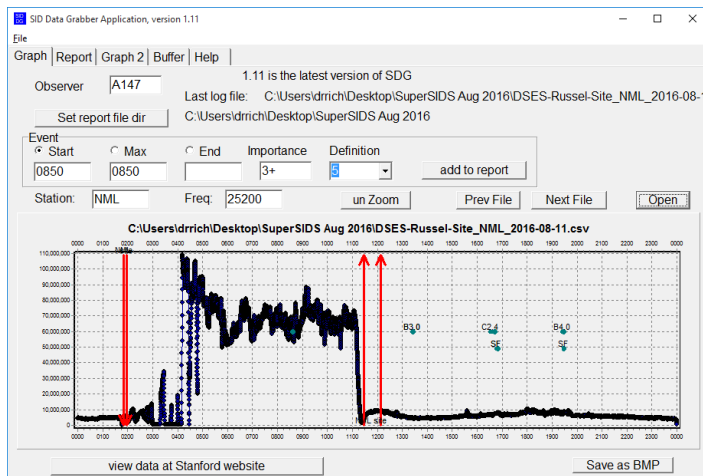
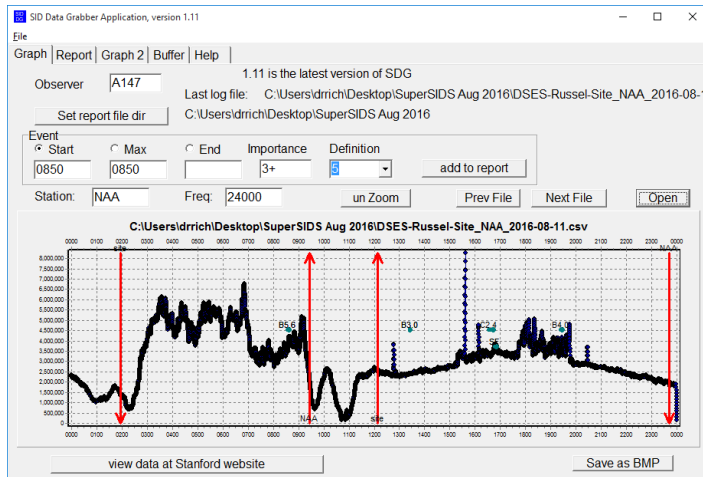


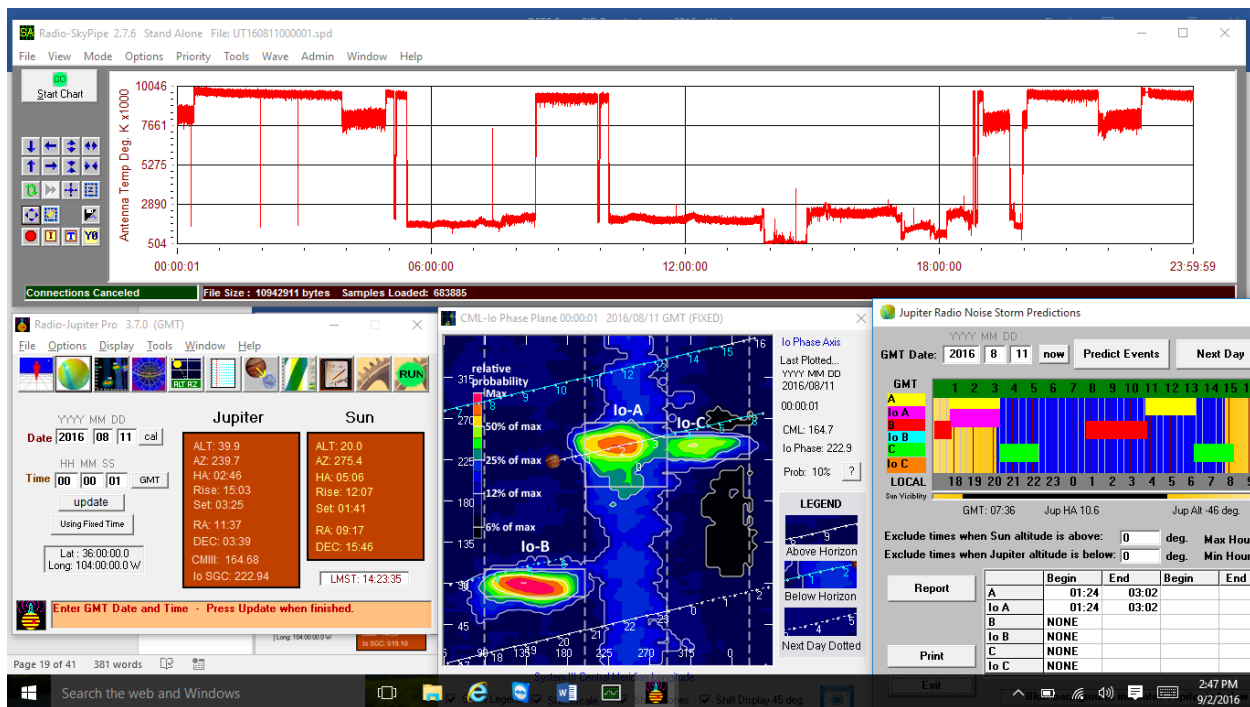


Note: Possible correlation with SID events- weak at best

August 11, 2016

Results: No detectable flares detected

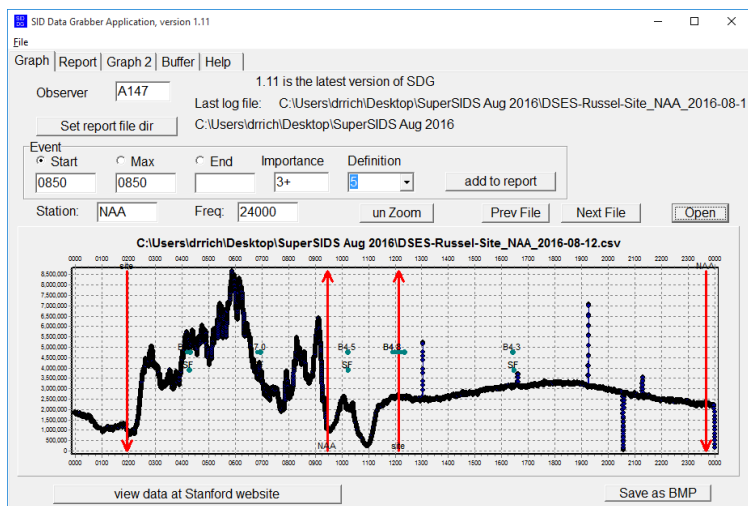


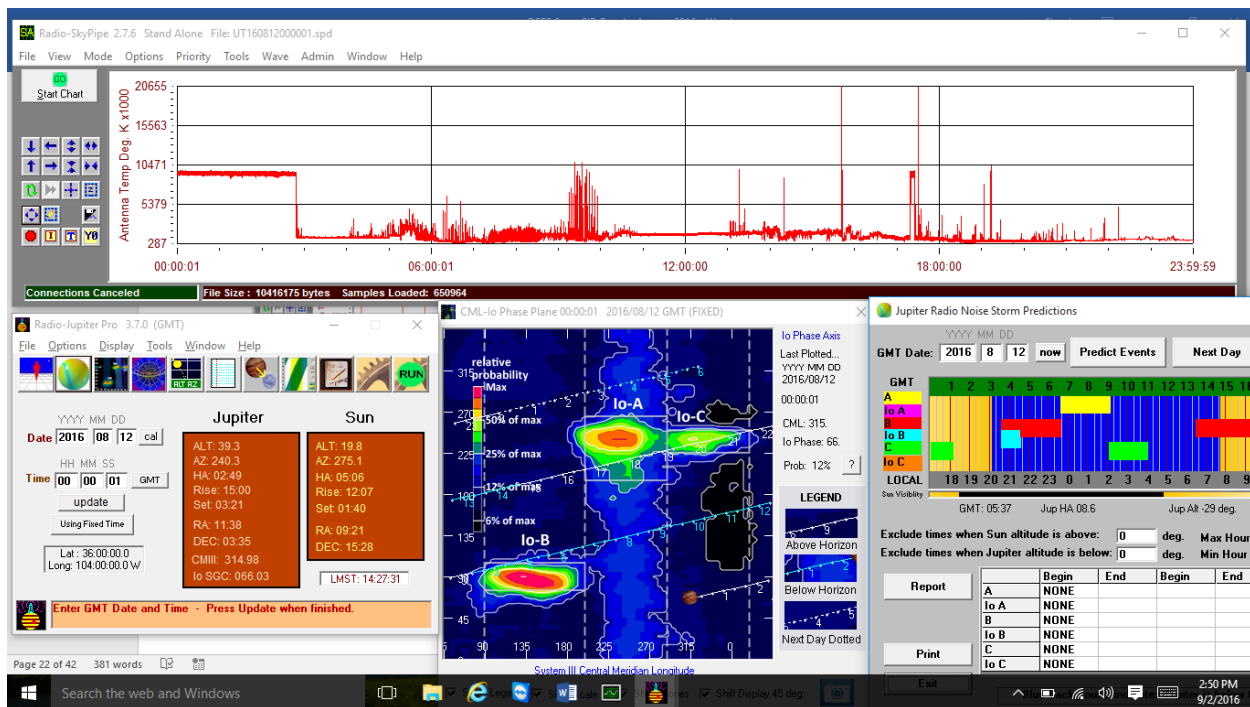
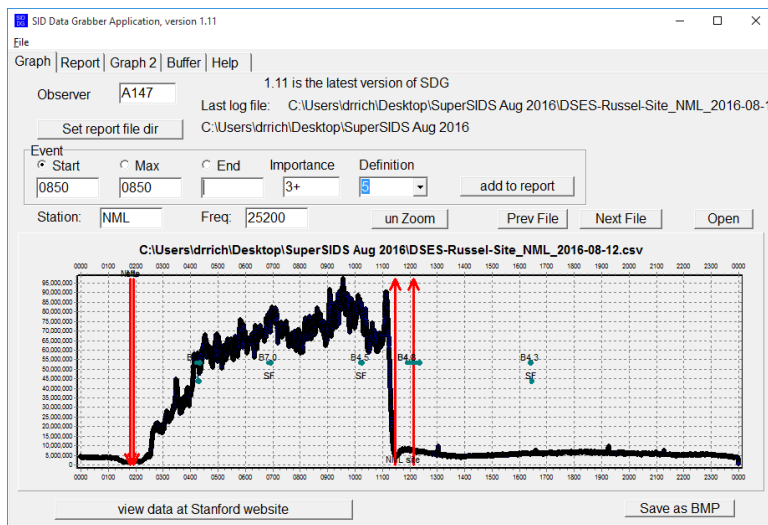


Note: Radio Jove has no noticeable correlation to C flare

August 12, 2016

Results:

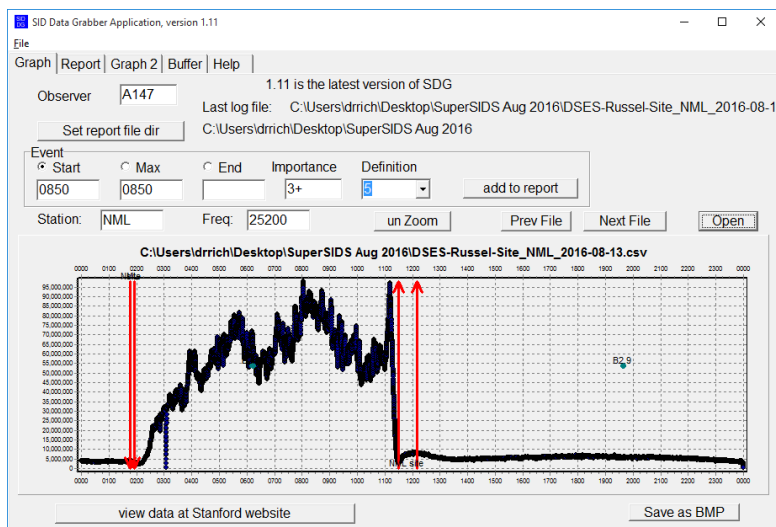
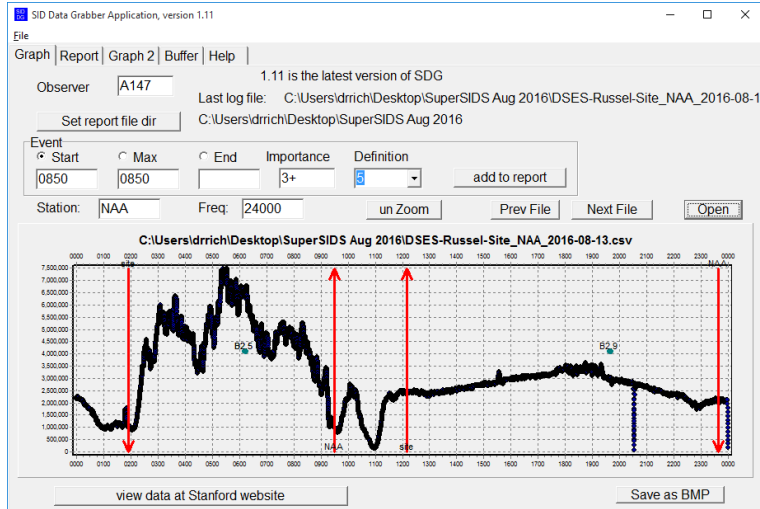


