

MICROCOPY RESOLUTION TEST CHART
NATIONAL BUREAU OF STANDARDS-1963-A

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UNCLASSIFIED

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19. KEY WORDS (Continue on reverse side if necessary and identify by block number)		
20. ABSTRACT (Continue on reverse side if necessary and identify by block number) Meteorological data gathered for the launching of the 12831D LAUCE, Missile Number 4848 are presented in tabular form.		

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INTRODUCTION

128317 LANCE, Missile Number 4848, Round Number 383 MSL, was launched from LC-33, White Sands Missile Range (WSMR), New Mexico, at 0900 MST, 31 Mar 1953. The scheduled launch time was 0900 MST.

DISCUSSION

Meteorological data were recorded and reduced by the White Sands Meteorological Team, Atmospheric Sciences Laboratory (ASL), White Sands Missile Range, New Mexico. The data were obtained by the following methods:

a. Surface

(1) Standard surface observations to include pressure, temperature ($^{\circ}\text{C}$), relative humidity, dew point ($^{\circ}\text{C}$), density (gm/m^3), wind direction and speed, and cloud cover were made at the LC-33 Met Site at T-0 minutes.

(2) Anemometer data were provided from existing pole-mounted and tower-mounted anemometers at LC-33. Monitor of wind speed and direction from an anemometer was also provided in the launch control room.

b. Inner Air

(1) Low level wind data were obtained from a pilot-balloon observation at:

SITE AND ALTITUDE

WSD 10,000 ft

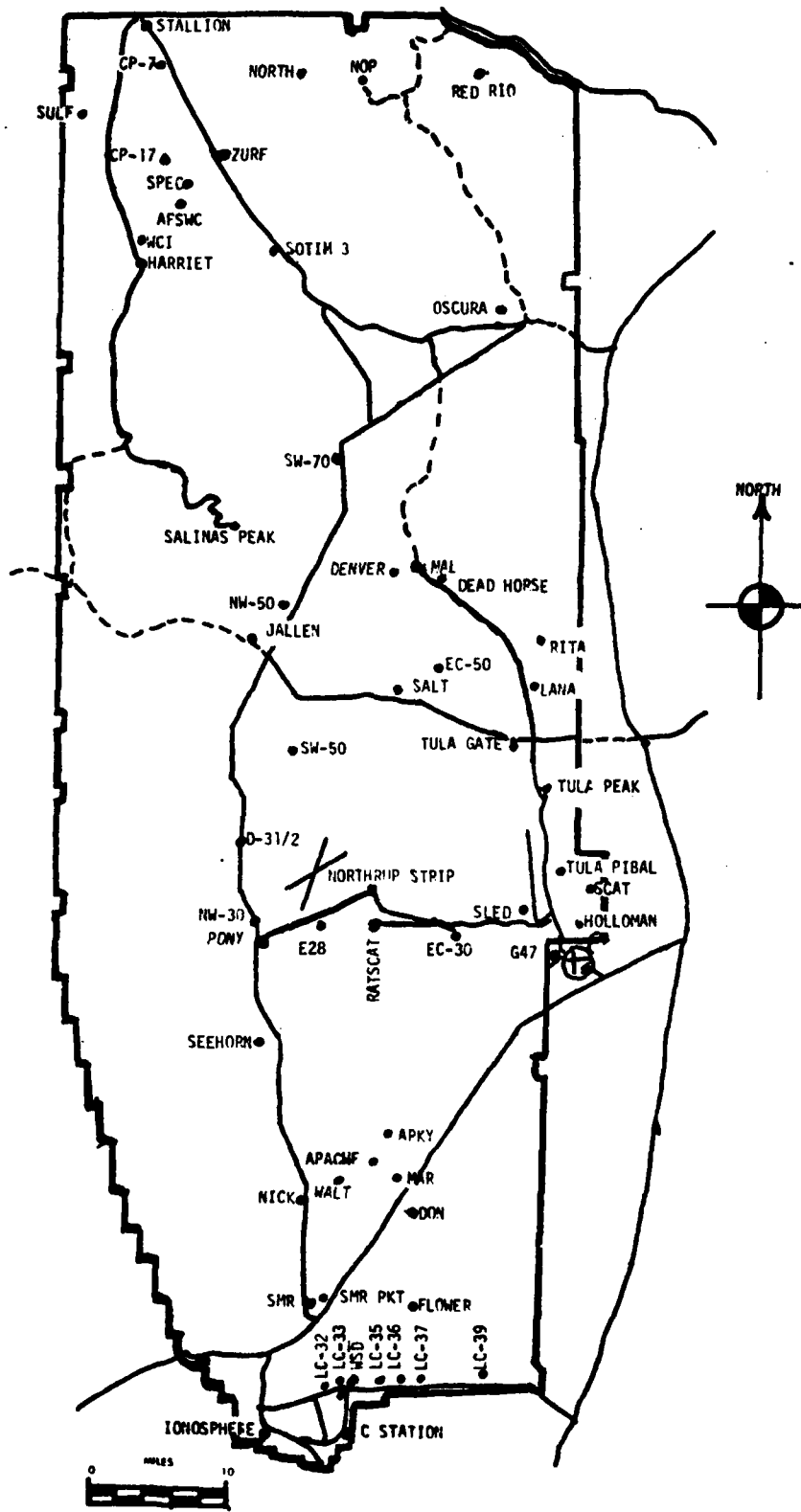
(2) Air structure data (rawinsonde) were collected at the following Met Sites. Data were collected from surface to high as possible in 500-foot increments.

