

E.1 Lead Project Scientist (On-Board)

The on-board lead project scientist is responsible for carrying out the scientific mission of his assigned aircraft. (Check off and initial when completed.)

E.1.1 Preflight

- X 1. Participate in general mission briefing.
- X 2. Determine specific mission and flight pattern(s) for his aircraft.
- X 3. Determine from CARCAH or field program director whether aircraft has operational fix responsibility and discuss with RFC flight director/meteorologist and CARCAH, unless briefed otherwise by field program director.
- X 4. Contact HRD members of crew to:
 - a. Assure availability for mission.
 - b. Arrange ground transportation schedule when deployed.
 - c. Determine equipment status.
- X 5. Meet with RFC flight crew 90 minutes before takeoff, provide copies of flight plans and give a formal briefing to the flight director, navigator, and pilots.
- X 6. Report status of aircraft, systems and crews to appropriate HRD operations center.

E.1.2 In-Flight

- X 1. Confirm from RFC flight director/meteorologist that satellite data link is operative (information).
- X 2. Confirm camera mode of operation.
- X 3. Confirm data recording rate. 1 FRAME / MIN
- X 4. Complete form E-1.

E.1.3 Postflight

- _____ 1. Debrief crew.
- _____ 2. Report landing time, aircraft, crew and mission status to HRD operations center.
- _____ 3. Gather completed forms for mission and turn in at the operations center.
- _____ 4. Determine next mission status, if any, and brief crews as necessary.
- _____ 5. Notify operations center as to where you can be contacted.

On-board Lead Project Scientist Checklist

DATE 26 JULY 83 AIRCRAFT 4312F FLT 830726 INVEST

A. Participants

<u>Function</u>	<u>Participant</u>	<u>Function</u>	<u>Participant</u>
Lead Proj. Sci.	<u>WILLOUGHBY</u>	Gust Probe	<u> </u>
Cloud Physics	<u>R. BLACK</u>	Omegasonde	<u> </u>
AXBT	<u> </u>	Sys Eng	<u> </u>
Hot Film	<u> </u>	Data Tech	<u> </u>
Radar	<u>JORGENSEN</u>	EI Tech	<u> </u>
Flt Dir/Met	<u>DAVIS</u>	Other (TRANEE)	<u>BOGERT</u> <u>DARBY</u>

Take Off 262117 Location SJU Landing 270234 Location SJU

B. Past and Forecast Storm Position

<u>Date</u>	<u>Time</u>	<u>Latitude</u>	<u>Longitude</u>	<u>MSLP</u>
<u>26</u>	<u>222</u>	<u>13 N</u>	<u>57 W</u>	<u>~1016</u>
<u> </u>	<u> </u>	<u> </u>	<u> </u>	<u> </u>
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C. Mission Briefing

FLY INVEST NEAR 13N 57W CONDUCT
RADAR & CLOUDHY TRAINING

D. Equipment Status

<u>Equipment</u>	<u>Pre Flt</u>	<u>In Flt</u>	<u>Post Flt</u>	<u>Reports Collected</u>
Aircraft	↑	↑	↑	
Radar	↑	↑	↑	
Cloud Physics	↓	↓	↓	
Data Sys	↑	↑	↑	
Omegasondes	NOB			
AXBT	NOB			
Gust Probe	NOB			
Hot Film	NOB			
Photography	↑	↑	↑	

