Lead Project Scientist

Storm or Project Irene **Experiment name** TPR
Flight ID 110826I1 **Mission ID** _____

Preflight

_____ 1. Participate in general mission briefing.

_____ 2. Determine specific mission and flight requirements for assigned aircraft.

_____ 3. Determine from AOC flight director/meteorologist whether aircraft has operational fix responsibility and the mission designation.

_____ 4. Contact HRD members of crew to:
a. Assure availability for mission.
b. Review field program safety checklist
c. Arrange ground transportation schedule when deployed.
d. Determine equipment status.

_____ 5. Meet with AOC flight director and navigator at least 3 hours before take-off for initial briefing.

_____ 6. Meet with AOC flight crew at least 2 hours before take-off for crew briefing. Provide copies of flight requirements and provide a formal briefing for the flight director, navigator, and pilots.

_____ 7. Report status of aircraft, systems, necessary on-board supplies and crews to MGOC in Miami.

_____ 8. Before take-off, brief the on-board GPS dropsonde operator on times and positions of drop times.

_____ 9. Make sure each HRD flight crew member has a life vest.

_____ 10. Perform a headset operation check with all HRD flight crew members. Make sure everyone can hear and speak using the headset.

In-Flight

_____ 1. Confirm from AOC flight director that satellite data link is operative (information).

_____ 2. Confirm camera mode of operation.

_____ 3. Confirm data recording rate.

_____ 4. Complete Lead Project Scientist Form.

_____ 5. Check in with the flight director to make sure the mission is going as planned (i.e. turns are made when they are supposed to be made).

Post flight

_____ 1. Debrief scientific crew.

_____ 2. Gather completed forms for mission and turn in to data manager at HRD.

_____ 3. Obtain a copy of the 10-s flight listing from the AOC flight director. Turn in with completed forms.

_____ 4. Obtain a copy of the radar DAT tapes. Turn in with completed forms.

_____ 5. Obtain a copy of serial flight data on thumb drive. Turn in with completed forms.

[**Note**: all data removed from the aircraft by HRD personnel should be cleared with the AOC flight director.]

_____ 6. Report landing time, aircraft, crew, and mission status along with supplies (tapes, *etc*.) remaining aboard the aircraft to MGOC.

_____ 7. Determine next mission status, if any, and brief crews as necessary.

_____ 8. Notify MGOC as to where you can be contacted and arrange for any further coordination required.

_____ 9. Prepare written mission summary using **Mission Summary** form.

Lead Project Scientist Check List

Storm or Project Irene **Experiment name** TDR

Flight ID 110826I1 **Mission ID** _____

A. Participants:

HRD		AOC	
Function	**Participant**	**Function**	**Participant**
Lead Project Scientist	Uhlhorn	Flight Director	Damiano
Radar/Workstation	Reasor	Pilots	Hatherson, Nelson, Martin
		Navigator	Kidder
Cloud Physics		Systems Engineer	Klippel
Photographer/Observer /Guests	Marks	Data Technician	Nalter
Dropwindsonde	Sellwood	Electronics Technician	Sanssouci
AXBT/AXCP	X	Other	Wanneke

B. Take-off and Landing Times and Locations:

Take-Off: 0805 UTC Location: KMCF

Landing: _____ UTC Location: _____

Number of Eye Penetrations: _____

C. Past and Forecast Storm Locations:

	Date/Time	Latitude	Longitude	MSLP	Maximum Wind
1	0932	29 31'	77 22'	943 mb	
2	1044	29 45'	77 19'		
3					
4					
5					

D. Mission Briefing:

TDR, Rot-fig4 with one additional pass (5 pennies in all).