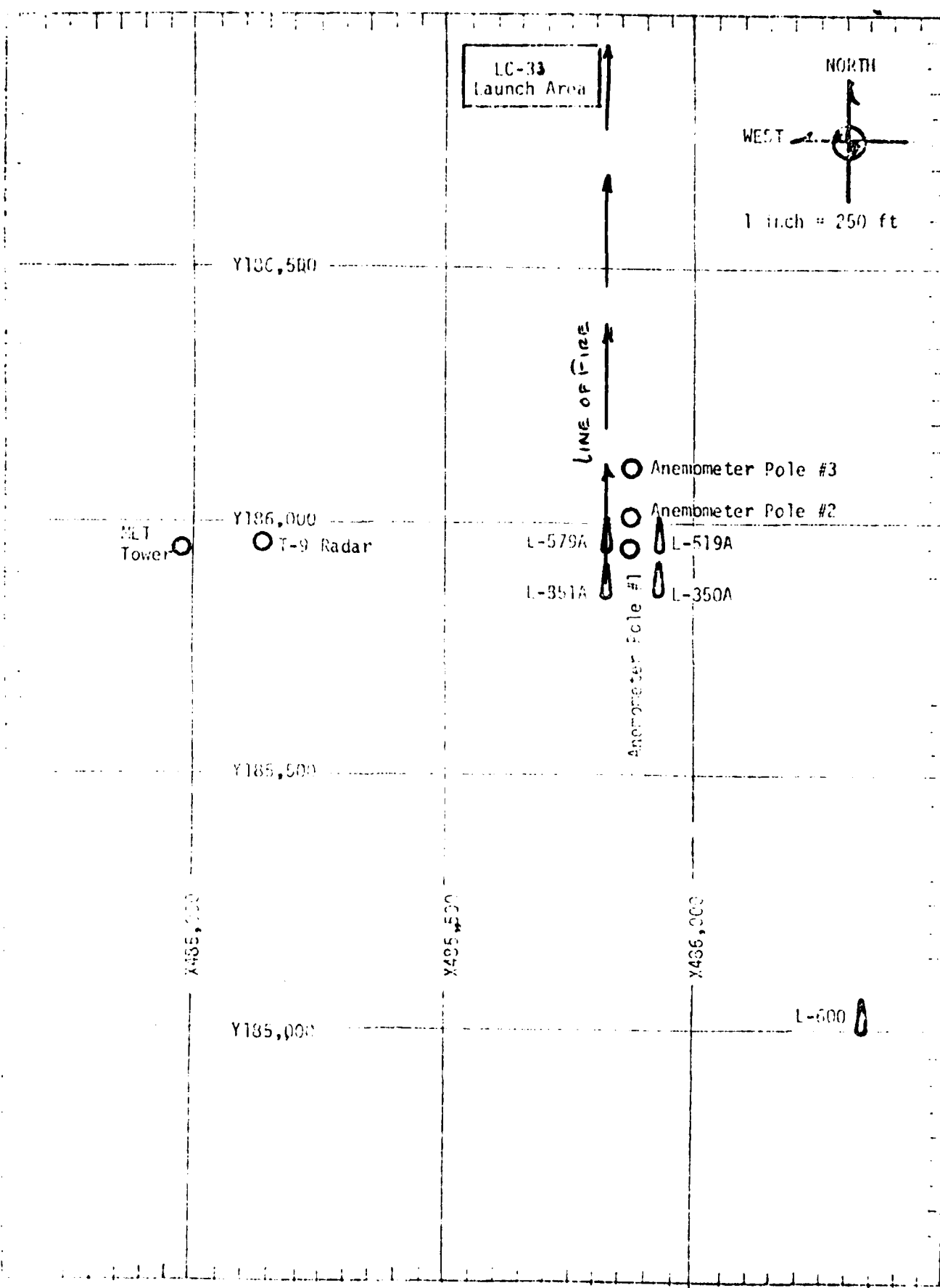
SITE AND TIME

WSD	0850 MST (Launch Area)
JALLEN	0730 MST (Mid-Course)
STALLION	0850 MST (Impact Area)

Accession For	
NTIS GRA&I	<input checked="" type="checkbox"/>
DTIC TAB	<input type="checkbox"/>
Unannounced	<input type="checkbox"/>
Justification	
By _____	
Distribution/	
Availability Codes	
Dist	Avail and/or Special
A	

