

Dropsonde Scientist

Flight ID 180830JI Storm M. Earl Dropsonde Scientist P. Leighton

The lead project scientist (LPS) on the P3 is responsible for determining the distribution patterns for dropwindsonde releases. Predetermined desired data collection patterns are illustrated on the flight patterns. However, these patterns often are required to be altered because of clearance problems, etc. Operational procedures are contained in the operator's manual. On the G-IV the sole HRD person is designated the LPS. The following list contains more general supplementary procedures to be followed. (Check off or initial.)

**Preflight**

*[Handwritten initials for Preflight steps 1-4]*

1. Determine the status of the AVAPS and HAPS or workstation. Report results to the LPS.
2. Confirm the mission and pattern selection with the LPS and assure that enough dropsondes are on board the aircraft.
3. Modify the flight pattern or drop locations if requested by AOC to accommodate changes in storm location or closeness to land.
4. Complete the appropriate preflight set-up and checklists.

**In-Flight**

*[Handwritten initials for In-Flight steps 1-4]*

1. Operate the system as specified in the operator's manual.
2. Ensure the AOC flight director is aware of upcoming drops.
3. Ensure the AVAPS operator has determined that the dropsonde is (or is not) transmitting a good signal. Recommend if a backup dropsonde should be launched in case of failure.
4. Report the transmission of each drop and fill in the Dropwindsonde Scientist Log.

**Postflight**

*[Handwritten initials for Postflight steps 1-5]*

1. Complete Dropwindsonde Scientist Log.
2. Brief the LPS on equipment status and turn in completed forms, dropwindsonde data tapes, DVDs, or CDs.  
[Note: all data removed from the aircraft by HRD personnel should be cleared with the AOC flight director.]
4. Debrief at the base of operations.
5. Determine the status of future missions and notify MGOC as to where you can be contacted.

N42/3RF HRD GPS Dropwindsonde Scientist Log (Revised 5/2002)

Storm H. Earl Dropwindsonde Scientists P. Leighton Page 1 of 1  
 Flight ID 100830J1 Flight Director Jan Sears / Paul Haherty Takeoff from Bidos at 1931 UTC  
 Mission ID HX 07A Earl AVAPS Operators Moricano / Nabe / Reed Recovery at Bidos at      UTC

Drop #	Sonde ID #	Time (UTC)	Lat (°N)	Lon (°W)	Surface Pressure (mb)	Wind closest to surface		BT SST (°C)	Eye, Eyewall, Rainband (direction)	Comments	Ob #
						dir/spd	hgt (m)				
1	094735018	2047	18 25	63 09	1004.8	167/22	17	-		120' ESE start leg 1	14
2	094735772	2110	19 18	64 36	940.6	152/11.3	9	-	EWall ESE	FAST FALL	-
3	094735003	2109	19 18	64 48	941.3	111.1	7	-	Eye	end leg 1	18
4	100155317	2117	19 25	65 02	952.2	320/39	-2	-	WOW Eyewall	start leg 2	21
5	094735723	2141	20 07	66 36	1001.3	2121	2	-	WOW	End of leg 2	23
6	094735012	2200	18 34	66 24	999.3	296/16	18.5	-	WSW	start leg 3	27
7	094735194	2210	18 36	65 45	991.3	311/23	8	-	SW	mid part leg 3	28
8	100145264	2220	19 18	65 5	950.6	238 <sup>50</sup> /31.6	1.2	-	WSW	Eyewall end leg 3	31
9	100145258	2225	19 26	64 44	-	-	-	-	NE	FAST FALL NO TINT Eyewall start leg 4	-
10	100145022	2248	20 18	63 23	1005.3	109/3	6	-	NE	End of leg 4	35
11	095035050	2309	21 00	65 00	1001.5	68/21	12	-	N	start leg 5	40
12	094735047	2331	19 40	65 06	944.8	61/40	3.7	-	Neye wall		43
13	094735678	2334	19 30	65 10	936.9	169/4	8.5	-	Eye	Eye	44
14	100145216	2339	19 10	65 10	970.5	243/4	9.8	-	S	Eyewall	45
15	094735708	2403	17 40	65 12	1002.7	231/4	5.6	-	S	End leg 6	50