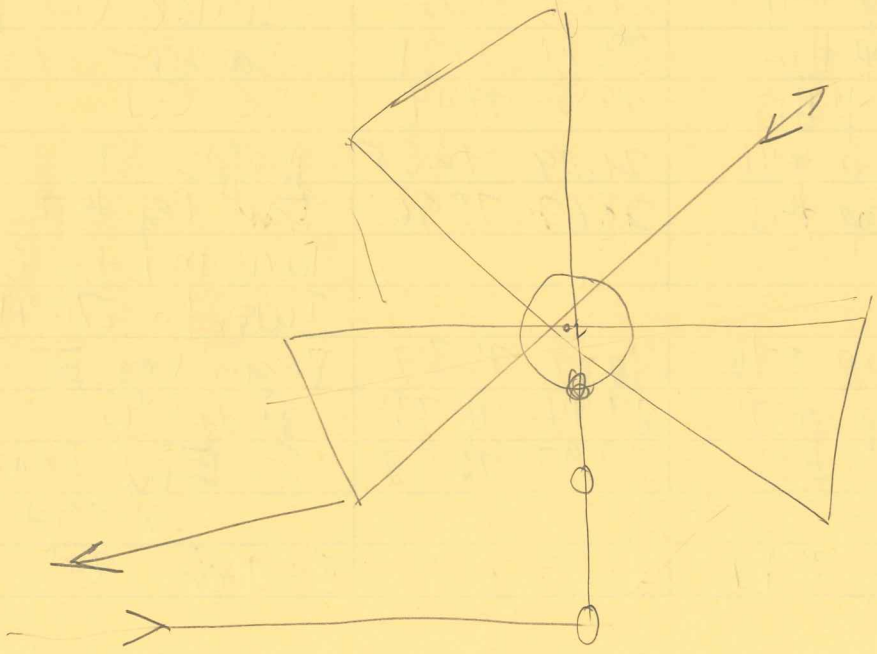
Storm or Project_____ **Experiment name**_____

Flight ID _____ **Mission ID**_____

E. —Equipment Status (Up ↑, Down ↓, Not Available **N/A**, Not Used **O**)

Equipment	**Pre-Flight**	**In-Flight**	**Post-Flight**	**# DATs / CDs /Expendables/ Printouts**
Radar/LF				
Doppler Radar/TA				
Cloud Physics				
Data System				
GPS sondes				
AXBT/AXCP				
Ozone instrument				
Workstation				
Cameras				

REMARKS:



Lead Project Scientist Event Log

Date _____ **Flight ID**_____ **LPS** _____

Time	Event	Position	Comments
0805	T/O	KMCF	
0906		27.72 77.34	Turn to 000°H
0907	Drop #1	27.79 77.30	Begin Leg #1
0913	Drop #2	28.18 77.30	*Weak* RB
0919	Drop #3	2863 77.31	Midpt. S
0926	Drop #4	29.13 77.31	S EW (open)
0931	Drop #5	2951 77.36	Center 2931" 77 22'
0936	Drop #6	29.82 77.36	N EW (heavy precip)
0943	Drop #7	30.33 77.36	Midpt N. (RB)
0959	Drop #8	31.44 77.35	End Leg 1
			Turn Downwind to NW
1017	Drop #9	30.85 78.67	Turn to 135°H Beg. Leg
			Begin Leg #2
1034	Drop #10	30.19 77.89	Midpt NW RB
		29.84 77.48	(Outer EW/NW
1041	Drop #11	29.84 77.48	Inner EW (Clear)
1044	Drop #12	29.74 77.31	Center 29.45' 77 19'
1048	Drop #13	29.55 77.09	SE EW
1059	Drop #14	29.09 76.58	Midpt SE
1112	Drop #15	28.67 75.96	End Leg #2
			Turn DW to E
1133			Turn to 270°H
1138	Drop #16	30.02 75.37	Begin Leg 3
1151	Drop #17	29.94 76.33	Midpt W.
1201	Drop #18	29.97 76.99	E EW heavy precip
1206	Drop #19	30.07 77.36	Center 9V