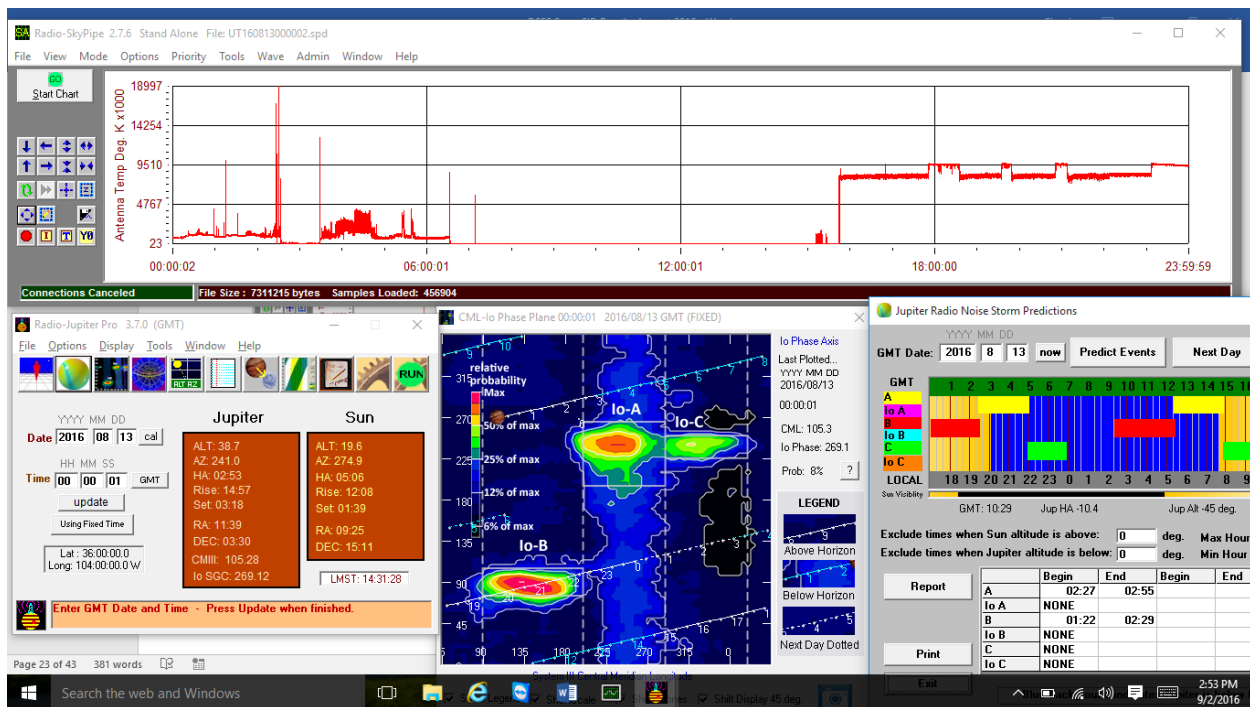


Note: Possible correlation with B flare at about 1715z

August 13, 2016

Results:

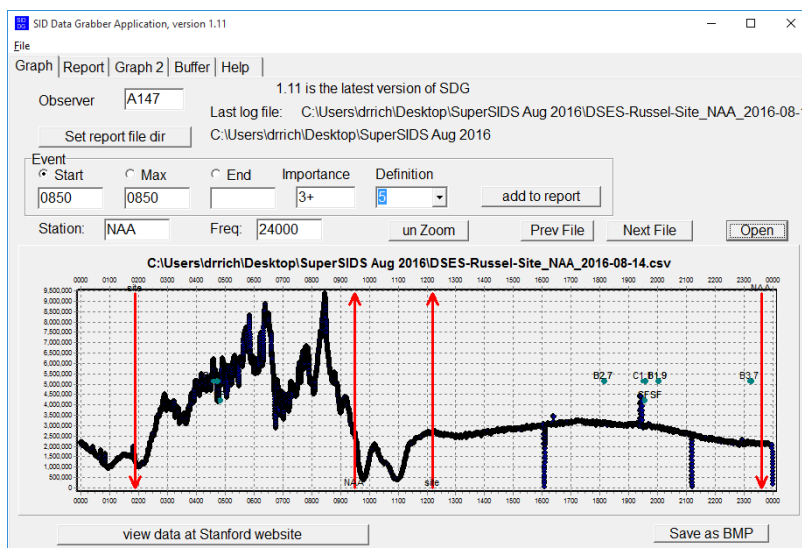


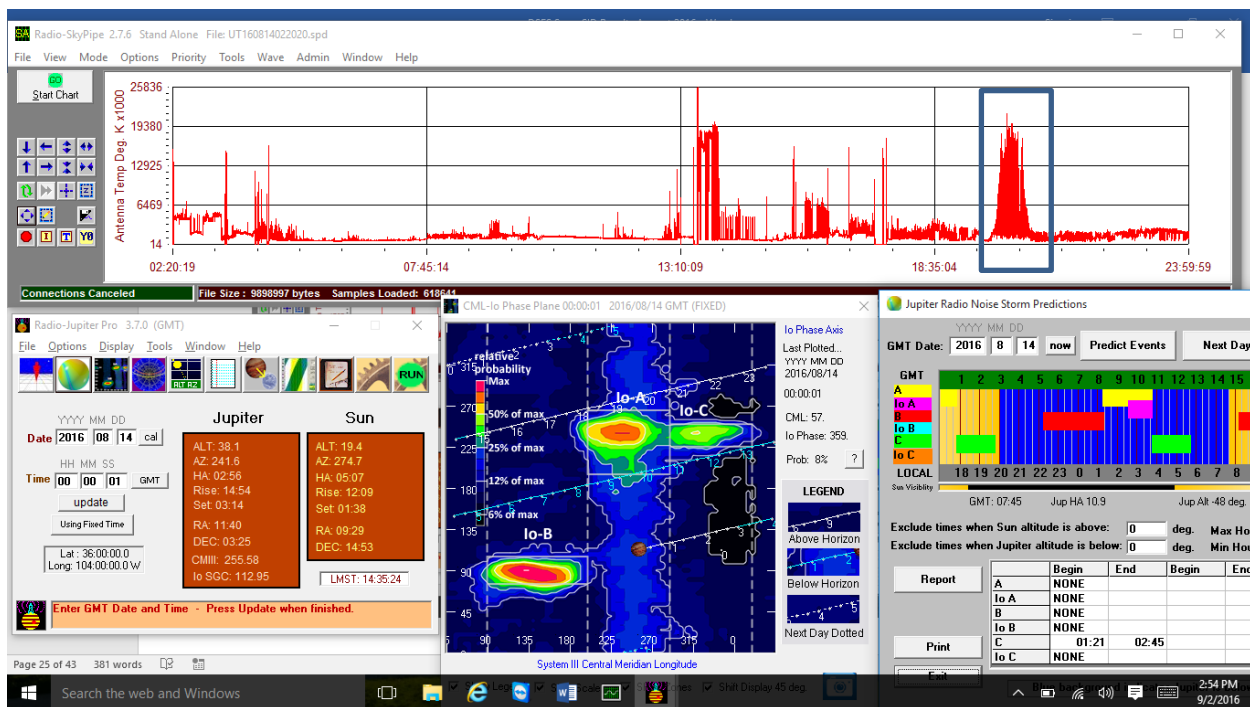
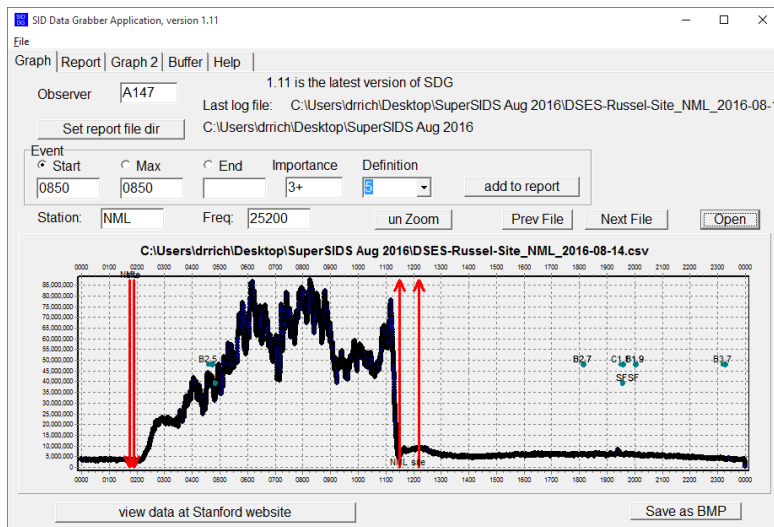


Note: No correlation with SID flares

August 14, 2016

Results: Possible detection at 1930z with C flare

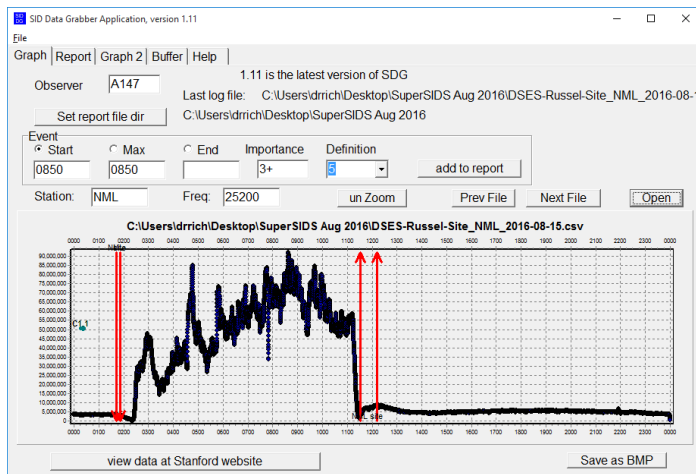
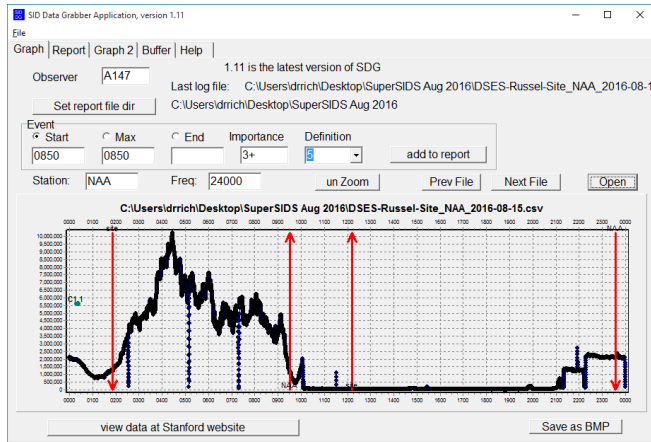