WSMR METEOROLOGICAL SITES





PERFECT SURFACE OBSERVATION

TABLE 1		STATION 10-23										
DATE 31 Mar 83		X= 431, 002.04		Y= 105, 057.73		H= 3995.00						
TIME M - ST	DAY	MONTH	YEAR	PRESSURE mbs	TEMPERATURE OF °C	DEW POINT OF °C	RELATIVE HUMIDITY %	DENSITY gm/m ³	DIRECTION degs In	WIND SPEED kts	CHARACTER kts	VISIBIL- ITY
0000				977.2	20.0	3.1	33		200	00		00

OBSTRUCTIONS TO VISIBILITY	CLOUDS						REMARKS
	1st LAYER		2nd LAYER		3rd LAYER		
	AMT	HGT	AMT	HGT	AMT	HGT	
	1	AC	13000				

PSYCHROMETRIC COMPUTATION

TIME: '1ST	0000	
DRY BULB TEMP.	20.0	
WET BULB TEMP.	17.7	
WET BULB DEPR.	2.3	
DEW POINT	3.1	
RELATIVE HUMID.	33	

TABLE 2 LC-33 FIXED POLE ANEMOMETER MEASURED WINDS

POLE #1 X485,874.29 Y185,058.90 H4018.74 38.7 ft. AGL			POLE #2 X485,874.29 Y186,012.00 H4033.57 53.0 ft. AGL			POLE #3 X485,877.29 Y186,116.06 H4063.92 83.6 ft. AGL		
T-TIME SEC	DIR DEG	SPEED KNOTS	T-TIME SEC	DIR DEG	SPEED KNOTS	T-TIME SEC	DIR DEG	SPEED KNOTS
-30		CALM	-30		CALM	-30	140	01
-20		CALM	-20		CALM	-20	140	01
-10		CALM	-10		CALM	-10	140	01
0.0		CALM	0.0		CALM	0.0	135	01
+10		CALM	+10		CALM	+10	135	01

TABLE 3 LC-33 METEOROLOGICAL TOWER ANEMOMETER MEASURED WINDS (202 FT TOWER)

LEVEL #1, 12 FEET X484,982.64, Y185,057.73, H3983.00 (base)			LEVEL #2, 62 FEET X484,982.64, Y185,057.73, H3983.00 (base)		
T-TIME SEC	DIR DEG	SPEED KNOTS	T-TIME SEC	DIR DEG	SPEED KNOTS
-30		CALM	-30		CALM
-20		CALM	-20		CALM
-10	000	02	-10		CALM
0.0	000	03	0.0	040	02
+10	000	03	+10	050	02

LEVEL #3, 102 FEET X484,982.64, Y185,057.73, H3983.00 (base)			LEVEL #4, 202 FEET X484,982.64, Y185,057.73, H3983.00 (base)		
T-TIME SEC	DIR DEG	SPEED KNOTS	T-TIME SEC	DIR DEG	SPEED KNOTS
-30		CALM	-30		CALM
-20		CALM	-20		CALM
-10	000	02	-10		CALM
0.0	000	03	0.0		CALM
+10	075	02	+10		CALM

PILOT BALLOON MEASURED WIND DATA

TABLE 1

RELEASED FROM 1501

DATE 31 March 1969

TIME 1000 MST

COORDINATES (WSTM) X=

Y=

104,002.45

H= 3093.75

NOTE: WIND DIRECTIONS ARE REFERENCED TO _____

HEIGHTS ARE METERS AGL _____ OR FEET AGL _____

HEIGHT AGL	DIRECTION DEGREES	SPEED KNOTS
500	135	07
1000	MISC	MISC
1500	MISC	MISC
2000	MISC	MISC
2500	MISC	MISC
3000	MISC	MISC
3500	276	16
4000	273	17
4500	270	17
5000	270	17
5500	276	19
6000	274	19
6500	273	19
7000	270	19
7500	270	19
8000	270	19
8500	270	19
9000	270	19
9500	270	19
10000	270	19
10500	270	19
11000	270	19
11500	270	19
12000	270	19
12500	270	19
13000	270	19
13500	270	19
14000	270	19
14500	270	19
15000	270	19
15500	270	19
16000	270	19
16500	270	19
17000	270	19
17500	270	19
18000	270	19
18500	270	19
19000	270	19
19500	270	19
20000	270	19
20500	270	19
21000	270	19
21500	270	19
22000	270	19
22500	270	19
23000	270	19
23500	270	19
24000	270	19
24500	270	19
25000	270	19
25500	270	19
26000	270	19
26500	270	19
27000	270	19
27500	270	19
28000	270	19
28500	270	19
29000	270	19
29500	270	19
30000	270	19

HEIGHT AGL	DIRECTION DEGREES	SPEED KNOTS
3000	257	13
3100	254	13
3200	252	14
3300	250	14
3400	248	14
3500	244	15
3600	239	16
3700	236	18
3800	235	19
3900	230	20
4000	226	21
4100	253	21
4200	260	23
4300	264	24
4400	267	25
4500	269	26
4600	271	26
4700	272	27
4800	272	28
4900	272	28
5000	272	29
5100	272	30
5200	273	31
5300	273	31
5400	274	32
5500	274	32
5600	274	32
5700	274	33
5800	275	33
5900	275	33