355 @ 15Kt 943mb

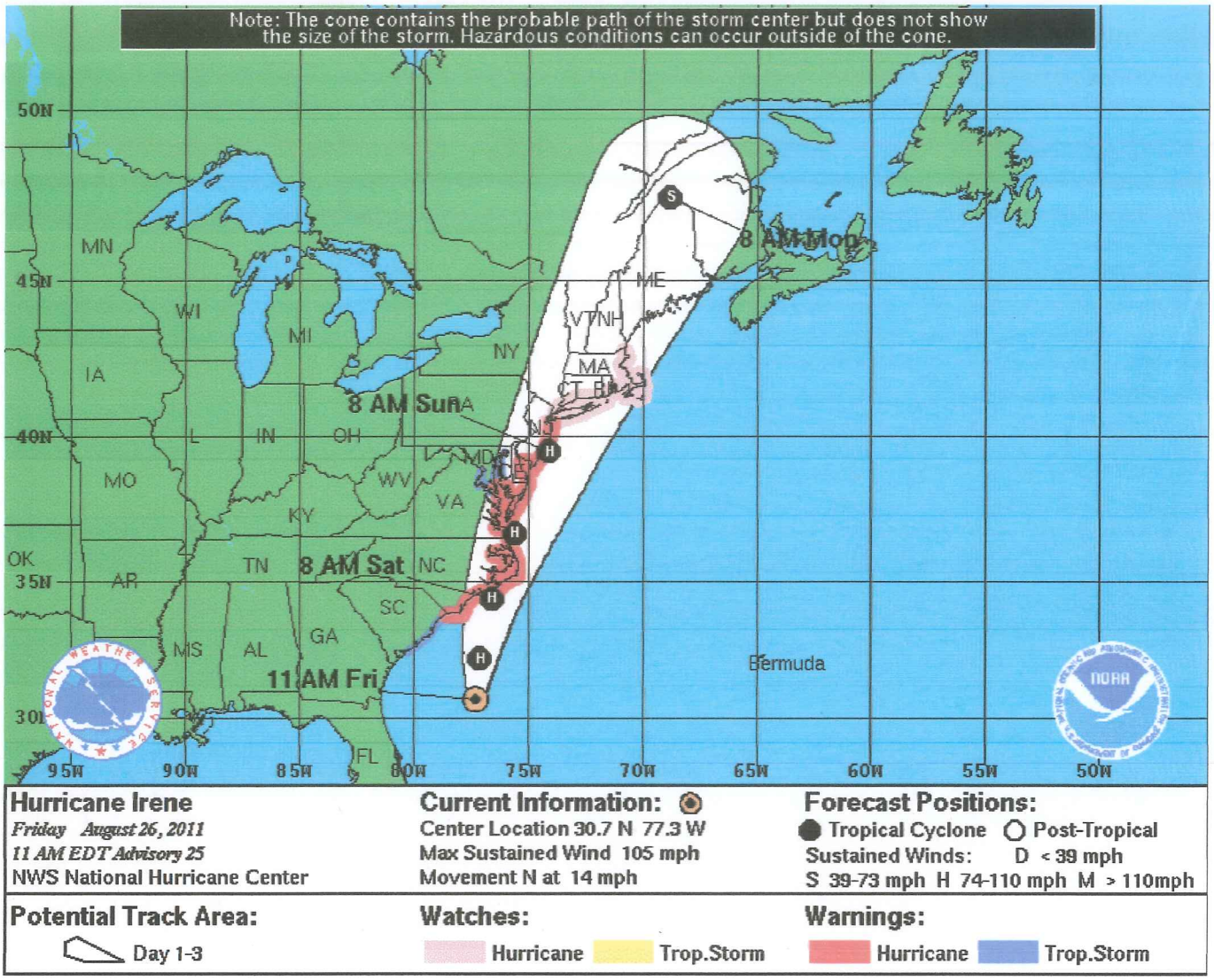
943mb

946m

Lead Project Scientist Event Log

Date _____ **Flight ID**_____ **LPS**_____

Time	Event	Position	Comments
1216	Drop #20	30.07 78.05	NLD
1233	Drop #21	29.95 79.31	turn DW to SW
1246	Drop #22	29.14 78.64	turn to 45° lt
			Begin Leg #4
1257	Drop #23	29.66 78.04	Midpt SW
1310	Drop #24	30.31 77.38	Center
1314	Drop #25	30.51 77.14	NE EW rainy NLD
1317	Drop #26	30.61 77.02	Backup
1323	Drop #27	30.94 76.63	NLD
1326	Drop #28	31.08 76.46	Backup
1335	Drop #29	31.51 75.93	End Leg #4
			Turn back to SW
1340			Begin leg #5
1406		30.50 77.42	Center
1435			End leg #5
1540	LAND		



Hurricane Irene
Friday August 26, 2011
11 AM EDT Advisory 25
NWS National Hurricane Center

Current Information:
Center Location 30.7 N 77.3 W
Max Sustained Wind 105 mph
Movement N at 14 mph

Forecast Positions:
Tropical Cyclone Post-Tropical
Sustained Winds: D < 39 mph
S 39-73 mph H 74-110 mph M > 110mph

Potential Track Area:
Day 1-3

Watches:
Hurricane Trop.Storm

Warnings:
Hurricane Trop.Storm