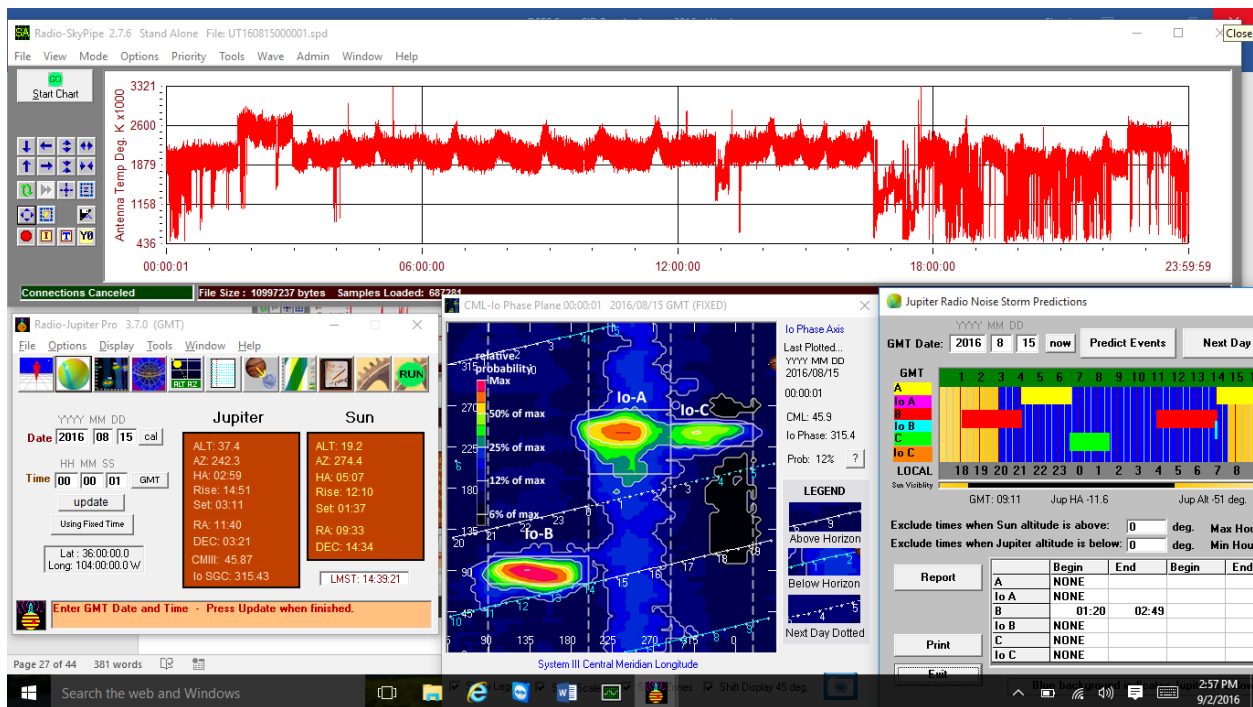


Note: Possible correlation of flare at 1930z

August 15, 2016

Results: No flares detected

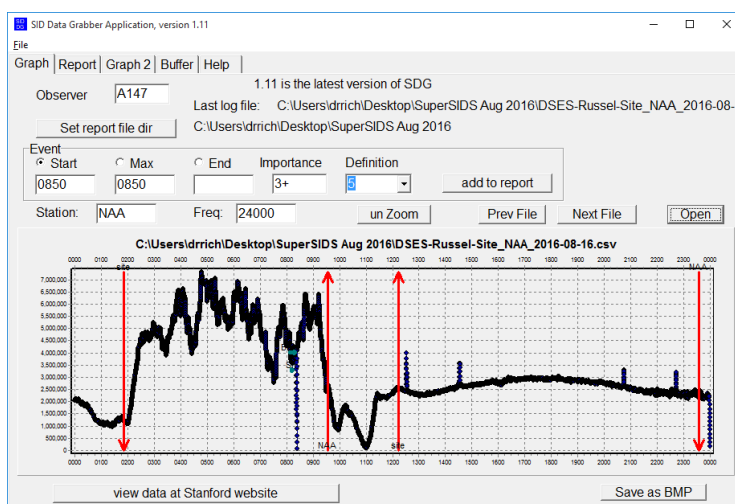


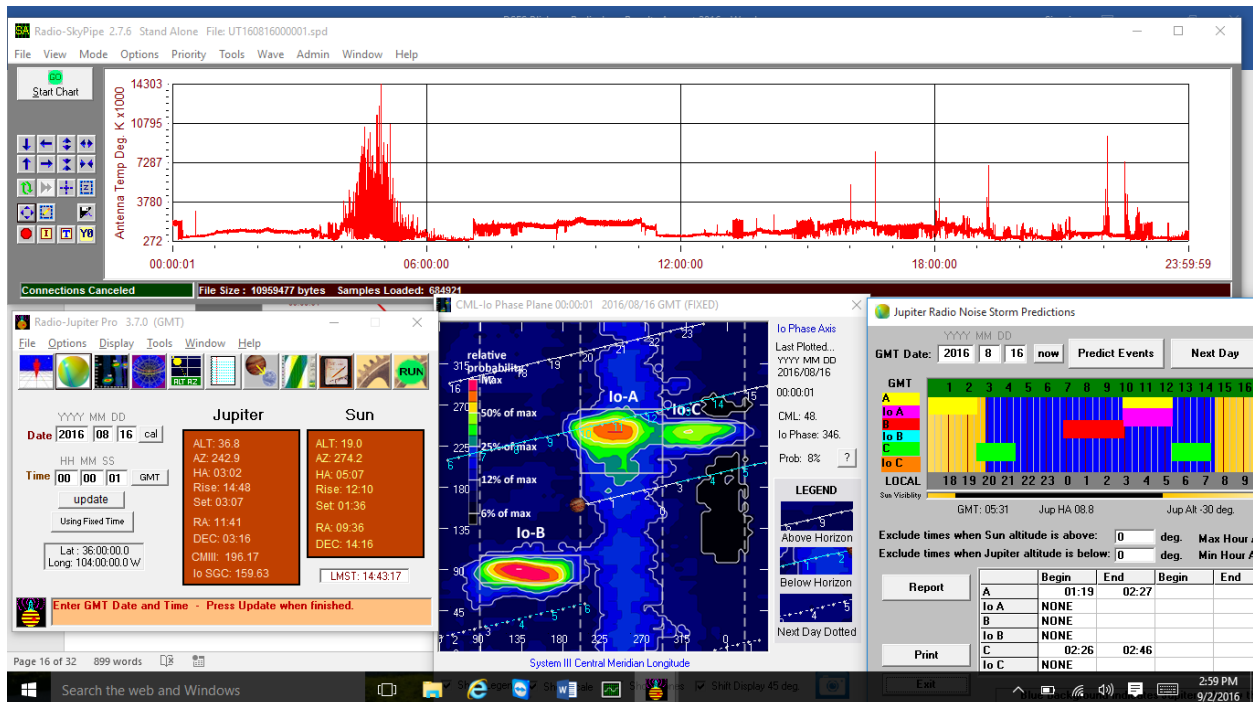
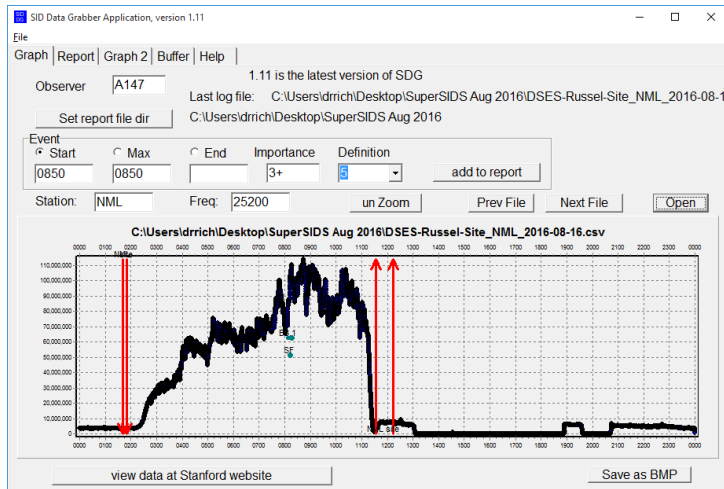


Note: Bad noise on this file

August 16, 2016

Results:

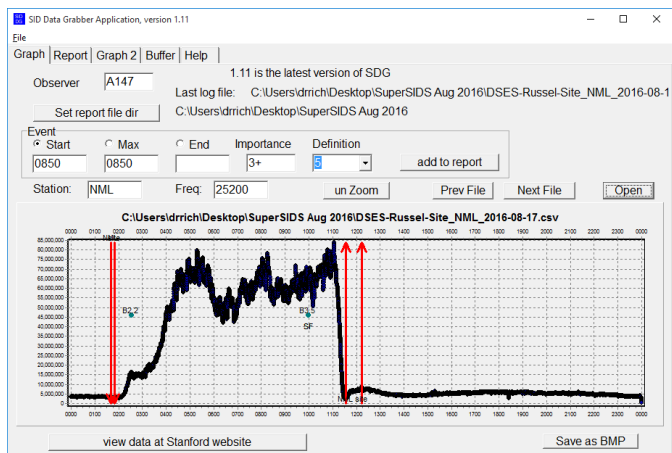
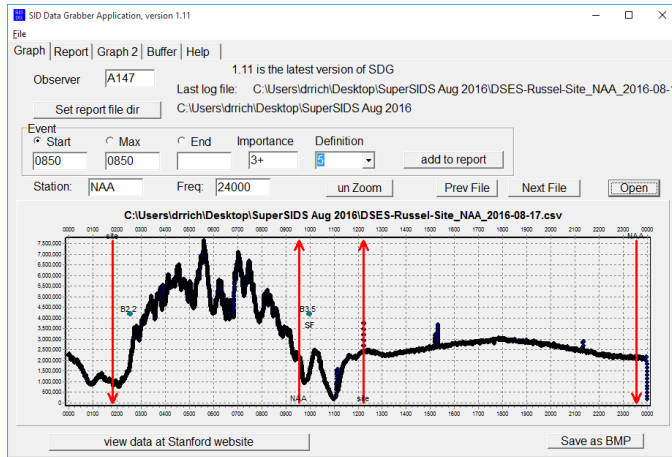


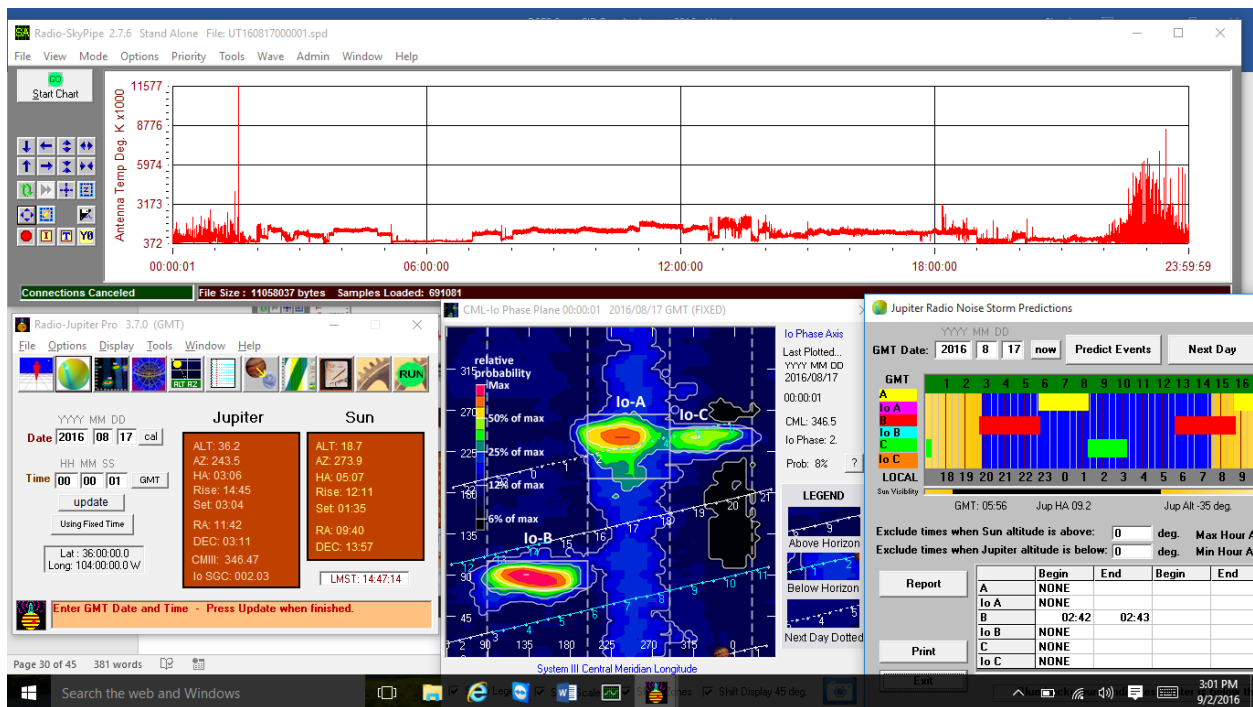


Note: No correlation with flares

August 17, 2016

Results: No flares detected

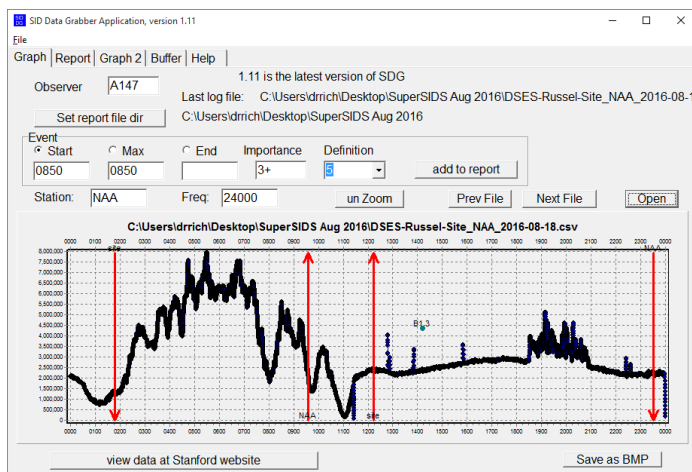


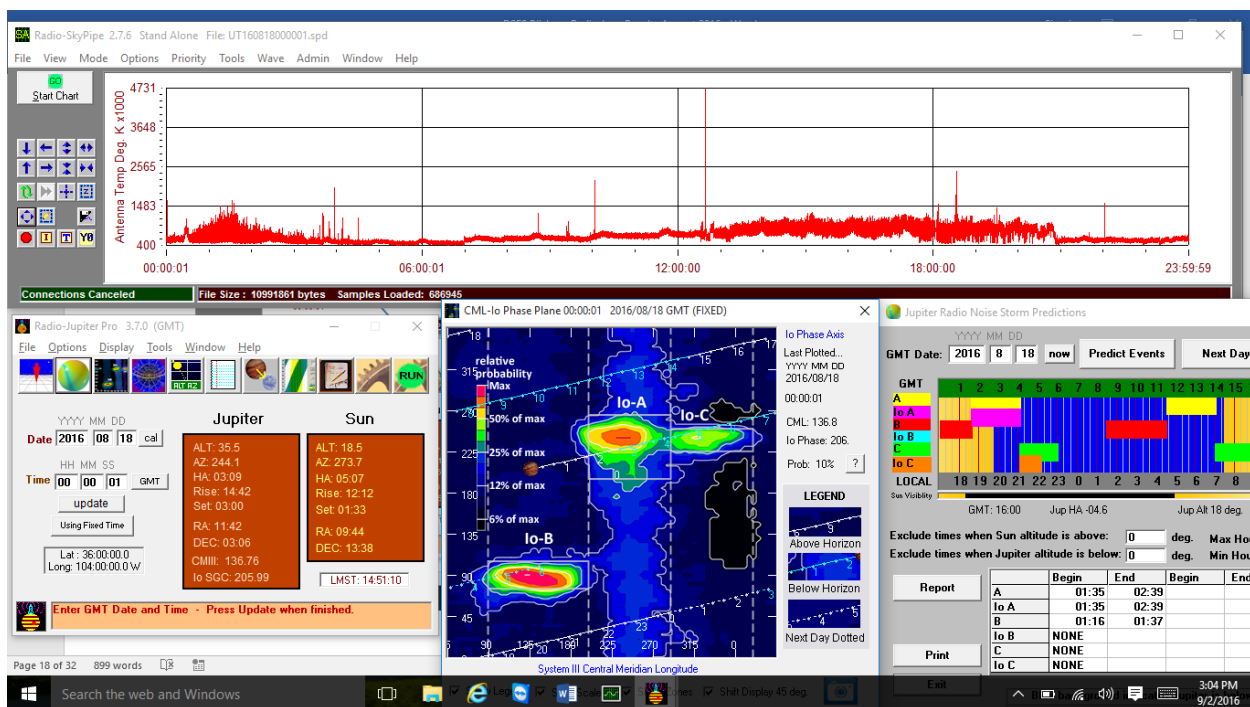
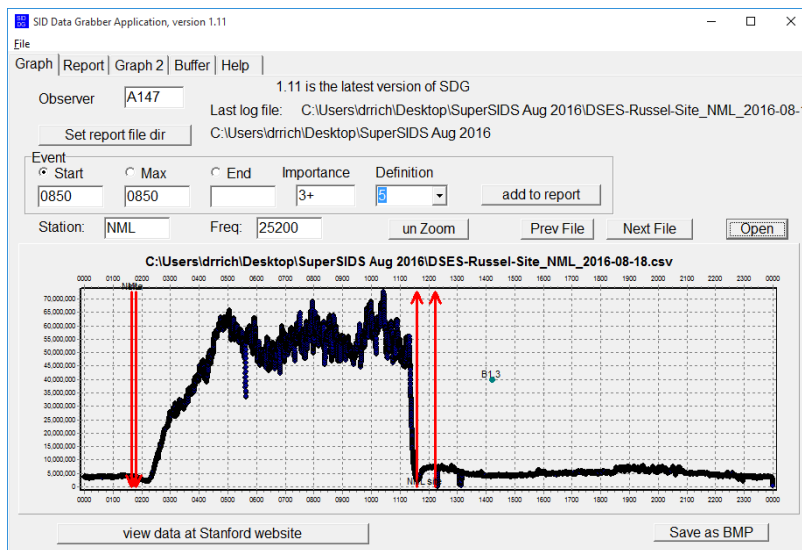