HEIGHT AGL	DIRECTION DEGREES	SPEED KNOTS
6000	276	33
6100	277	34
6200	277	35
6300	277	36
6400	277	37
6500	277	37
6600	276	37
6700	276	37
6800	275	36
6900	275	36
7000	275	34
7100	276	33
7200	277	33
7300	278	32
7400	279	32
7500	278	32
7600	278	32
7700	278	32
7800	279	31
7900	280	31
8000	281	31
8100	283	31
8200	284	31
8300	285	31
8400	285	32
8500	286	32
8600	286	32
8700	287	33
8800	287	33
8900	288	33

TABLE

COMPUTER NET MESSAGE DATA
31 March 1963

0950 0850 MST NETC#1334064 311680122876	JALLEN 0730 MST NETC#1332065 311450140875	STALLION 0850 MST NETC#1332067 311530151243
00267003	29100076	00569005
01350003	29100066	28180075
02510013	29200061	01617004
03406013	29200002	28400065
04886021	29520056	02205007
05420025	29160071	28770030
06426029	27820660	03320000
07500032	27460020	28700001
08510036	27060001	04434021
09500040	26660055	29450754
10500040	26200520	05420025
11510041	25700027	06420026
12510040	25100041	07421031
13510053	24300014	08520034
14500056	23500332	09513041
15400065	22900200	10503042
16520086	22310240	11405047
17521001	21700212	12515049
18500029	21300192	13500059
19500070	21070155	14507061
20500035	21210113	15523066
21510065	20700112	16517003
22510047	20300006	17521009
23510030	19900021	18500005
24500032	19300060	19500030
25510032	18700070	20513072
26510011	18270050	21500069
		22513070
		23501041
		24420015
		25472000
		26543014
		27700062
		28210050
		29260040
		28720033
		28720313
		28600776
		28200731
		27730637
		27460646
		27200607
		26700570
		26300535
		25960501
		25550469
		24940424
		24130369

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STATION ALTITUDE 3989.00 FEET MSL
 31 MAR. 53 0850 HRS MST
 ASCENSION NO. 164

SIGNIFICANT LEVEL DATA
 0900020164
 WHITE SANDS
 TABLE

GEODETIC COORDINATES
 32.40043 LAT DEG
 106.37033 LON DEG

PRESSURE MILLIBARS	GEOMETRIC ALTITUDE MSL FEET	TEMPERATURE AIR DEGREES CENTIGRADE	REL. HUM. PERCENT
875.9	3989.0	18.0	41.0
850.0	4828.9	15.7	33.0
796.8	6625.3	14.7	17.0
700.0	10170.6	7.3	15.0
677.8	11037.6	5.0	16.0
666.0	11508.1	4.9	16.0
587.1	14836.5	-3.2	22.0
500.0	18930.7	-13.9	24.0
400.0	24364.9	-27.0	22.0
336.3	28399.9	-36.7	22.0
300.0	30967.1	-43.4	
285.7	32043.1	-46.0	
250.0	34942.0	-50.0	
236.5	36134.4	-51.0	
200.3	38720.4	-56.6	
200.0	39670.5	-56.5	
182.2	41631.8	-53.8	
168.0	43348.1	-54.3	
150.0	45725.4	-57.5	
113.0	51514.9	-65.6	
100.0	53956.8	-67.2	
82.5	57721.4	-74.2	
77.9	58825.0	-74.2	
74.6	59663.7	-71.3	
73.1	60065.2	-66.2	
70.0	60934.5	-65.2	
59.3	64291.3	-62.7	
57.4	64951.3	-64.6	
55.6	65599.1	-61.4	
50.0	67778.9	-60.5	
40.0	72383.8	-59.4	
39.0	72909.7	-57.8	
34.8	75285.8	-57.8	
32.9	76467.6	-53.8	
30.0	78430.9	-53.2	
28.8	79300.7	-53.2	

