

U.S. DEPT. COMM./NOAA/OAO - DATA SECTION WORK FORM NO.1 OAOWF1 FILE

FLT ID: 960817I	FM: TBPB	TO: KOPF/MCF
FLT NO: 96-049	BLK IN: 22.48/00.06	ATA: 13.02.49 22.44/2258
ETD: 1800	DLK OUT: 14.54/22.53	RTD: 15.02/22.59
ETE: 2300/0100	BLK TIME: 9.07 (9.1)	FLT TIME: 8.41 (8.7)
SPONSOR ORG: HRD	PROGRAM: HURRICN	PURPOSE: FERRY

OAO PERSONNEL

AC KENNEDY, P. ✓ *	SYS ENG LYNCH, T. ✓ *
CP KENUL, P. * TAGGART, B. ✓ *	DATA SYS ROLES J. ✓ *
NAV KOZAK, S. ✓ *	RADAR
FE MOORE, B. * BAST G. ✓ *	BT/ODW GONZALEZ, J. ✓ *
RADIO SANS SOULT, D. ✓ *	CLD PHYS
FD CZYZYK, S. ✓ * PARRISH, J. ✓ *	DOPPLER

PARTICIPATING SCIENTIST/VISITORS/OAO

LAST, FIRST NAME	ACTIVITY ON A/C	AFFILIATION
31 CLOSSER, G. *	MECH.	AOC
MARKS F. ✓	SCIENTIST	HRD
DODGE, P. ✓ *	↓	↓
LANDSEA, C. ✓	↓	↓
BRACKEN, E. ✓ *	↓	↓
47		

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

3 ODW DROPS/INTERCOMPARISON VIDEO

Figure 4 16.5N 70W
 16.5N 76W
 15.0N 74W 74° 30' W.
 18.15N 74 40 W

NOAA • AOC • SED
N43RF DATA STATION LOG

Project : Hurricanes '96

Mission : Genesis #2 → KOPF Flight ID : 960817I

Operators : Lynch

Take Off : 15:02 | 22:59

Landing : 22:44 | 23:57

RAMS DAT 1 On [8 9]: <u>14:51</u>	RAMS DAT 1 Off: <u>15:33</u>	CPU Selected: <u>A</u> B
RAMS DAT 2 On [8 9]: <u>15:35</u>	RAMS DAT 2 Off: <u>22:47</u>	VCR's Used: <u>N</u> <u>L</u> R <u>D</u>
RAMS DAT 3 On [8 9]:	RAMS DAT 3 Off:	
Printer On: <u>14:51</u>	Printer Off:	
VCR's On: <u>14:51</u>	VCR's Off: <u>22:38</u>	VCR Count: <u>3900</u>
MARS DAT On:	MARS DAT Off: <u>2124</u>	
PMS DAT On: <u>1504</u> <u>21:24</u>	PMS DAT Off: <u>21:24</u>	

ASDL Messages							
Message	Time	Message	Time	Message	Time	Message	Time
<u>R</u> V S B	<u>15:54</u>	R V S B		R V S B		R V S B	
<u>R</u> V S B	<u>16:31</u>	R V S B		R V S B		R V S B	
<u>R</u> V S B	<u>17:38</u>	R V S B		R V S B		R V S B	
<u>R</u> V S B	<u>17:59</u>	R V S B		R V S B		R V S B	
<u>R</u> V S B	<u>18:32</u>	R V S B		R V S B		R V S B	
<u>R</u> V S B	<u>19:09</u>	R V S B		R V S B		R V S B	
<u>R</u> V S B	<u>20:00</u>	R V S B		R V S B		R V S B	
<u>R</u> V S B	<u>20:30</u>	R V S B		R V S B		R V S B	
R V S B		R V S B		R V S B		R V S B	
R V S B		R V S B		R V S B		R V S B	
R V S B		R V S B		R V S B		R V S B	
R V S B		R V S B		R V S B		R V S B	

R = Recco V = Vortex S = Sonde B = AXBT

Data Station Operator Notes

15:35 - IRA lites on Mars/Loral on solid -
setup no good - rebooted
16:50 Ram setup
18:46 - AFSTU - Fast Data Error - previous data not read
19:41