Note: No correlation with flares

August 18, 2016

Results:

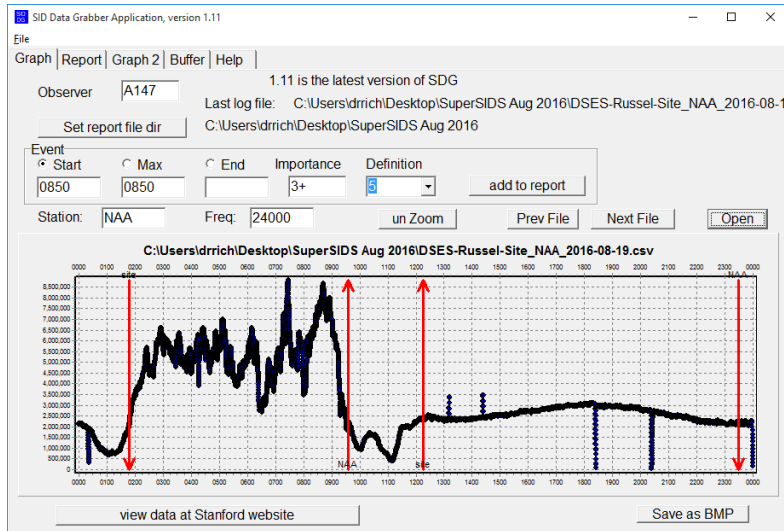


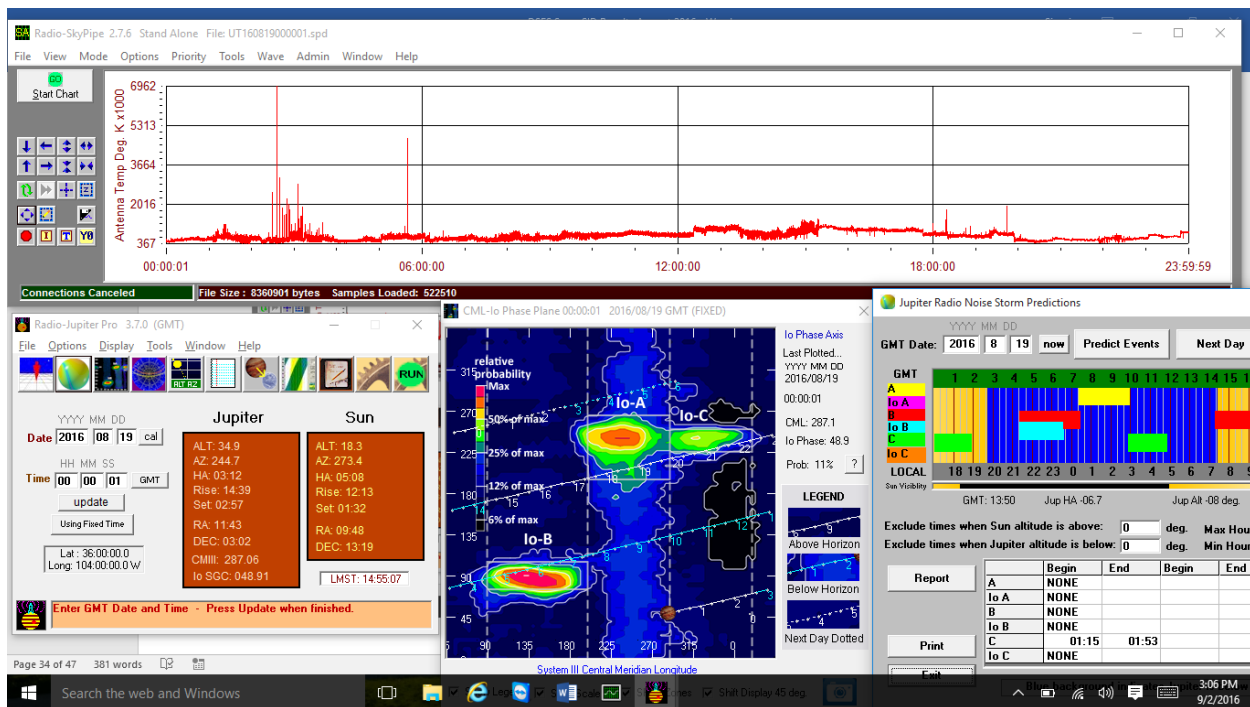


Note: No correlation with flares

August 19, 2016

Results: No flares detected

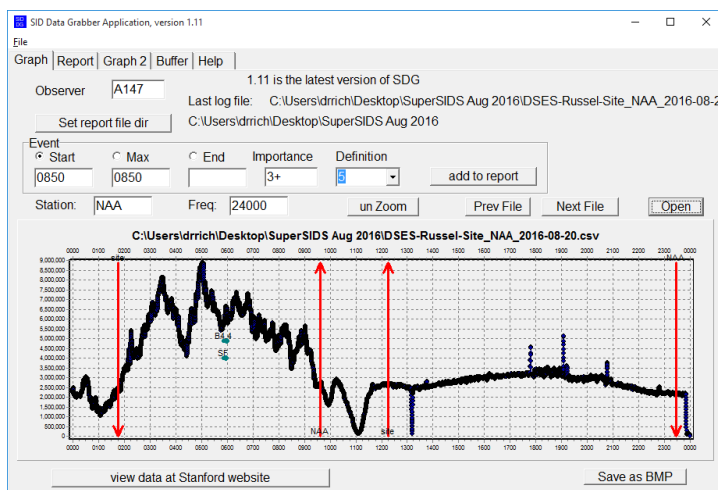


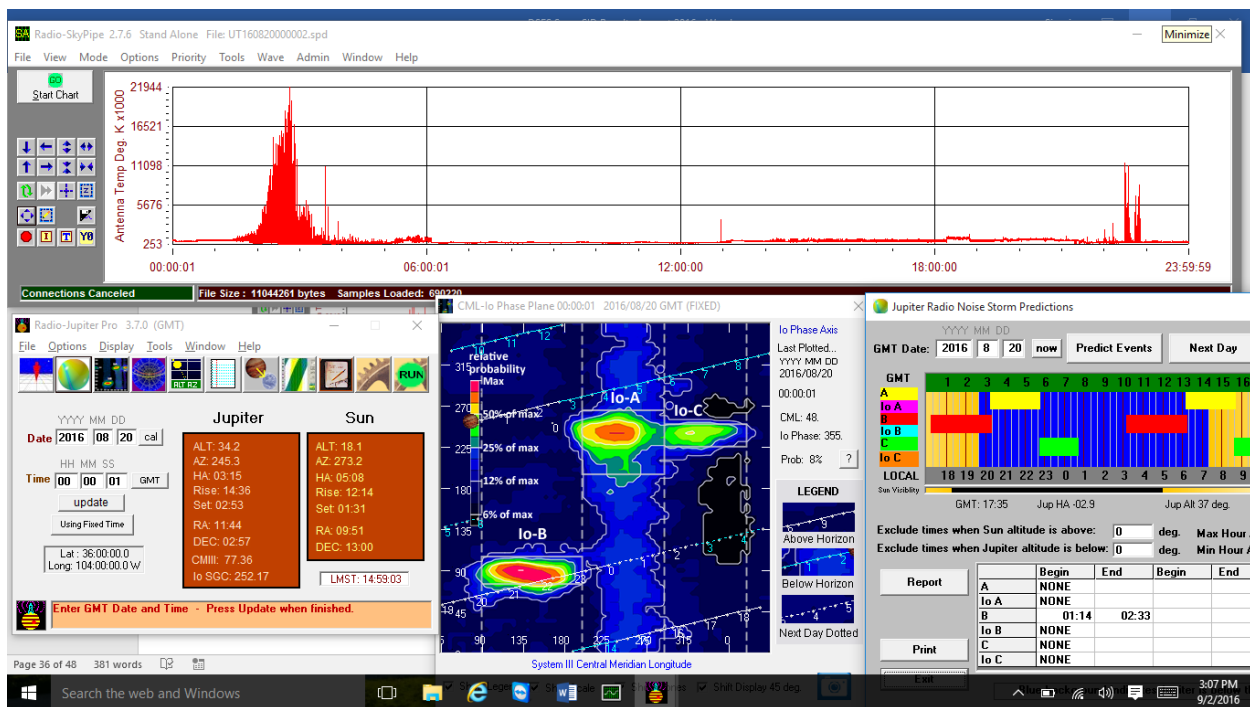
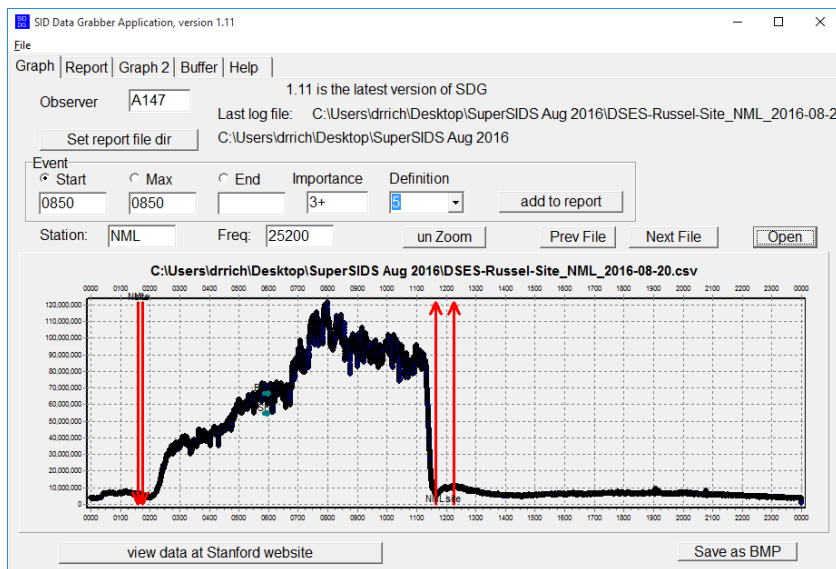


Note: No correlation with flares

August 20, 2016

Results: No flares detected

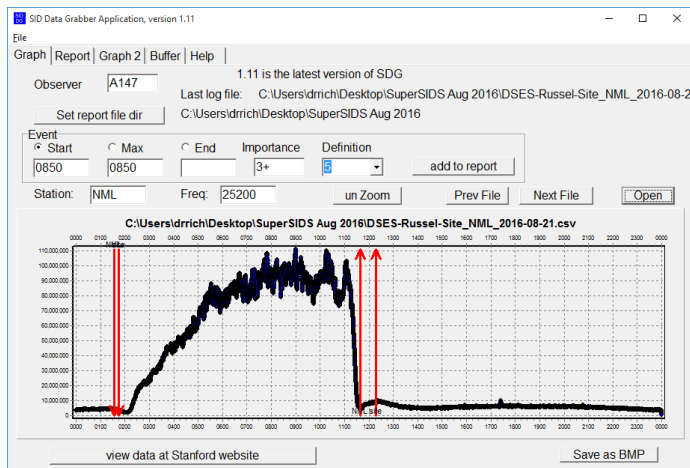
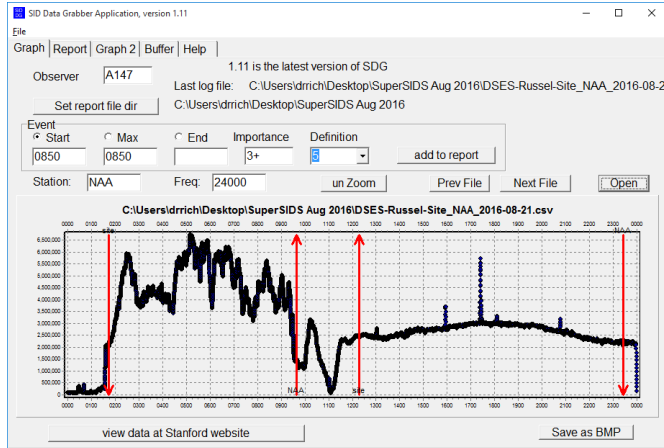


