

N43RF ERROR SUMMARY
20230826I2

Flight ID: 20230826I2

Sensor or System -----	Number or Name -----
Static Pressure Probe	PSM.2
Dynamic Pressure Probe	PQM.2
Total Temperature Probe	TTM.1
Dewpoint Temp. Probe	TDM.1
Vertical Accelerometer	AccZfilterI-GPS.1
Altimeter	AltGPS.3
INE Selection	1
Differential Attack Pressure Probe	PDALPHA.1
Differential Sideslip Pressure Probe	PDBETA.1
Dynamic Attack Pressure Probe	PQALPHA.1
Dynamic Sideslip Pressure Probe	PQBETA.1

Flight Directory acdata/2023/MET/20230826I2

Local Met Data	Takeoff TISX (2033Z)	Landing TISX (0301Z)
Dynamic Corrections		Yes
AttackAngleIntercept		0.050058
AttackAngleSlope		5.32015
SlipAngleIntercept		0.165
SlipAngleSlope		6.66754

Notes:

There were no edits made in the measured parameters used to calculate meteorological and navigational parameters.

Takeoff/Landing data: Data during landing and takeoff are potentially suspect. It is recommended that ground data not be used for scientific analysis.

GPS.3 and GPS.4 stopped reporting after the 2nd pass, halfway through the flight (~0008 UTC), which has impacted AltGPS.3, AltGPS.4, LatGPS.3, LatGPS.4, LonGPS.3, LonGPS.4
TTM.3 and I.3 for Pitch and Roll are not operational
TDM.2 and TDM.3 had erroneous data throughout the flight and should not be used; TDM.2 flatlined to an erroneous 11.5C around 2115 UTC shortly after takeoff and during the transit
TRadU.1 is not useable
Spike in TD.c and TA.d on descent to land, but no other outlier/erroneous data
PSM.2 is more stable than PSM.1 with a mean difference of 8.6 mb lower for PSM.1 compared to PSM.2
PDALPHAref, PDBETAref, PQALPHAref, PQBETAref, and DPJ_WSZ are not provided since _AC file is not produced; all other 'C' file parameters checked are from the _A file

Expendable Type -----	# deployed -----	# good -----	# transmitted -----
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Dropsondes	30	28	28
Test sondes	0	0	0
AXBTs	5	4	4
AXCPs	0	0	0
AXCTDs	0	0	0
UAS	0	0	0

Flight Director: Zawislak / Lundry
Phone #: 305-707-4359

ACAT-4 Version = 7.4

U.S. Department of Commerce / NOAA / OMAO / Aircraft Operations Center - N43RF Manifest

FLIGHT INFORMATION				CREW MANIFEST			MISSION INFORMATION				
FLT ID:	20230826I2	FLT #:	FY23-	AC:	Abitbol	Scientists:	Pressure		Dropsondes		
From:	TISX	ETD:	1630L / 2030Z	CP(s):	Rannenberg	Jun Zhang (HRD)	A/C Takeoff	1007.3	Good	Bad	Sent
To:	TISX	ETA:	0030L / 0430Z		Keith	Sim Aberson (HRD)			28	2	28
Block Time		Flight Time		NAV:	Utama	Jason Sippel (HRD)	ASOS Takeoff	1006.9	BTs		
Out:	20:30	T/O:	20:34	FE(s):	Stokes		A/C Land		Good	Bad	Sent
In:	3:05	Land:	3:01	FD(s):	Lundry				4	1	4
Total:	6.6	Total:	6.5	SSA:	McAlister	Visitors:	ASOS Land	1008.9			
Sponsoring Org:	HX - HRD			AVAPS:	Underwood		Storm Number ID:		AL082023		
Program:	PHX			SEB:			(ie: AL072012)				
Purpose:	Hurricane Research Tasking			MX:			TCPOD/WSPOD Mission		NOAA3 WD08A FRANKLIN		
							(ie: NOAA2 2418A SANDY)				
AS REQUIRED BY ORM				Y	N	REMARKS	Fix Number	Obs Number	Fix Time	SLP	
VOLCANIC ASH					x		1	OB06 23.71N, 67.66W	22:12:22	979 mb	
SCIENCE MISSION WITHIN BDRY LAYER					x					Drop: 285 / 02 kt	
LACK OF PRECIPITATION					x		2	OB10 23.76N, 67.81W	23:28:04	978 mb	
RELATIVE HUMIDITY ≥ 80%				x						Drop: 135 / 07 kt	
LARGE AIR-SEA TEMP GRADIENT					x		3	OB11 23.76N, 67.93W	0:49:20	977 mb	
HIGH SURFACE WINDS				x						Drop: 170 / 08 kt	
LONG FETCH / DURATION OF SFC WND				x			4	OB30 23.80N, 68.01W	1:29:20	974 mb	
SEA SALT ACCRETION FORECAST					x					Extrap	
SEA SALT ACCRETION OBSERVED					x		Pennies:	4 x Cat 1			

*Highlighted items must be completed before departure.