UPPER AIR DATA
 0900020164
 WHITE SANDS

STATION ALTITUDE 3989.00 FEET MSL
 31 MAR. 83 0850 HRS MST
 ASCENSION NO. 164

GEODETIC COORDINATES
 32.40043 LAT DEG
 106.37033 LON DEG

GEOMETRIC ALTITUDE MSL FEET	PRESSURE MILLIBARS	AIR TEMPERATURE DEGREES	DEWPOINT CENTIGRADE	REL. HUM. PERCENT	DENSITY GM/CUBIC METER	SPEED OF SOUND KNOTS	WIND DATA		INJEX OF REFRACTION
							DIRECTION DEGREES(TM)	SPEED KNOTS	
3989.0	875.9	18.0	4.6	41.0	1044.2	660.0	150.0	2.9	1.000271
4000.0	875.6	18.0	4.5	40.9	1043.9	665.9	151.4	2.8	1.000270
4500.0	860.0	16.6	1.5	36.1	1030.9	664.1	254.0	3.3	1.000261
5000.0	844.8	15.6	-1.2	31.5	1016.6	662.8	275.2	7.7	1.000252
5500.0	829.7	15.3	-3.5	27.0	999.8	662.4	280.6	12.3	1.000244
6000.0	814.9	15.0	-6.1	22.6	983.3	662.0	283.1	17.1	1.000237
6500.0	800.4	14.8	-9.2	18.1	967.0	661.5	278.9	17.2	1.000229
7000.0	786.0	13.9	-10.9	16.8	952.6	660.5	274.7	17.4	1.000224
7500.0	771.7	12.9	-11.9	16.5	938.8	659.3	274.9	19.5	1.000221
8000.0	757.8	11.8	-13.0	16.2	925.3	658.0	275.2	21.5	1.000217
8500.0	744.1	10.8	-14.0	15.9	911.9	656.8	275.6	23.2	1.000213
9000.0	730.6	9.7	-15.1	15.7	898.8	655.6	276.0	24.9	1.000209
9500.0	717.4	8.7	-16.2	15.4	885.9	654.3	276.0	26.1	1.000206
10000.0	704.4	7.7	-17.2	15.1	873.1	653.1	275.8	26.9	1.000202
10500.0	691.5	6.4	-18.0	15.4	860.9	651.7	275.6	27.6	1.000199
11000.0	678.7	5.1	-18.6	16.0	849.1	650.1	275.5	28.4	1.000196
11500.0	666.2	4.9	-18.8	16.0	834.0	649.9	275.3	29.2	1.000193
12000.0	653.7	3.7	-19.1	16.9	821.9	648.5	275.0	31.0	1.000190
12500.0	641.4	2.5	-19.5	17.8	810.1	647.0	274.7	33.0	1.000187
13000.0	629.4	1.3	-20.0	18.7	798.4	645.6	277.4	34.2	1.000184
13500.0	617.6	.1	-20.4	19.6	786.9	644.2	281.3	35.3	1.000181
14000.0	606.0		-20.9	20.5	775.6	642.7	284.3	35.6	1.000179
14500.0	594.6		-21.5	21.4	764.5	641.3	287.0	35.4	1.000176
15000.0	583.3		-22.2	22.1	753.5	639.8	287.2	36.2	1.000173
15500.0	572.0		-23.1	22.3	742.5	638.2	286.3	37.3	1.000170
16000.0	560.9		-24.1	22.6	731.7	636.7	286.0	38.3	1.000168
16500.0	550.0		-25.1	22.8	721.0	635.1	286.0	39.4	1.000165
17000.0	539.3		-26.1	23.1	710.5	633.5	285.7	39.8	1.000162
17500.0	528.9		-27.1	23.3	700.2	631.9	285.3	39.4	1.000160
18000.0	518.6		-28.1	23.5	690.1	630.3	285.3	39.6	1.000157
18500.0	508.5		-29.2	23.8	680.1	628.8	285.9	40.3	1.000155
19000.0	498.6		-30.2	24.0	670.1	627.2	286.8	41.2	1.000152
19500.0	488.4		-31.3	23.8	659.6	625.7	287.9	42.4	1.000149
20000.0	478.5		-32.4	23.6	649.3	624.2	289.2	43.6	1.000147
20500.0	468.8		-33.5	23.4	639.1	622.8	291.1	44.6	1.000144
21000.0	459.3		-34.7	23.2	629.1	621.3	292.7	45.7	1.000142
21500.0	449.9		-35.8	23.1	619.2	619.8	293.2	47.3	1.000140
22000.0	440.8		-36.9	22.9	609.6	618.3	293.3	48.9	1.000137
22500.0	431.8		-38.0	22.7	600.1	616.8	291.6	49.9	1.000135
23000.0	423.1		-39.1	22.5	590.7	615.3	290.2	50.9	1.000133