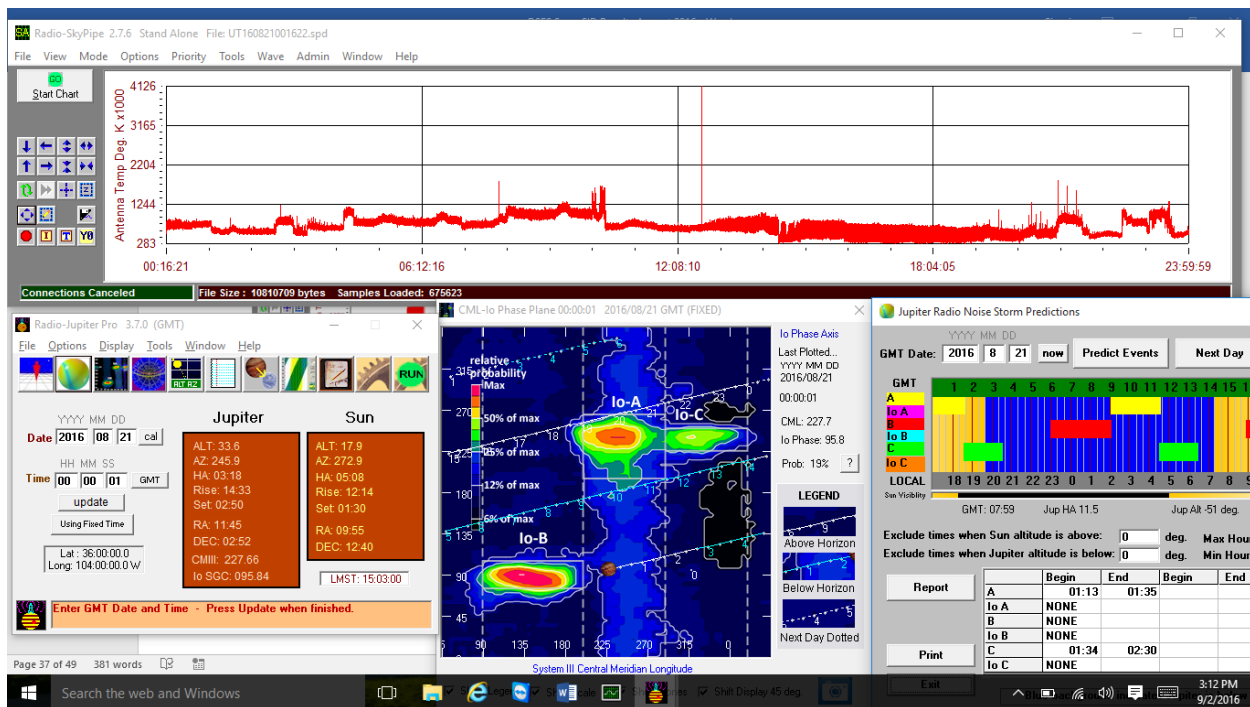


Note: No correlation with flares detected

August 21, 2016

Results: No flares detected



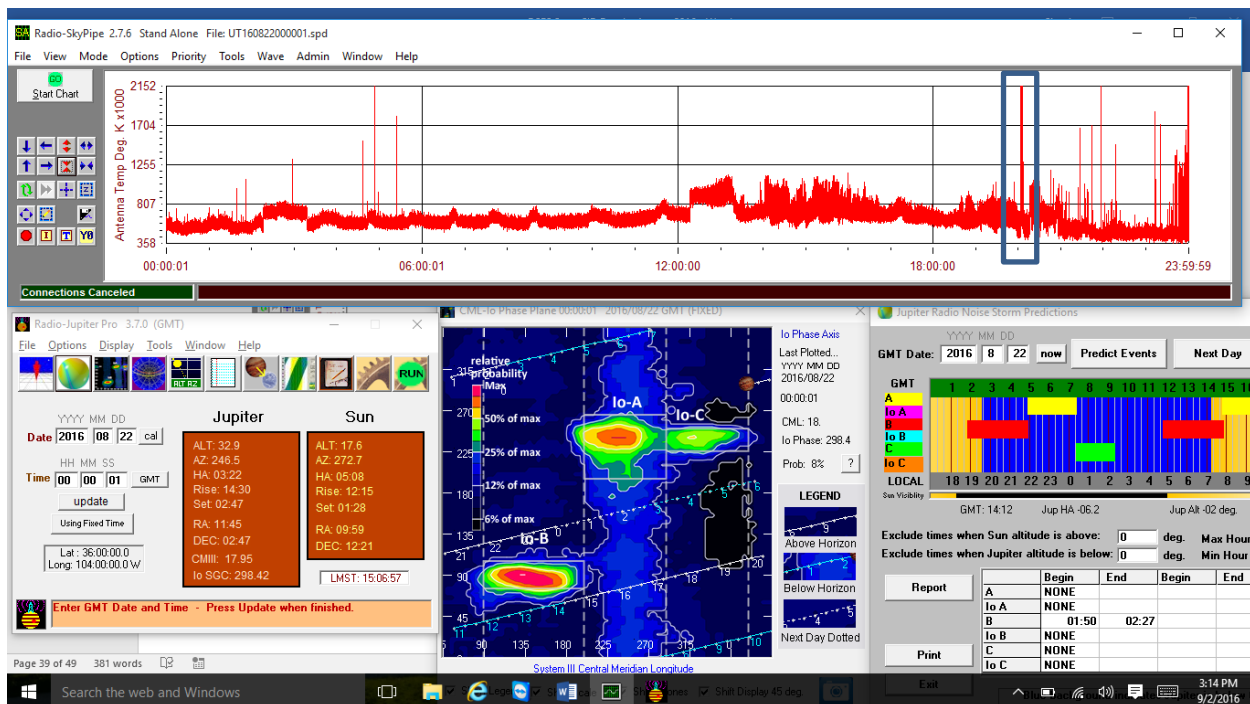
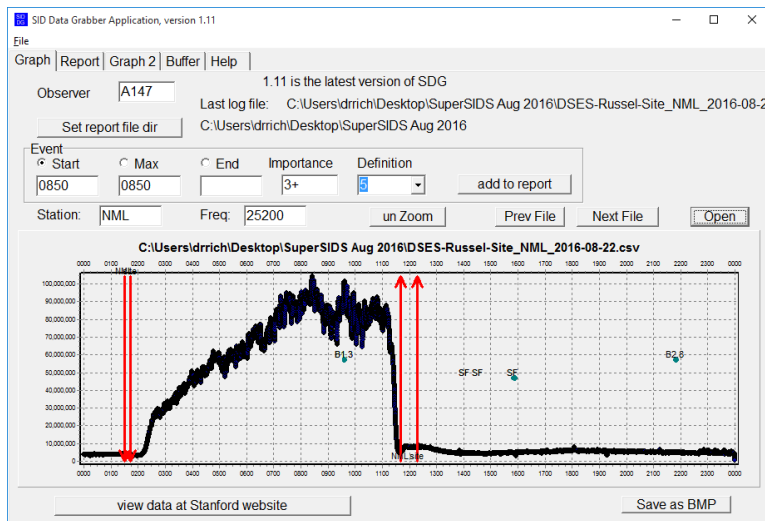


Note: No correlation with flares detected

August 22, 2016

Results: No flares detected – highest expected flare was B2.8

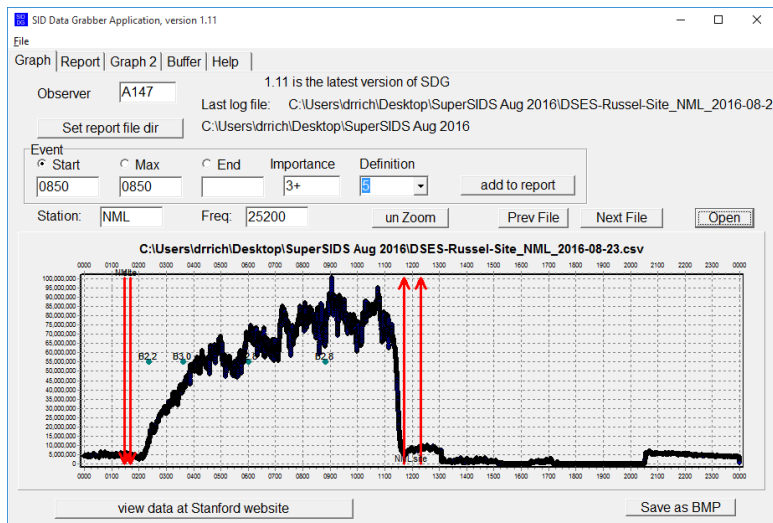
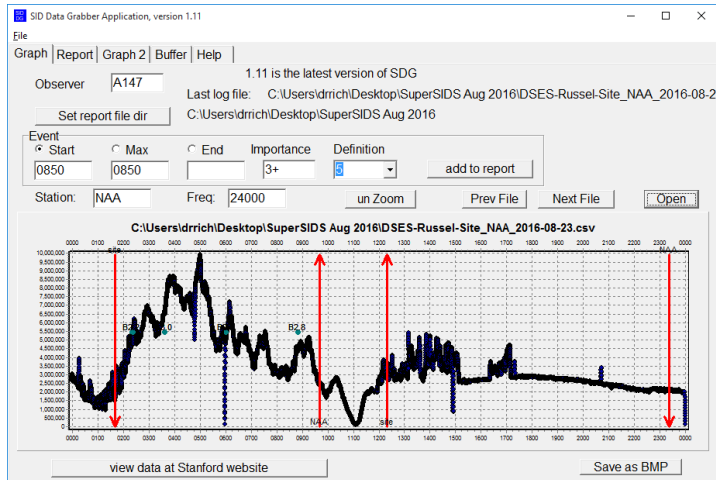


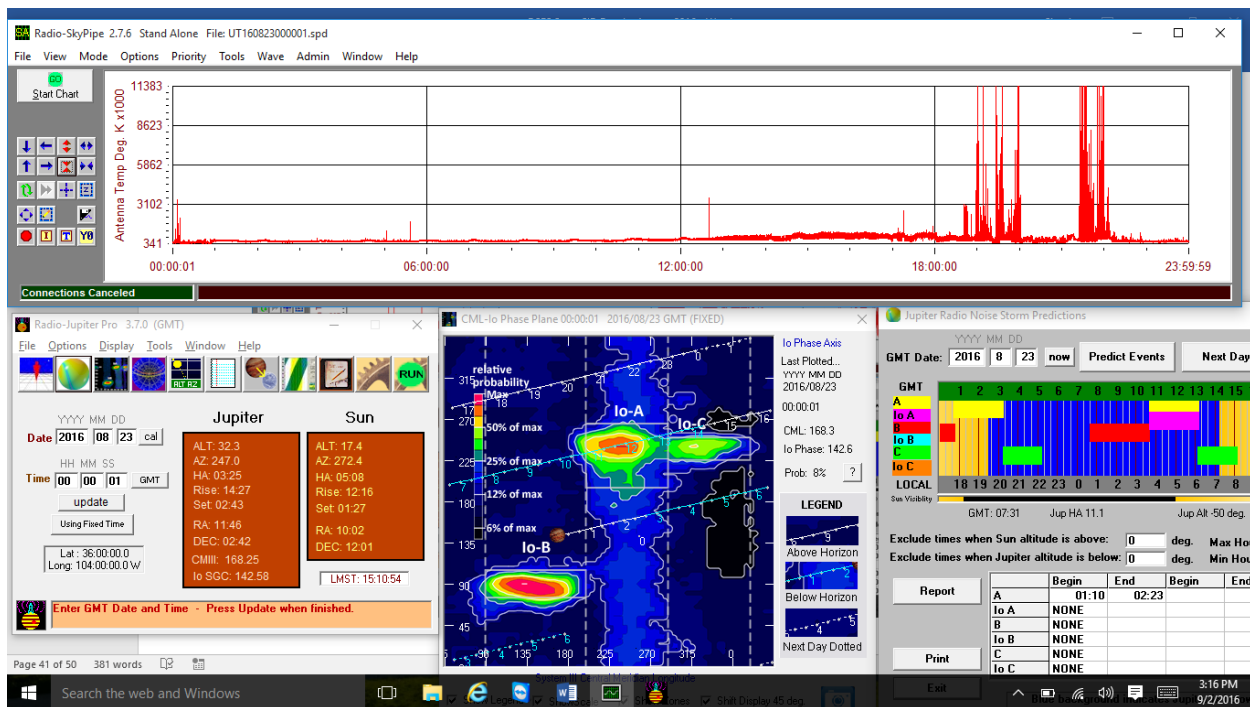


Note: Possible flare detection of B2.8 around 2000z

August 23, 2016

Results: No flares detected

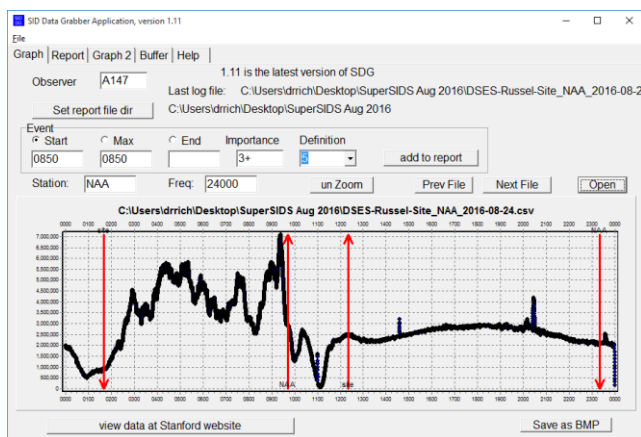


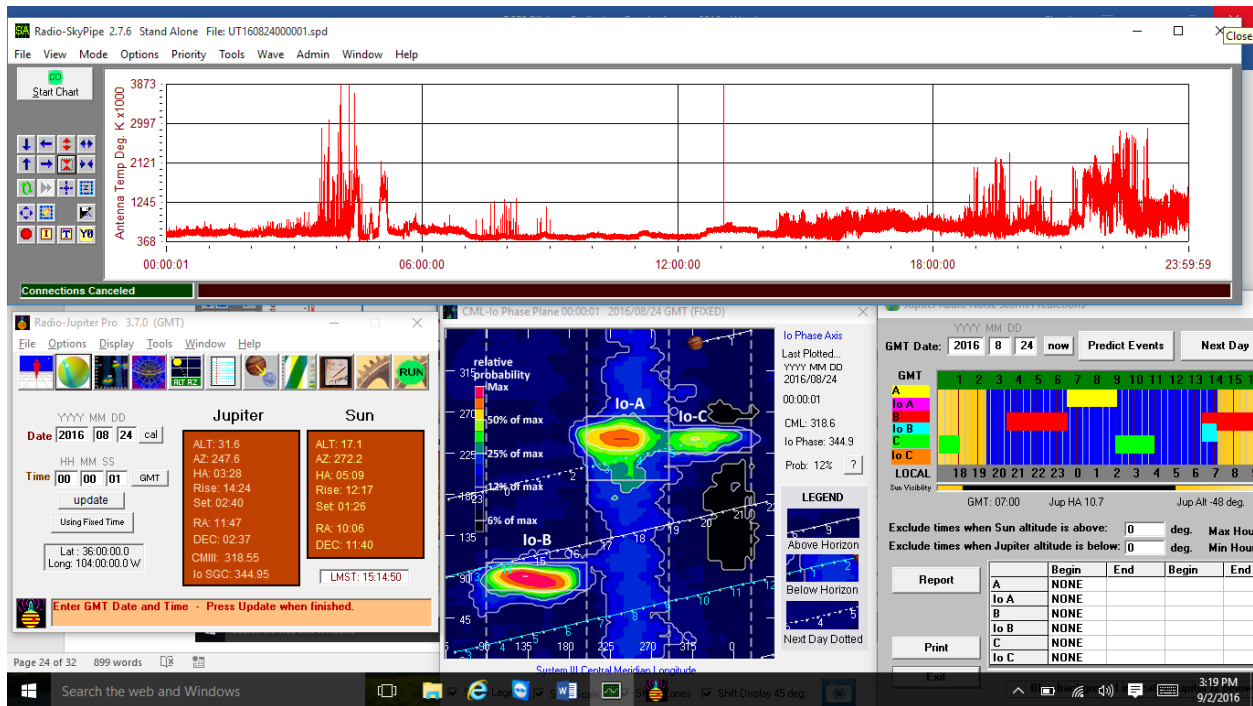
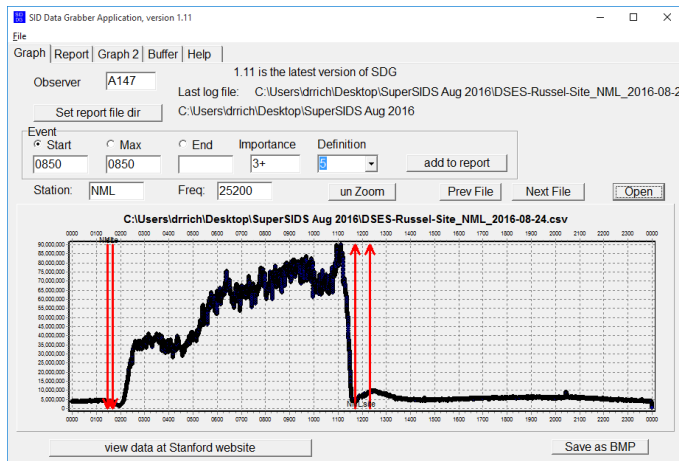