Data Station Operator Notes

153200
can't
Drop 1 15:37:06 0421 OKAY
Drop 2 15:47:11 1025 OKAY
Drop 3 16:00:09 1805 can't see
Drop 4 16:17:16 2830 nice shot
cockpit shot 2750

CYCLOGENESIS FERRY TO TAMPA 1996

FLIGHT #3 960817I

TYPE OF DATA	SENSOR OR OPTION
INE	2
Accelerometer	2
Temperature probe	1
Altitude change option (for vertical winds)	RA-232
Static pressure	Rosemount fuselage
Dynamic pressure	Rosemount fuselage
Time source	Micro 99
Constants file	CO3964.CON

Notes:

There were 12 time/data gaps: 1524:51-1535:40, 1647:21-1647:30, 1648:01-1648:0, 1648:35-1648:40, 1649:51-1650:10, 1846:18-1847:00, 1941:21-1941:30, 2053:46-2103:20, 2148:51-2153:30, 2154:51-2155:20, 2155:51-2156:10, 2229:01-2229:20.

Downward spikes in radar altimeter and static pressure output are a result of overflying land (Hispaniola).

DW1 spike removed and patched from 2014:30-2017:00 due to balancing of sensor. DW1 exceeded TT1 several times due to heavy precipitation.

There were 7 electronic glitches/spikes in the radar altimeter, RA-232. These were all patched at the following times: (2052:00-2053:00, 2122:00-2123:00, 2157:30-2158:30, 1650:11-1650:41, 1535:41-1537:00, 1539:30-1540:30).

There were 2 electronic glitches/spikes in the fuselage static pressure sensor, PSF. These were both patched at the following times: (1650:15-1650:45 and 1702:00-1703:00).

Spikes in W, VS, WAS, WGS, are due to data/time gaps.

There were 4 ODW dropsondes during the mission: 1537:03, 1547:13, 1600:03, 1617:14.

	Takeoff	Landing
Aircraft static pressure:	1009.1 mb	1015.6

The aircraft INE positions were renavigated with respect to GPS.

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. It is recommended that these values be used for

vertical wind analysis.

Flight Meteorologist: Stan Czyzyk: (813) 828-3310 ext. 3086

NOAA • AOC • SED Flight Performance Log

Aircraft : N43RF

Project: Hurricane '96

Mission : Genesis #2 → KOPFSED Crew: Roles, Lynch, GonzalezFlight ID : 960817IPre-Flight: 13:00Take-Off: 15:02 / 22:59Landing: 22:44 / 23:57

System			Pre-Flight	In-Flight	Post-Flight		
N A V	INE #1	Aligned to : <u>0</u>	✓ TL		4.5	-1.5	3
	INE #2	Aligned to : <u>0</u>	✓ TL		41.1	-3	3
	GPS		✓ TL		Lat	Long	GS
R A D A R	Nose		✓ TL				
	L/F	R/T SN : <u>103</u>	gn		Mod Switch Off ? <u>gn</u>		
	Tail	R&T SN : <u>202 201</u>	gn		Mod Switch Off ? <u>gn</u>		
	ASAU's & RCU		gn				
	MARS Data System		gn		# DATs : <u>1</u>		
P M S	2DG-C	Ch 1/64: <u>/</u>	gn				
	2DG-P	Ch 1/64: <u>/</u>	gn				
	FSSP	Ref VDC: <u>8.67</u>	gn				
	SEA Data System		①		# DATs : <u>1</u>		
T E M P	Cal High	Cal Low			Cal High	Cal Low	
	Temp #1	<u>30.7</u>	<u>-30.2</u>	✓ TL			
	Temp #2			✓ TL			
	Temp #3 (Starboard)			NI			
	Dewpoint #1			✓ TL			
	Dewpoint #2 (AOC)			✓ TL	②		
P R E S S	Attack Angle (AP/DAP)		✓ TL				
	Slip Angle (BP/DBP)		✓ TL				
	Differential (PQ1/PQ2/PQ3)		✓ TL				
	Absolute (PS1/PS2)		✓ TL				
F L T L V L	Radome Transducers		Plugs ? <u>gn</u>				
	Cabin Transducer (Station 5)		✓ TL				
	Apn-159	SN: <u>3471-01</u>	✓ TL		Off ? : <u>✓</u>		
	Apn-232	SN: <u>1699</u>	✓ TL		Off ? : <u>✓</u>		
	King Liquid Water		✓ TL				
M I S C	J&W Liquid Water		JR				
	Down PRT-5 (SST)		✓ TL				
	Side PRT-5 (CO ²)		✓ TL				
	RAMS Data System		✓ TL ③		# DATs : <u>2</u>		
	ASDL		✓ TL		Off ? : <u>✓</u>		
	Epply Radiometers (PSP / PIR)		NI				
U S E R	Exterior Walk Around		JG				
	Video	<u>① ① R ① ①</u>	✓ TL ②				
	AXBT Receivers		NI				
	AXBT Sonobouys		#On Board : <u>0</u>	# Dropped : <u>—</u>	# Good : <u>—</u>		
	ODW System				# Tapes : <u>2</u>		
	ODW Dropsondes		#On Board : <u>10</u>	# Dropped : <u>4</u>	# Good : <u>3</u>		
U S E R	FCU	<u>A B C</u>	✓ TL	⑤	UPS Off : ?		
	Charge Probe		NU		Accelerometers		
	HRD Workstation		—		#1 (2 G) : <u>8153</u>		
	Field Mills	<u>① ② ③ ④</u>	✓ TL		#2 (2.5 G) : <u>6624</u>		
	Lawrence Water Collector		—		#3 (3 G) : <u>5967</u>		
Formvar		NU		#4 (3.5 G) : <u>2892</u>			