UPPER AIR DATA
 0900020164
 WHITE SANDS
 106.37033 LON DEG

STATION ALTITUDE 3989.00 FEET MSL
 31 MAR. 63 0850 HRS MST
 ASCENSION NO. 164

GEODETIC COORDINATES
 32.48043 LAT DEG
 106.37033 LON DEG

GEOMETRIC ALTITUDE MSL FEET	PRESSURE MILLIBARS	TEMPERATURE AIR DEGREES CENTIGRADE	REL. HUM. PERCENT	DENSITY GM/CUBIC METER	SPEED OF SOUND KNOTS	WIND DATA DIRECTION DEGREES(TN)	SPEED KNOTS	INDEX OF REFRACTION
23500.0	414.5	-24.9	22.3	581.5	613.8	289.8	51.3	1.000131
24000.0	406.0	-26.1	22.1	572.5	612.4	289.6	51.9	1.000129
24500.0	397.7	-27.3	22.0	563.5	610.9	289.9	52.7	1.000126
25000.0	389.2	-28.5	22.0	554.2	609.4	289.2	52.9	1.000124
25500.0	381.0	-29.7	22.0	545.1	607.9	287.3	52.4	1.000122
26000.0	372.8	-30.9	22.0	536.2	606.3	285.3	52.5	1.000120
26500.0	364.9	-32.1	22.0	527.4	604.8	283.4	53.1	1.000118
27000.0	357.2	-33.3	22.0	518.8	603.3	283.7	55.2	1.000116
27500.0	349.6	-34.5	22.0	510.3	601.8	284.4	57.7	1.000114
28000.0	342.1	-35.7	22.0	502.0	600.3	285.6	57.1	1.000112
28500.0	334.8	-37.0	21.1**	493.8	598.7	286.9	56.1	1.000110
29000.0	327.4	-38.3	16.9**	485.6	597.1	287.6	56.0	1.000108
29500.0	320.2	-39.6	12.6**	477.6	595.4	288.3	56.0	1.000107
30000.0	313.2	-40.9	8.3**	469.7	593.7	289.2	59.0	1.000105
30500.0	306.3	-42.2	4.0**	462.0	592.1	290.0	62.1	1.000103
31000.0	299.6	-43.5		454.4	590.4	290.8	64.5	1.000101
31500.0	292.8	-44.7		446.5	588.8	291.6	67.0	1.000099
32000.0	286.3	-45.9		438.8	587.3	291.4	68.4	1.000098
32500.0	279.8	-46.6		430.2	586.3	291.1	69.7	1.000096
33000.0	273.4	-47.3		421.7	585.4	290.6	70.6	1.000094
33500.0	267.2	-48.0		413.4	584.5	290.4	71.8	1.000092
34000.0	261.1	-48.7		405.2	583.7	291.6	73.6	1.000090
34500.0	255.1	-49.4		397.2	582.8	293.0	75.8	1.000088
35000.0	249.3	-50.0		389.3	581.9	294.9	78.6	1.000087
35500.0	243.6	-50.5		381.1	581.4	295.9	82.3	1.000085
36000.0	238.0	-50.9		373.0	580.8	296.1	86.8	1.000083
36500.0	232.4	-51.8		365.8	579.6	295.6	91.4	1.000081
37000.0	227.0	-52.9		359.0	578.2	294.8	95.9	1.000080
37500.0	221.7	-54.0		352.4	576.8	294.2	97.5	1.000078
38000.0	216.5	-55.0		345.9	575.4	293.7	96.9	1.000077
38500.0	211.5	-56.1		339.5	573.9	292.8	95.2	1.000076
39000.0	206.5	-56.6		332.2	573.3	291.3	91.2	1.000074
39500.0	201.6	-56.5		324.3	573.4	289.7	87.4	1.000072
40000.0	196.9	-56.0		315.9	574.0	287.5	86.6	1.000070
40500.0	192.3	-55.4		307.5	574.9	285.4	85.8	1.000069
41000.0	187.8	-54.7		299.4	575.8	284.1	85.3	1.000067
41500.0	183.3	-54.0		291.4	576.7	283.2	84.9	1.000065
42000.0	179.1	-53.9		284.5	576.8	282.5	83.9	1.000063
42500.0	174.9	-54.1		278.0	576.7	282.4	82.2	1.000062
43000.0	170.8	-54.2		271.7	576.5	282.4	80.6	1.000061

AT LEAST ONE ASSUMED RELATIVE HUMIDITY VALUE WAS USED IN THE INTERPOLATION.