Note: No flares detected

August 24, 2016

Results: No flares detected

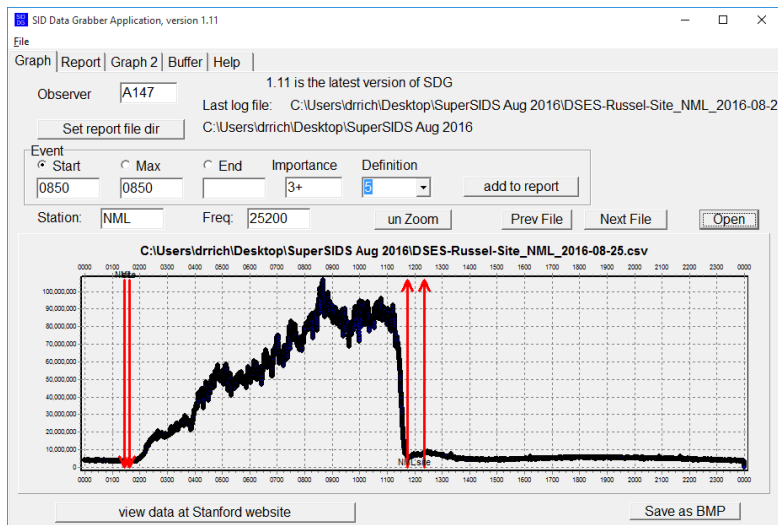
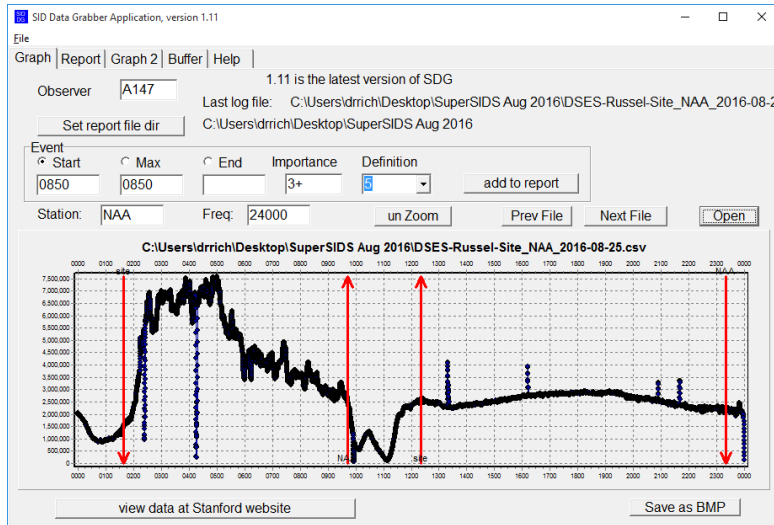