Remarks:

P-3 QC Checklist

Overall Assessment	Minor instrument issue(s) - no mission impact.
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Flight ID:	20230826I2
Flight Director(s):	Zawislak / Lundry
Mission:	Non-tasked Science Collection/Research
UWZ.d mean:	-0.19

Pressure Comparison		
	T/O	Land
Aircraft	1007.3	1010.0
Tower	1006.9	1008.9

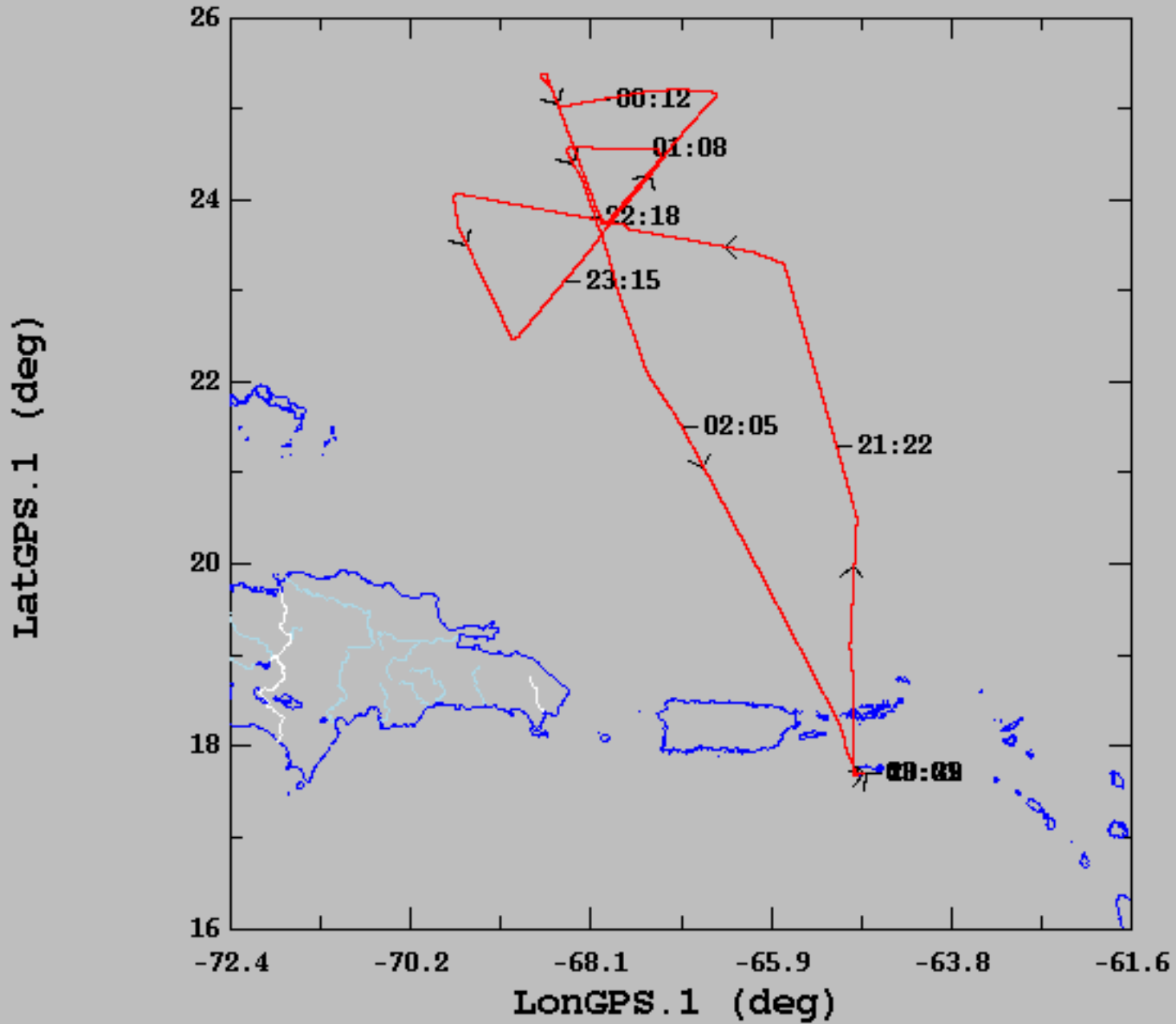
	Raw 1Hz Mean File Parameters				C File Parameters	
✓ Accelerometer	✓ AccAXI.1 ✓ AccAXI.2 ✓ AccAXI-GPS.1 ✓ AccAXI-GPS.2	✓ AccAYI.1 ✓ AccAYI.2 ✓ AccAYI-GPS.1 ✓ AccAYI-GPS.2	✓ AccAZI.1 ✓ AccAZI.2 ✓ AccAZI-GPS.1 ✓ AccAZI-GPS.2	✓ AccZfilter-GPS.1 ✓ AccZfilter-GPS.2	✓ AccZref	
✓ Altitude	✓ AltGPS.1 ✓ AltGPS.2 X AltGPS.3 X AltGPS.4	✓ Alti-GPS.1 ✓ Alti-GPS.2	✓ AltPaADDU.1 ✓ AltBCADDU.1	✓ AltRA.1 ✓ AltRA.2	✓ ALTref ✓ ALTPA.d ✓ ALTGA.d	✓ AltRA1.c ✓ AltRA2.c
✓ Ground Speed	✓ GsXI-GPS.1 ✓ GsXI-GPS.2	✓ GsYI-GPS.1 ✓ GsYI-GPS.2	✓ GsZI-GPS.1 ✓ GsZI-GPS.2		✓ GSXref ✓ GSYref ✓ GSZref	
✓ Lat / Lon	✓ LatGPS.1 ✓ LatGPS.2 X LatGPS.3 X LatGPS.4	✓ LatI-GPS.1 ✓ LatI-GPS.2	✓ LonGPS.1 ✓ LonGPS.2 X LonGPS.3 X LonGPS.4	✓ LonI-GPS.1 ✓ LonI-GPS.2	✓ LATref ✓ LONref	
