

NOAA • AOC • SED N42RF AVAPS DROP LOG

Lead Tech: Mike Mascaro

Project: Hurricane 2019

Mission: DORIAN

Flight ID: 20190903 HZ

Take Off: _____

Landing: _____ Flt Dir: Holmes

Drop #	Sonde Serial #	Rcvr #	Press Offset	Launch Time	Operator	Charge \$\$ To	Comments	Good ?
1	185130150	1	0		JG	NWS		✓
2	185120649	2	-0.7	0826				✓
3	191020562	3	-0.7	0835				✓
4	185130650	4	-0.5	0849				✓
5	191010446	5	-0.6	0859				✓
6	185130871	6	-0.4	0937				✓
7	191020565	7	-0.7	0952		NWS		✓
8	191050401	8	-0.6	0958	JG	NWS	RMW	✓
9	191040507	9	-0.5	1018		NWS	MID point	✓
10	185120849	2	-0.3	1032			NO DEW No Humidity	NO PTW (X)
11	1910930032	3	-0.6	1033				✓
12	185120857	4	-0.4	1056				✓
13	185120874	5	0	1110				✓
14	190950627	6	0	1130				✓
15	185120847	7	0	1149				✓
16	185120863	8	-0.4	1221				✓
17	191050479	1	-0.4	1230				✓
18	1910040458	2	-0.2	1237				✓
19	1910050232	3	-0.4	1249				✓
20	191040457	4	-0.3	1303			NO GPS	(X) (X)
21	185120860	5	0	1304		NWS		✓
22	19110079	6	-0.4	1327		NESDIS		✓
23	185120854	7	-0.5	1336		NESDIS	ended @ 695 meters early	✓
24	19110506	8	-0.5	1347		NWS	noat drop.	✓
25	191040462	1	-0.3	1354		NWS		✓
26	19111008	2	-0.4	1358				✓
27	191040511	3	-0.3	1403				✓
28	191050063	4	-0.4	1408				✓
29	191040482	5	-0.6	1412		NWS		✓
30	185120859	6	-0.4					
31								
32								
33								
34					JG			

Drop #	Sonde Serial #	Rcvr #	Press Offset	Launch Time	Operator	Charge \$\$ To	Comments	Good ?
35								
36								
37								
38								
39								
40								
41								
42								
43								
44								
45								
46								
47								
48								
49								
50								
51								
52								
53								
54								
55								
56								

Drop Station Operator Notes

Charge \$\$ To Options: AOC, NWS, NESDIS, SAT (Special NESDIS/HRD), IR/SST or HRD **ONLY – Do not use funding codes!!!**

AVAPS Pre-Flight Check:

- If time-permits, verify cabin pressure sensor w/ lab standard
- Start AVAPS., then start Soundings and set the Project Name and full Flight ID (example 2015011811).
- Update the Frequency band allocation as required:
Band A - W53rd, Band B - N42RF, Band C - N43RF, Band D - N49RF, Band E - not allocated
- Perform a prelaunch check on each channel, look for reasonable data and no CRC error status lights. Verify data is available on Remote AVAPS at the FD Station, then terminate the sonde by selecting **Abort** to cancel the sonde initialization. Verify the AVAPS Data mission folder has been created.
- **Verify AVAPS PC Time is correct**
- **Early launch detects are caused usually by remanufactured sondes with the chute riser line not properly coiled between the PCB ears. This may also cause fast falls. If this is suspected, repack the riser line as time permits**
- **Eyewall drop performance is improved when using sondes manufactured after 7/2016**
- **Perform RH Regeneration on all sondes – this must be done prior to sonde initialization -**

AVAPS Launch:

- Select a sonde frequency in the Green band and away from other sondes
- Enter sonde pressure error offset. The latest AVAPS inserts a default offset value. Adjust if pressure offset is 0.4 mB or greater
- **If the Cal lab pressure standard and the cabin pressure standard match, apply pressure offset +/- 0.1 mB**
- Select "begin data collection" and verify good data (including Winds) prior to putting sonde in launch tube
- Failure to keep good lock on GPS is likely due to the GPS antenna connector on the sonde PCB needing to be rotated away from surface mount components – do this if needed.
- Cut off about 1/2 of ribbon, loosen ribbon and extend end of ribbon to near, but not over, the sensor end of the sonde
- Place the sonde in the launch tube, sensor arm up, with the power pin socket facing starboard
- Verify the sonde is actively tracking GPS data prior to launch and no **Early Launch detect**