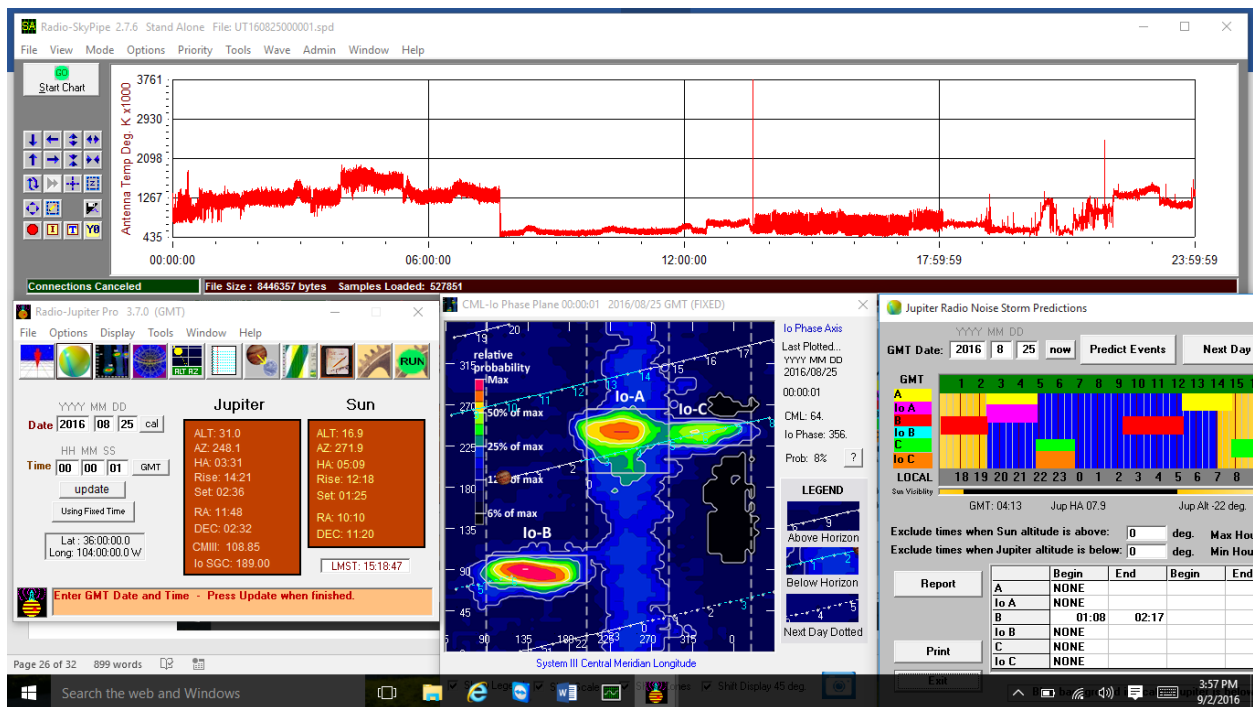


Note: No correlation of flares detected

August 25, 2016

Results: No flares detected

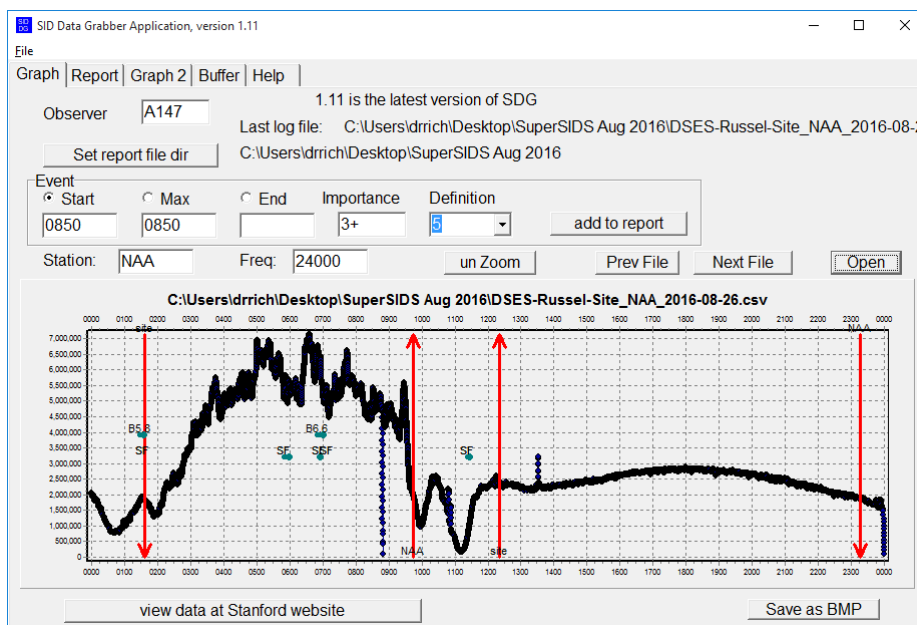


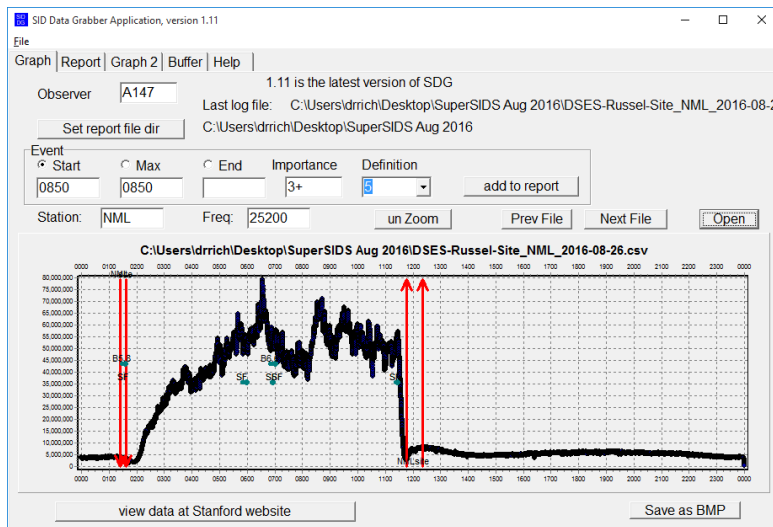


Note: No correlation with flares detected

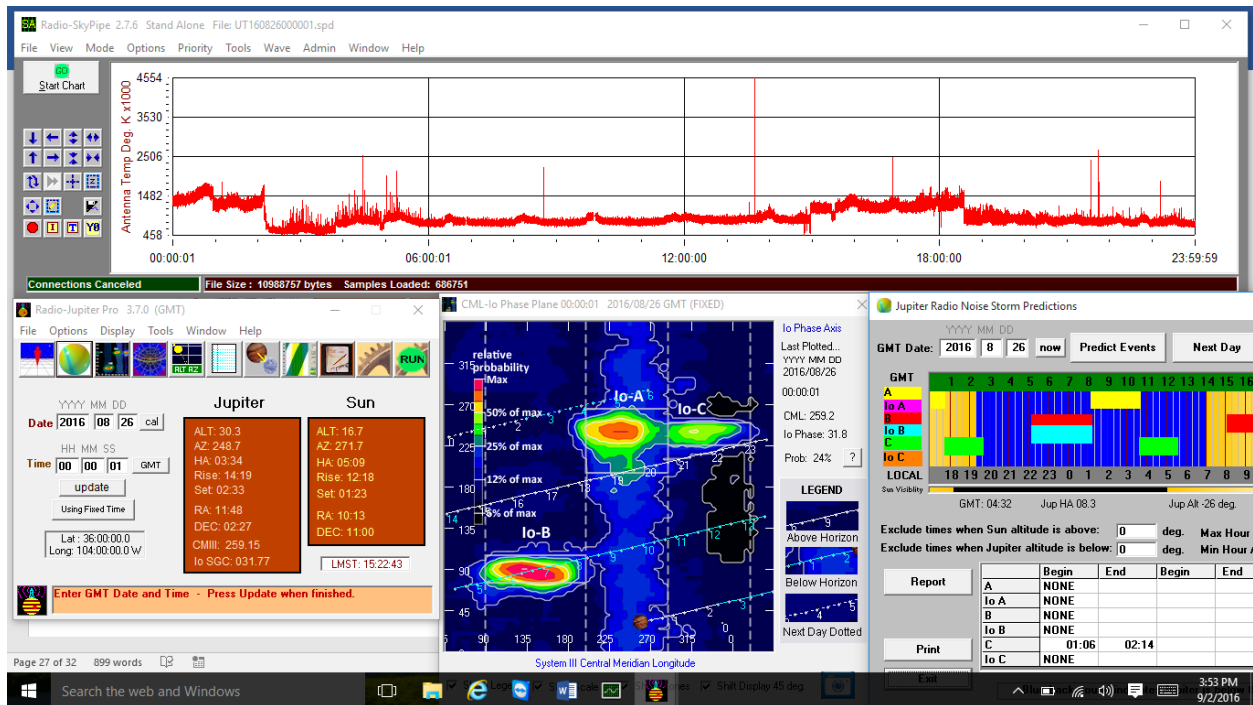
August 26, 2016

Results: No flares detected





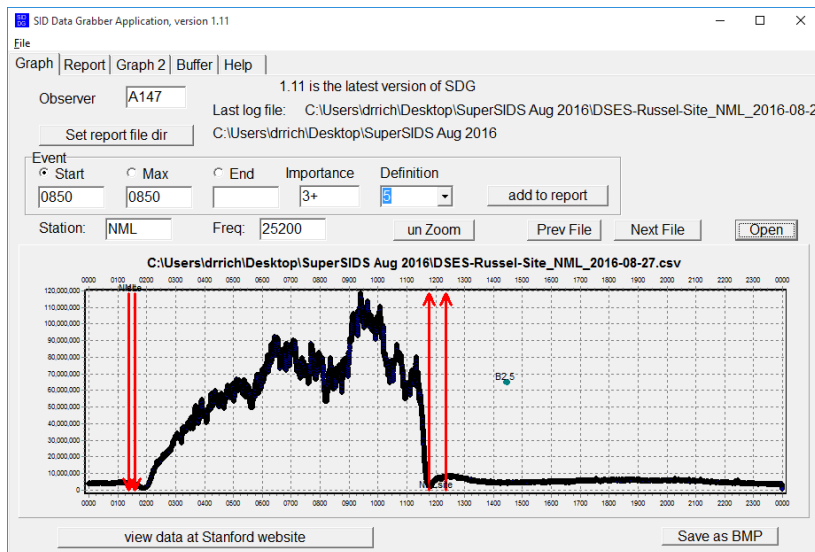
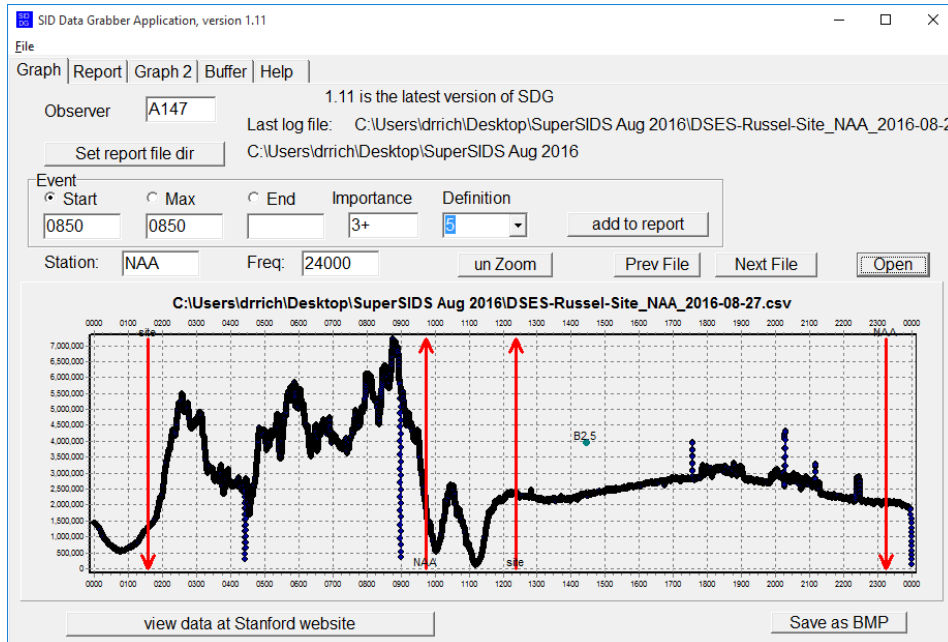
: N

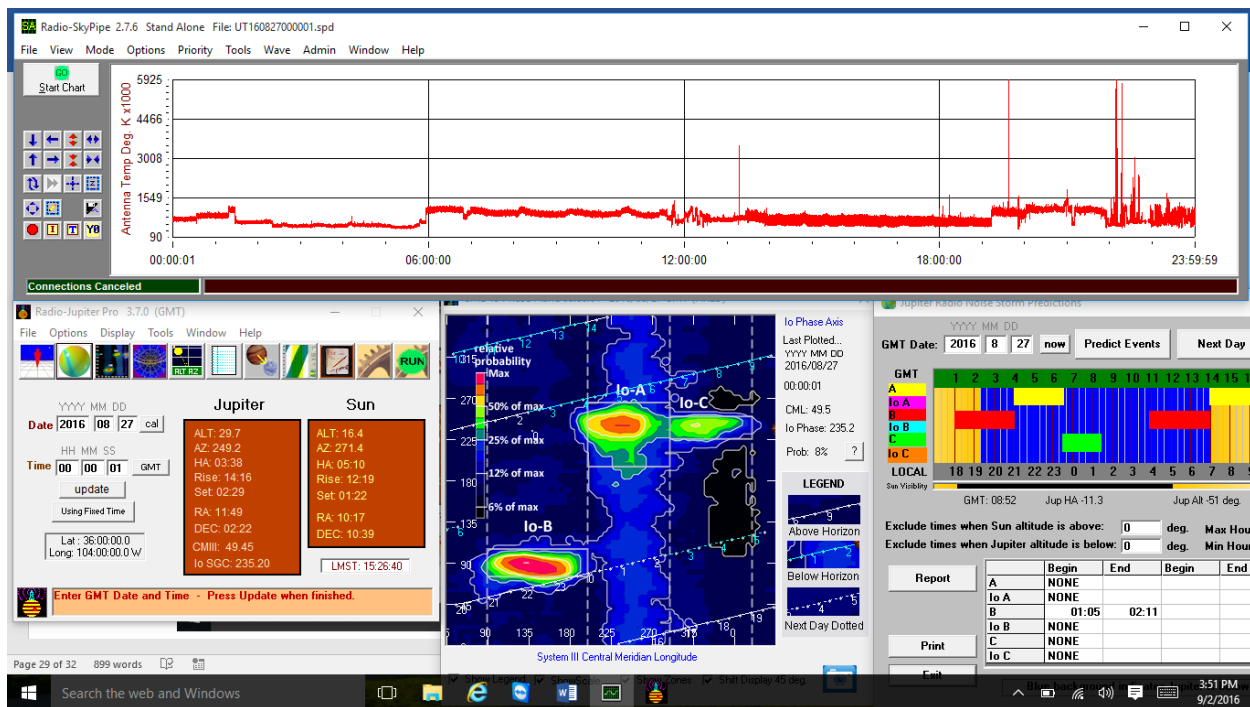


Note: No correlation with flares

August 27, 2016

Results: No flares detected

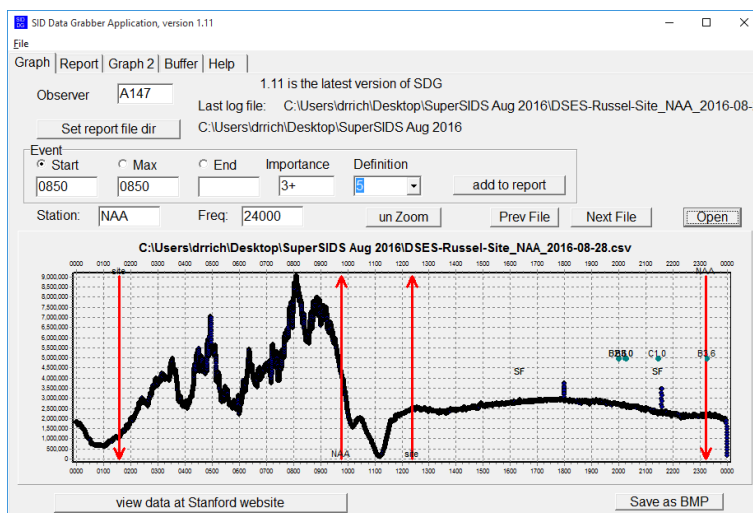


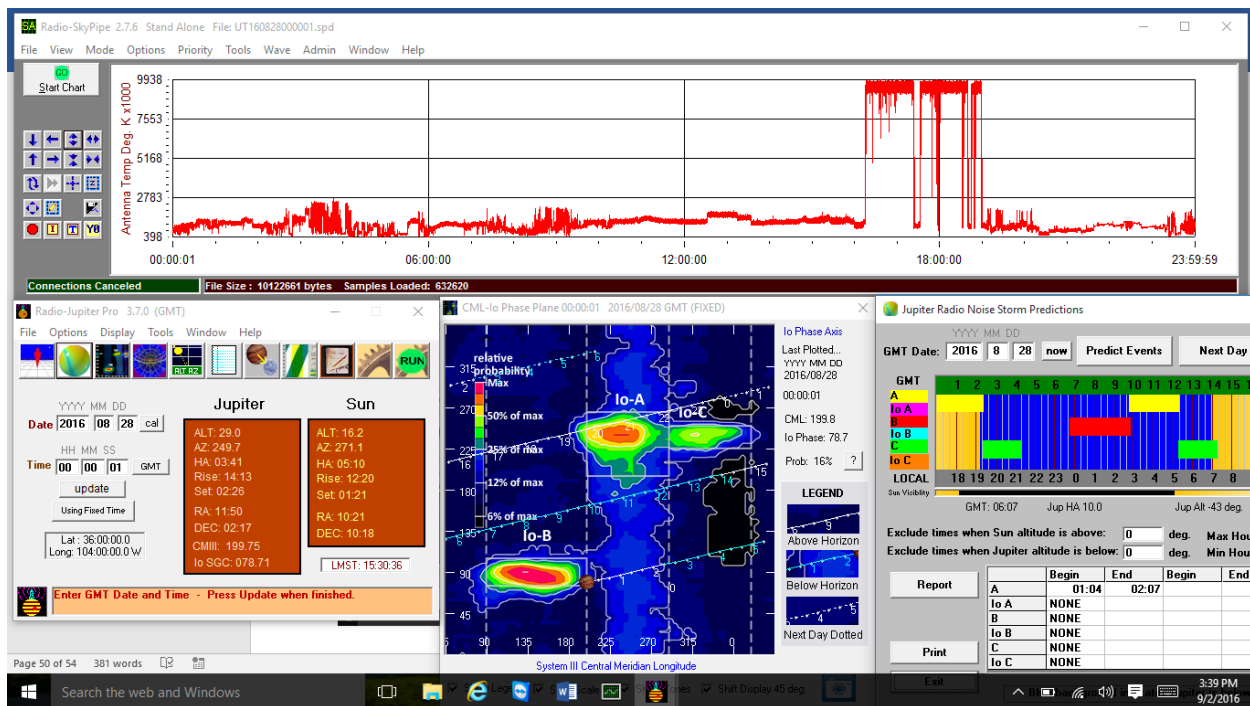
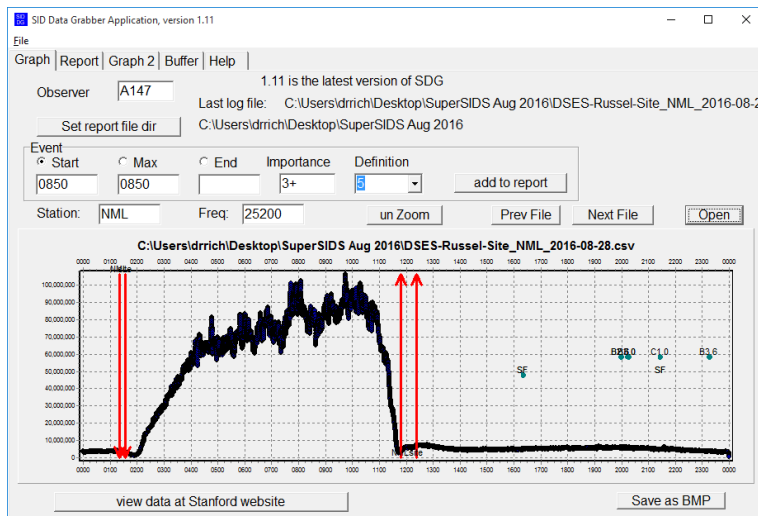


Note: No correlation to flares

August 28, 2016

Results:

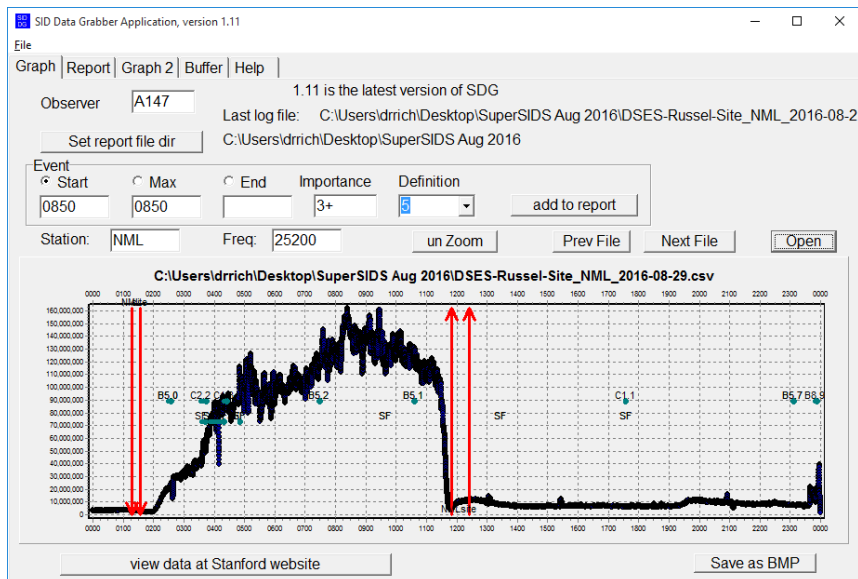
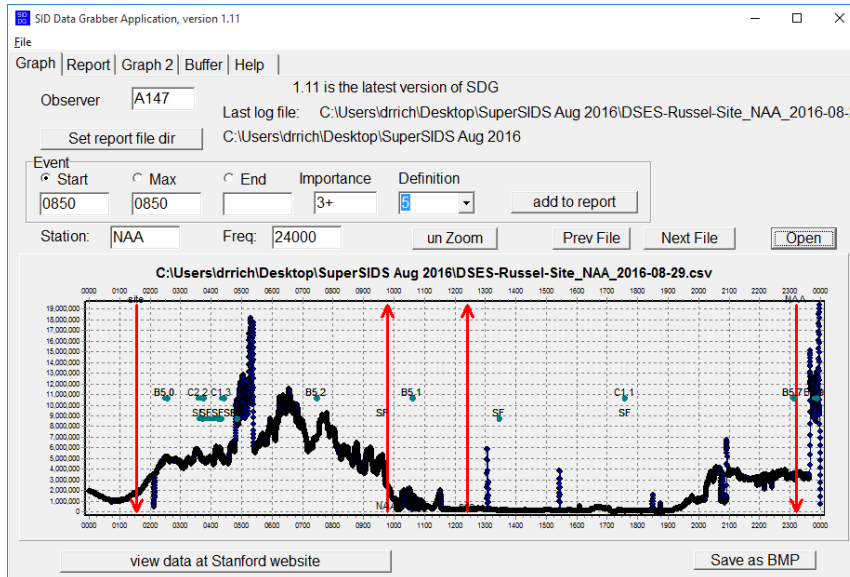