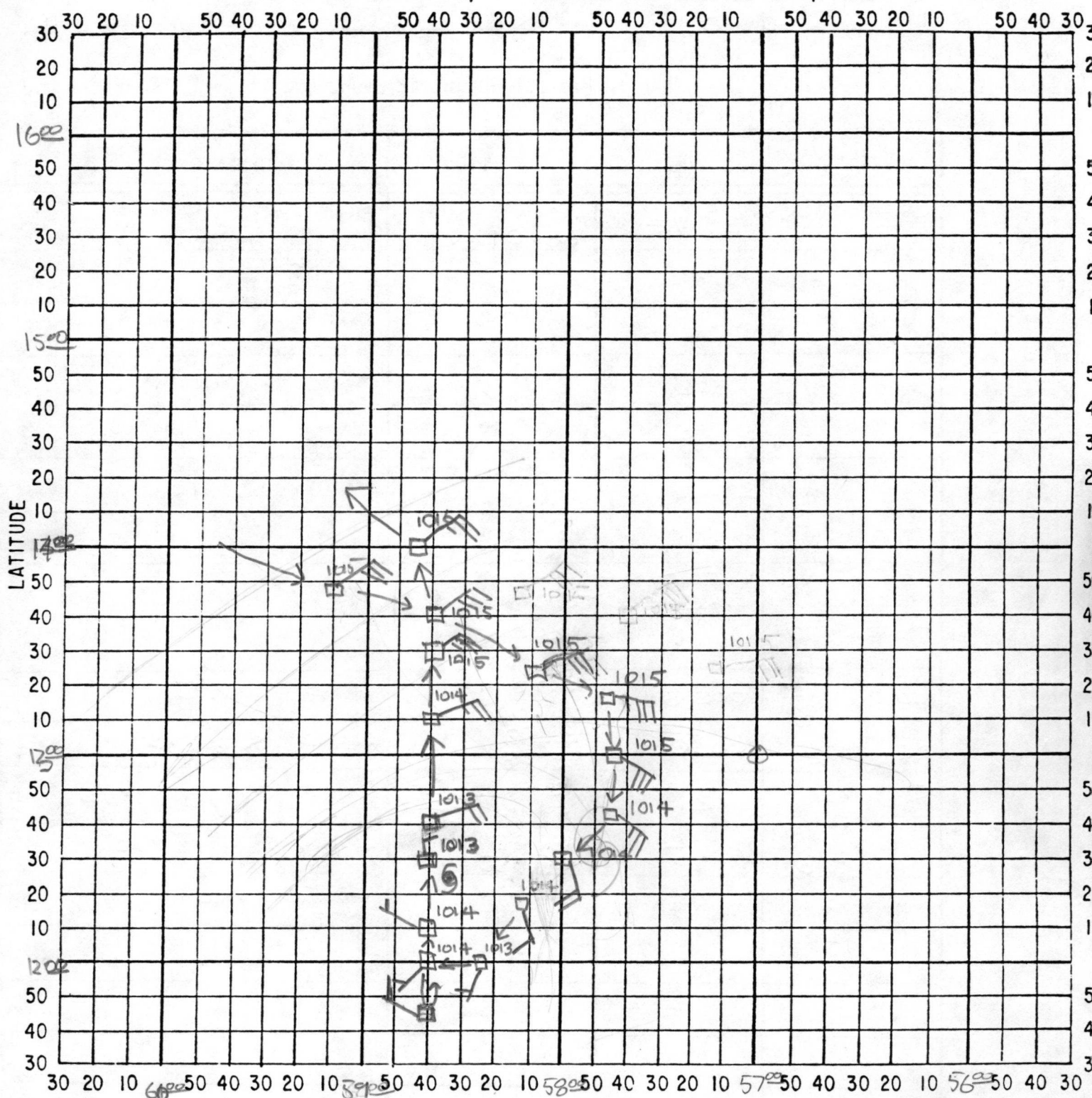
REMARKS

Form E-1
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E. Proposed and Actual Flight Patterns

HURRICANE RECCO PLOTTING CHART

TRUE AT 25° LATITUDE, IN DEGREES AND MINUTES OF ϕ AND λ



DATE 26 JULY 83

LONGITUDE

OBSERVER WILLOUGHBY

072683I

NOTE: Label full degrees according to location of flight area

DATE 26 JULY 83

FLIGHT 830726J

LPS WILLOUGHBY

Lead Project Scientist Event Log

EVENT	TIME*	POSITION	COMMENTS**
OFF STU	2147Z	18.43 N 66.01 W	SLP 1017 EXTRAP FROM 700 MB, WIND 050/14 m/s
	2134Z		KJY & ASDL NOT REACHING NHC, BUFFER OK, TROUBLE IN LANDLINES
WIND 075/9.0	2231Z	14.91 N 61.50 W	KJY: NHC TELEPHONE ↓ NO ASDL, PASS SIG WX VIA KJY
DESCENDING TO 1500'	2300	13.93 N 59.41 W	037/10 m/s
AT 1500'	2305Z	13.80 N 59.03 W	WIND 050/14 m/s SLP 1016
WIND SHIFT	2326	13.37 N 57.90 N	WIND 99/17.6
TRACK 180	2329	13.30 N 57.73	
GRADUAL LOOKS	HEADING CHANGES LIKE CLOSED CIRCULATION		180 → 270
TRACK 180	0001	12.00 N 58.78 W	
TRACK 360	0006	11.72 N 58.73 W	WIND 300/5 SLP 1014
CENTER	0020	12.50 58.58	WIND ← 1 m/s
E WIND	0021	12.68 58.68	WIND 049/9.3 m/s
TURN 284 RTB	0045	14.00 58.75	WIND 062/15 m/s
CLIMB	0100	14.37 60.04	→ 500 mb
LAND	270234	STU	

*Log times of all significant altitude changes, turns, and eye fixes
**New altitude, heading, center position, etc.