Please Note any Discrepancies

Item #	Zulu Time	Problem Description	Initials	A 23A #
①		On B-16-96 installed DAT from HP CPU B L49 → SEA DAS. HP B → 1 = 00001101 / SEA B → 1 = 00001000	TL	OK
②		Set left camera to shutter speed of 1/2000	TL	OK
③		No video data on CU 0 of Video Graphics Generator - swapped RAMDAC's - NOGO - Not CPU card either	TL	OK
④	1656	Set Default RADAR setup files to Hure 2		OK
5		FCL B (Bus 1B) has very short dropouts every now + then.		OK
	1948	Ferrule missing from water vent line on water collection system	m	OK
	2028	Excessive (hundreds) of Test 4 fail ones, possibly ASAN gain + tech need adjustment		
B		Dropout #2 oscillates low.	TL	OK
9		TI-700 Printer at Sta-7 could use new print head - extra pixels showing up	TL	
		Started working OK - look into spare Opel card for 43	TL	
*		42 owns a 400 → 60 Hz Adaptor		OK

Aircraft Operations Center
PO Box 6829
MacDill AFB, FL 33608-0829

March 16, 1996 AOC1:sw

MEMORANDUM FOR: *Dr. H. Willoughby*

FROM: Captain George C. Player, III, NOAA
Director, Aircraft Operations Center

SUBJECT: Hazard Duty Flight

The mission flown on AOC aircraft # N43RF on 8/17/96 has been declared hazardous. The following personnel from your laboratory participated in this mission.

F. MARKS C. LANOSEA
P. DODGE E. BRACKEN

For purpose of computing allowable hazard duty time, the hazard period during this mission was from 10:53 local time on 8/17/96 until 18:48 on 8/17/96.

DATE : 8/17/96
TO : Chief, AOC Flight Operations
FROM : Pilot/Flight Director, Aircraft N43RF ON 14:53/2253 BLOCKTIME
SUBJECT: Hazardous Duty OFF 22:47/00:05 9.1

PURPOSE OF FLIGHT: FERRY TO MCF W/ INTERCOMPARISON ENROUTE

Hazardous Duty Pay is required for flight made on 8/17/96
(DATE)

Request based on CLOSE FORMATION WITH N42RF

Personnel on board authorized Hazard Pay:

CZYZYK, S

PARRISH, J

BAST, G

CLOSSER, G

GONZALEZ, J

ROLES, J

LYNCH, T

SANS SOUCI, D

MOORE, B

PILOT/FLIGHT DIRECTOR: S. Czyzyk

APPROVED: _____ DISAPPROVED: _____

CHIEF, AOC FLIGHT OPERATIONS: _____

REMARKS
818 828-4361
106 + 66 + 109 tab +
113