STATION ALTITUDE 3989.00 FEET, MSL
 31 MAR, 83
 ASCENSION NO. 164

APPL. DATA
 0900020164
 WHITE SANDS

GEODETIC COORDINATES
 32.40043 LAT DEG
 106.37033 LON DEG

GEOMETRIC ALTITUDE MSL FEET	PRESSURE MILLIBARS	AIR TEMPERATURE DEGREES CENTIGRADE	REL. HUM. PERCENT	DENSITY GM/CUBIC METER	SPEED OF SOUND KNOTS	WIND DIRECTION DEGREES(TN)	WIND DATA SPEED KNOTS	INDEX OF REFRACTION
43500.0	160.8	-54.5		265.7	576.1	282.9	81.0	1.000059
44000.0	162.9	-55.2		260.3	575.2	283.3	81.3	1.000058
44500.0	159.0	-55.9		254.9	574.3	282.9	82.7	1.000057
45000.0	155.3	-56.5		249.7	573.4	282.2	84.3	1.000056
45500.0	151.6	-57.2		244.6	572.5	281.2	85.6	1.000054
46000.0	148.0	-57.9		239.5	571.6	279.9	86.8	1.000053
46500.0	144.4	-58.6		234.5	570.7	278.9	88.0	1.000052
47000.0	140.9	-59.3		229.6	569.7	280.2	88.9	1.000051
47500.0	137.5	-60.0		224.7	568.8	281.5	89.8	1.000050
48000.0	134.2	-60.7		220.0	567.9	283.1	88.8	1.000049
48500.0	131.0	-61.4		215.4	566.9	285.0	87.1	1.000048
49000.0	127.8	-62.1		210.9	566.0	286.9	85.5	1.000047
49500.0	124.7	-62.8		206.5	565.0	286.9	81.8	1.000046
50000.0	121.7	-63.5		202.2	564.1	287.0	78.1	1.000045
50500.0	118.6	-64.2		198.0	563.2	286.9	74.3	1.000044
51000.0	115.9	-64.9		193.8	562.2	286.5	70.7	1.000043
51500.0	113.1	-65.6		189.8	561.3	286.1	67.0	1.000042
52000.0	110.3	-65.9		185.4	560.8	286.0	62.6	1.000041
52500.0	107.6	-66.2		181.1	560.4	286.2	57.8	1.000040
53000.0	104.9	-66.6		176.9	559.9	286.4	53.1	1.000039
53500.0	102.3	-66.9		172.8	559.5	286.6	50.0	1.000038
54000.0	99.8	-67.3		168.8	559.0	286.9	46.9	1.000038
54500.0	97.3	-68.2		165.3	557.7	286.9	44.0	1.000037
55000.0	94.8	-69.1		161.9	556.4	286.6	41.3	1.000036
55500.0	92.4	-70.1		158.5	555.2	286.2	38.5	1.000035
56000.0	90.1	-71.0		155.2	553.9	285.7	35.5	1.000035
56500.0	87.8	-71.9		152.0	552.6	285.1	32.3	1.000034
57000.0	85.6	-72.9		148.9	551.4	284.4	29.1	1.000033
57500.0	83.4	-73.8		145.8	550.1	284.2	27.9	1.000032
58000.0	81.3	-74.2		142.4	549.5	284.1	26.9	1.000032
58500.0	79.2	-74.2		138.7	549.5	284.0	26.4	1.000031
59000.0	77.2	-73.6		134.8	550.3	284.3	27.4	1.000030
59500.0	75.2	-71.9		130.2	552.7	284.5	28.5	1.000029
60000.0	73.3	-67.0		124.0	554.3	285.0	30.2	1.000028
60500.0	71.5	-65.7		120.1	561.1	285.4	32.2	1.000027
61000.0	69.8	-65.2		116.9	561.9	285.8	34.2	1.000026
61500.0	68.1	-64.8		113.8	562.4	286.1	37.3	1.000025
62000.0	66.4	-64.4		110.8	562.9	286.4	40.4	1.000025
62500.0	64.8	-64.0		107.9	563.4	286.6	43.2	1.000024
63000.0	63.2	-63.7		105.1	563.9	286.8	45.2	1.000023

GEODETIC COORDINATES
 32.40043 LAT DEG
 106.37033 LON DEG

UPPER AIR DATA
 0900020164
 WHITE SANDS
 TYPICAL

STATION ALTITUDE 3989.00 FEET MSL
 31 MAR. 83
 ASCENSION NO. 164
 0850 HRS MST

GEOMETRIC ALTITUDE MSL FEET	PRESSURE MILLIBARS	TEMPERATURE AIR DEGREES CENTIGRADE	REL. HUM. PERCENT	DENSITY GM/CUBIC METER	SPEED OF SOUND KNOTS	WIND DATA		INJEX OF REFRACTION
						DIRECTION DEGREES(TN)	SPEED KNOTS	
63500.0	61.7	-63.3		102.4	564.4	286.9	47.3	1.000023
64000.0	60.2	-62.9		99.7	564.9	287.0	45.8	1.000022
64500.0	58.7	-63.3		97.4	564.4	287.1	39.9	1.000022
65000.0	57.3	-64.4		95.5	562.9	287.3	33.9	1.000021
65500.0	55.9	-61.9		92.1	566.2	287.4	27.3	1.000021
66000.0	54.5	-61.2		89.6	567.1	287.4	20.0	1.000020
66500.0	53.2	-61.0		87.4	567.4	287.4	12.7	1.000019
67000.0	51.9	-60.8		85.2	567.7	287.3	5.6	1.000019
67500.0	50.7	-60.6		83.1	568.0	109.7	1.4	1.000018
68000.0	49.5	-60.4		81.0	568.2	108.1	8.4	1.000018
68500.0	48.3	-60.3		79.0	568.3	108.2	17.2	1.000018
69000.0	47.1	-60.2		77.1	568.5	108.3	27.0	1.000017
69500.0	46.0	-60.1		75.2	568.7	108.4	36.7	1.000017
70000.0	44.9	-60.0		73.4	568.8	110.0	36.5	1.000016
70500.0	43.8	-59.8		71.6	569.0	113.2	31.0	1.000016
71000.0	42.8	-59.7		69.8	569.1	117.8	25.6	1.000016
71500.0	41.8	-59.6		68.1	569.3	127.9	14.1	1.000015
72000.0	40.8	-59.5		66.4	569.4	229.3	5.2	1.000015
72500.0	39.8	-59.0		64.7	570.0	275.4	19.1	1.000014
73000.0	38.8	-57.8		62.8	571.7	284.7	29.1	1.000014
73500.0	37.9	-57.8		61.3	571.7	291.8	35.5	1.000014
74000.0	37.0	-57.8		59.9	571.7	296.6	42.3	1.000013
74500.0	36.1	-57.8		58.5	571.7	301.8	38.1	1.000013
75000.0	35.3	-57.8		57.1	571.7	313.6	24.5	1.000013
75500.0	34.4	-57.1		55.5	572.7	347.1	14.1	1.000012
76000.0	33.6	-55.4		53.8	574.9	79.0	22.6	1.000012
76500.0	32.8	-53.8		52.2	577.0	97.4	50.3	1.000012
77000.0	32.1	-53.6		50.9	577.2			1.000011
77500.0	31.3	-53.5		49.7	577.4			1.000011
78000.0	30.6	-53.3		48.5	577.6			1.000011
78500.0	29.9	-53.2		47.4	577.8			1.000011
79000.0	29.2	-53.2		46.3	577.8			1.000010