✓ Pressure	✓ PDALPHA.1 ✓ PDALPHA.2 ✓ PDBETA.1 ✓ PDBETA.2	✓ PQALPHA.1 ✓ PQBETA.1	✓ PQM.1 ✓ PQM.2 ✓ PQM.3 ✓ PQM.4	✓ PSM.1 ✓ PSM.2 ✓ PTM.1	X PDLAPHaref X PDBETAref X PQALPHaref X PQBETAref	✓ PQMref ✓ PQ.c ✓ PSMref ✓ PS.c
✓ Air Speed	✓ CasADDU.1	✓ TasADDU.1	✓ IasADDU.1		✓ IAS.d	✓ TAS.d
✓ Pitch / Roll	✓ PitchI.1 ✓ PitchI.2 X PitchI.3	✓ PitchRateI.1 ✓ PitchRateI.2 X PitchRateI.3	✓ RollI.1 ✓ RollI.2 X RollI.3	✓ RollRateI.1 ✓ RollRateI.2 X RollRateI.3	✓ PITCHref ✓ ROLLref	
✓ Temp / Dewpt	✓ TTM.1 ✓ TTM.2 X TTM.3	✓ TDM.1 X TDM.2 X TDM.3	✓ TRadD.1 ✓ TRadS.1 X TRadU.1		✓ TD.c ✓ TDMref	✓ TTMref ✓ TA.d
✓ Misc. (Must check)					✓ UWZ.d X DPJ_WSZ ✓ HUM	✓ WS.d ✓ WD.d

FLID_Mission_Documents.pdf:
✓ Error Summary
✓ Crew Manifest
✓ QC Checklist
✓ Dropwindsonde Log(s) - AVAPS and FD if completed
✓ Flight Track
✓ Miscellaneous FD Notes

QC Key	
Not checked	<input type="checkbox"/>
Valid	<input checked="" type="checkbox"/>
Errors (note)	X

NOTES:
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08/26/2023, 18:32:42-27:01:42



	mean	sigma	min	max
LatGPS.1 (deg), 1 s/sec	21.42	2.81	17.69	25.38
LongGPS.1 (deg), 1 s/sec	-66.55	1.57	-69.69	-64.79