

19910908II - FDIR

HURRICANE CLAUDETTE
ELECTRIFICATION

FLIGHT #1 I910908 N43RF

TYPE OF DATA -----	SENSOR OR OPTION -----
INE	1
Accelerometer	1
Temperatur probe	1
Altitude change option (for vertical winds)	RA
Static pressure	Rosemount fuselage
Dynamic pressure	Rosemount fuselage
Time source	Micro 29
Constants file	CO3913.CON

Notes:

There were two data/time gaps:

213021Z - 213610Z
233311Z - 233320Z

The King Liquid water probe did not work for the entire flight.
The J-W Liquid water probe did work until 2028Z when the wire broke.

Total temperature sensor 1 (TT1) did experience some problems during the flight. For the periods 191531Z - 191625Z and 234811Z - 235300Z, the value of TT1 was replaced with the value from TT2. During 231801Z - 232000Z a spike was removed and patched over.

The slip pressure (BP) had spikes occur during the following time frames:

203301Z - 203800Z
230401Z - 230900Z
231501Z - 231900Z

These spikes were removed and patched over. During the following time frames the BP sensor experienced icing conditions:

202211Z - 203050Z
204001Z - 205900Z
223501Z - 224510Z
232011Z - 235120Z

The value -15 was substituted for the erroneous output during the above mentioned time periods.

The dynamic slip pressure (DBP) had erroneous values due to icing conditions during the following time frames:

180431Z - 181130Z
182701Z - 183110Z
190001Z - 191200Z

202201Z - 205920Z
223301Z - 224450Z
230001Z - 235600Z

The erroneous values were replaced with values from the equation,

$$DBP = PQW + 2.5, \text{ where PQW is the wingtip dynamic pressure output.}$$

SPECIAL NOTE!!! Locations 80, 81 and 82 of record five on the standard tape contain vertical ground, vertical air and vertical speeds respectively, computed using Dave Jorgensen's vertical wind algorithm.

	Take off	Landing
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Aircraft static pressure	1016.3mb	1014.6mb
Corrected tower pressure	1014.6mb	1013.9mb

Flight Meteorologist: A. BARRY DAMIANO

FLT ID: F910908	FM: TXKF	TO: KMIA
FLT NO: 91-052	BLK IN: 0057Z	RTA: 0052Z
ETD: 1600Z	BLK OUT: 1545Z	RTD: 1557Z
ETE:	BLK TIME: 9:12	FLT TIME: 8:55
SPONSOR ORG: HRD	PROGRAM: HURRICANE RESEARCH	PURPOSE: ELECTRIFICATION H. CLAUDETTE

DAO PERSONNEL

Ferry to Mic

AC: TICKNOR	SYS ENG: LEYVA
CP: PLAYER/KENNEDY	DATA SYS: PRADAS
NAV: WHITE	RADAR:
FE: BAST/WADE	BT/ODW: LYNCH
RADIO:	CLD PHYS:
FD: DAMIANO	DOPPLER:

PARTICIPATING SCIENTIST/VISITORS/DAO

LAST, FIRST NAME	ACTIVITY ON A/C	AFFILIATION
McFADDEN	PM	AOC
CLOSSER	FLT MELCH	AOC
BLACK, P.		HRD
BURPEE	PI	}
WILLIS		
ROUX		
ARTIS		
GAMACHE		

PROPOSED/ACTUAL MISSION/REMARKS (RECCO, FIXES, STORM, PENET, NHOP #)

2216Z 3135' 62°48' 2230Z 3134' 62°47' 2318Z 31°42' 62°43' 2245Z

2333Z 31°44' 62°41' 2349Z 31°45' 62°39'

2130Z Power outage

AF fix 2334Z 31°50' 62°30' 973 MB

20 NM FROM
5000 FT Center
90 KTS

20 NM SW
98 KTS

BERMUDA	TA	TD	STN PRES
16Z	28.0°C	23.7	29.96 / 1014.6 MB
01Z	26.9°C	23.4	29.94 / 1013.9 MB

U.S. DEPT. COMM./NOAA/ORO - DATA SECTION WORK FORM NO.2 DROWF2 FILE

FLT ID: I910908 TIME OFF: 1557Z TIME ON: 0052Z

	A/C T/O	WX STN	A/C LAND	WX STN
PRESSURE	<u>PS 1016.1</u> <u>SP 1015.0</u>	<u>30.01</u>	<u>PS 1014.6</u> <u>SP 1013.0</u>	<u>29.94</u>

	NO	DATA DISPOSITION/DATE/QUALITY
1/SEC FLT LVL TAPES	<u>1</u>	
FAST FLT LVL TAPES		
RADAR TAPES	<u>13</u>	
DOPPLER TAPES		
ODW CASSETTES	<u>1</u>	
HARD COPIES		
<u>PMS</u>	<u>39</u>	
AXDT		
AXCP		
ODW	<u>2</u>	

PHOTOGRAPHY					
	FWD	LS	RS	VERT	
ON					
OFF					
RATE					

REMARKS NO KLV probe ~~TR and LF Radars not working and~~ OSBIT in error to fix FORMER SENSOR
1706Z - 1731Z
AF fix
3054 1707Z
6319 966MB
1750Z 1731Z
3057 6316
6315 960MB
1708Z 3106 1828Z
3103 1912Z
1958Z 3195

2157Z
3130
6251
2126Z
3126
6253
2108Z
3124
6257

2030Z
3120
6258

2014Z
3117
6300

2028Z
J-W
Kubo

1938Z
3113
6305