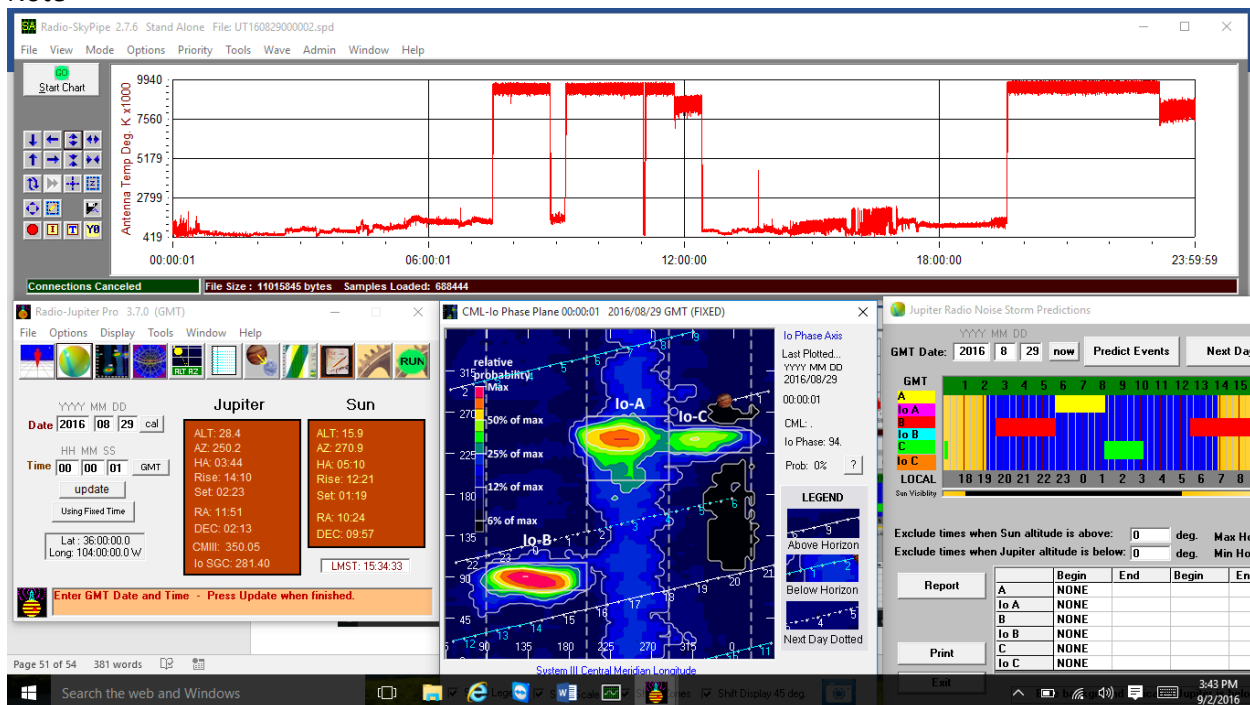
Note: No correlation to flares

August 29, 2016

Results: No flares detected – highest expected flare was C1.0



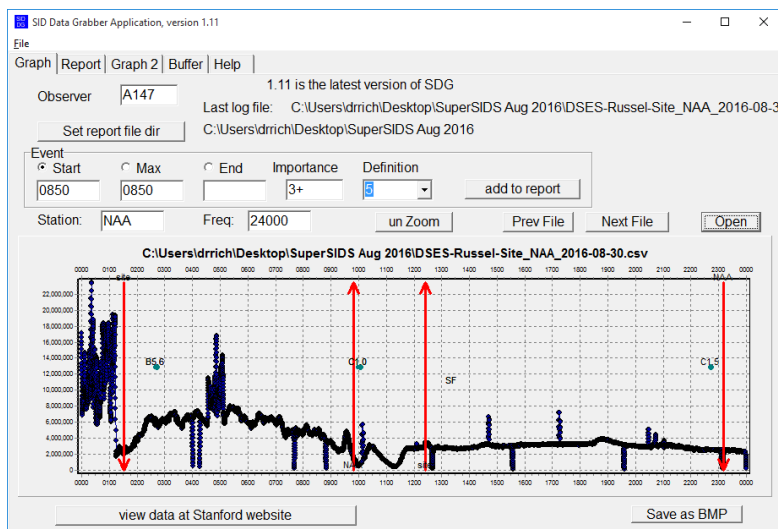
Note

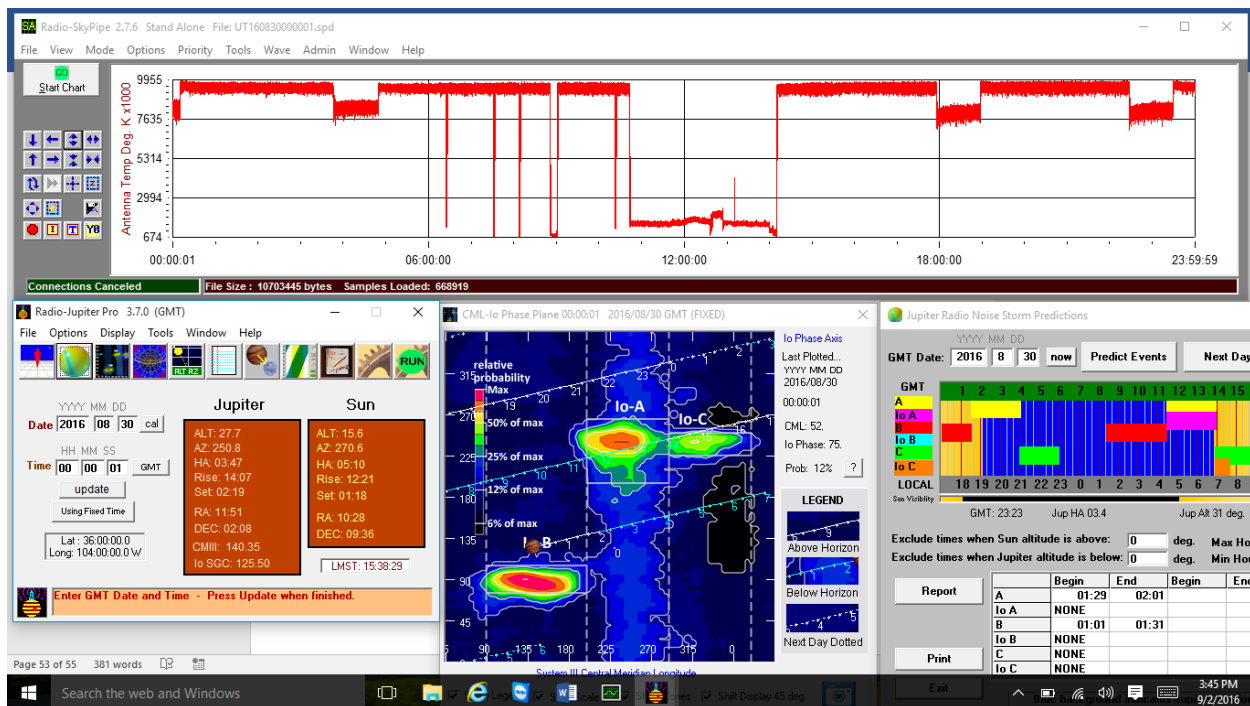
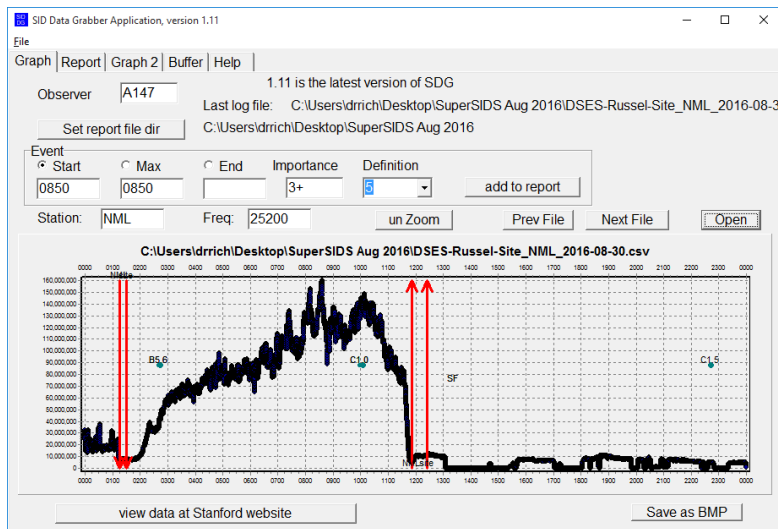


Note: No correlation to flares

August 30, 2016

Results:

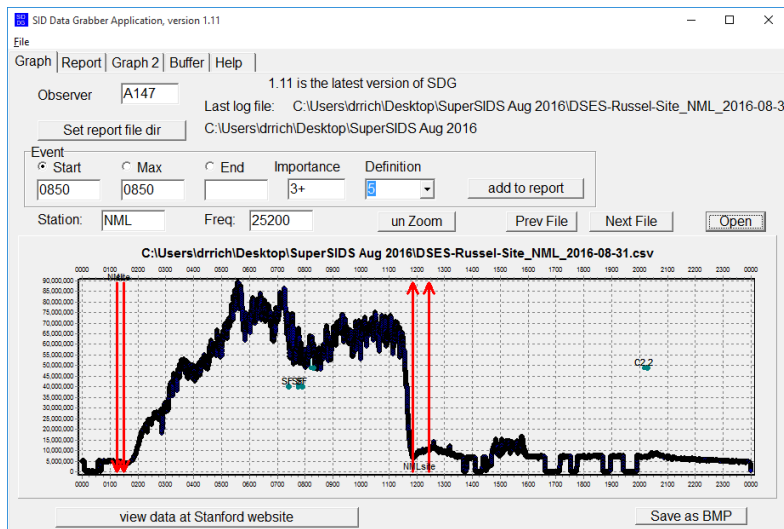
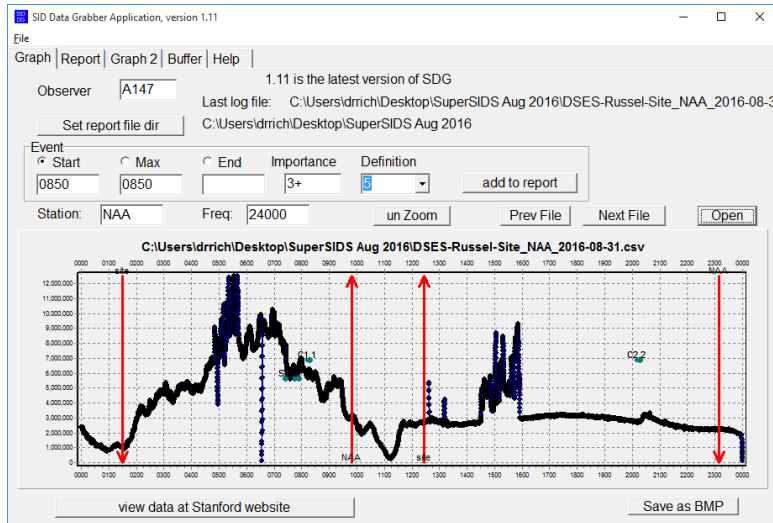


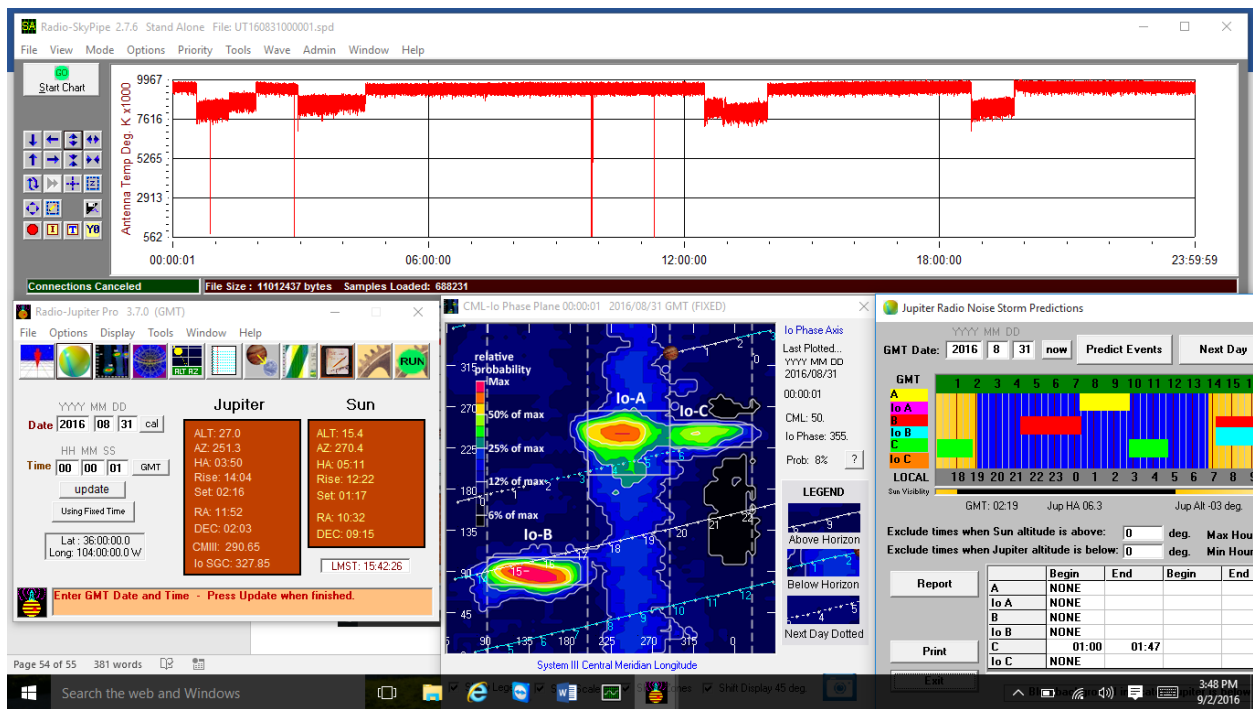


Note: No correlation to flares

August 31, 2016

Results: A C2.2 SID detected





Note: No correlation to flares