STATION ALTITUDE 3989.00 Feet MSL
 31 MAR. 83 0850 HRC MST
 ASCENSION NO. 164

INC 3 LEVELS
 0500z J164
 WHITE SANDS

GEODETIC COORDINATES
 32.40043 LAT DEG
 106.37033 LON DEG

PRESSURE GEOPOTENTIAL MILLIBARS	TEMPERATURE AIR DEGREES CENTIGRADE	REL. HUMIDITY PERCENT	WIND DATA	
			DIRECTION (DEGREES(TN))	SPEED KNOTS
850.0	15.7	33.	271.3	6.1
800.0	14.8	18.	278.8	17.2
750.0	11.2	16.	275.4	22.5
700.0	7.3	15.	275.8	27.1
650.0	3.3	17.	274.9	31.6
600.0	-1.8	21.	285.7	35.5
550.0	-7.5	23.	286.0	39.4
500.0	-13.9	24.	286.6	41.0
450.0	-20.1	23.	293.3	47.4
400.0	-27.0	22.	289.9	52.5
350.0	-34.5	22.	284.4	57.6
300.0	-43.4		290.8	64.3
250.0	-50.0		294.6	78.2
200.0	-56.5		289.0	87.1
175.0	-54.0		282.4	82.3
150.0	-57.5		280.7	86.1
125.0	-62.7		286.9	82.1
100.0	-67.2		286.9	47.3
80.0	-74.2		284.0	28.4
70.0	-65.2		285.7	33.8
60.0	-62.9		287.0	45.6
50.0	-60.5		108.3	4.8
40.0	-59.4		270.8	14.4
30.0	-53.2			

** AT LEAST ONE ASSUMED RELATIVE HUMIDITY VALUE WAS USED IN THE INTERPOLATION.

STATION ALTITUDE 4051.00 FFF. MSL
 31 MAR. 83 0730 HRS MST
 ASCENSION NO. 63

SI (FI) LEVEL DATA
 090000063
 JALLEN

GEODETIC COORDINATES
 33.16712 LAT DEG
 106.49511 LON DEG

PRESSURE GEOMETRIC MILLIBARS	ALTITUDE MSL FEET	TEMPERATURE		REL. HUM. PERCENT
		AIR DEGREES CENTIGRADE	DEWPOINT CENTIGRADE	
875.3	4051.0	7.9	-0.1	57.0
870.1	4212.6	8.5	-2.4	46.0
865.8	4347.2	8.8	-1.9	47.0
860.6	4511.9	12.1	.2	44.0
850.0	4853.9	13.9	-3.8	29.0
820.8	5821.6	14.3	-6.0	24.0
766.8	7698.5	11.8	-8.1	24.0
724.2	9259.5	8.8	-14.9	17.0
700.0	10178.7	6.5	-17.5	16.0
668.8	11400.0	3.4	-20.0	16.0
641.4	12511.6	2.1	-21.1	16.0
606.2	13998.8	-1.3	-23.8	16.0
571.6	15527.2	-5.1	-22.0	25.0
500.0	18925.0	-14.2	-29.0	27.0
420.5	23158.4	-24.7	-39.0	25.0
400.0	24347.9	-27.7	-42.0	24.0
377.7	25697.8	-30.3	-45.9	20.0
343.7	27878.8	-36.3	-49.1	25.0
326.9	29016.6	-39.0	-51.5	25.0
300.0	30933.4	-44.3		
271.2	33136.9	-49.2		
259.5	34084.8	-51.4		
250.0	34881.6	-51.9		
239.0	35843.5	-51.2		
212.0	38375.4	-57.3		
200.0	39595.6	-55.0		
183.9	41378.4	-51.1		
162.0	44083.5	-53.2		
150.0	45703.4	-57.1		
135.2	47858.8	-59.5		
129.5	48741.8	-62.3		
111.0	51836.4	-68.4		
100.0	53890.0	-70.6		
86.2	56780.0	-73.0		
80.3	58167.6	-68.4		
77.7	58828.4	-62.6		
70.0	60935.4	-56.1		
64.3	62641.1	-54.9		
61.6	63513.0	-51.1		
50.0	67798.4	-40.6		

STATION ALTITUDE 4051.00 FEET MSL
 31 MAR. 83 0730 HRS MST
 ASCENSION NO. 63

STATION NAME JALLEN
 OPERATOR JALLEN
 EVEL DATA 063

GEODETIC COORDINATES
 33.16712 LAT DEG
 106.49511 LON DEG

WIND DIRECTION

PRESSURE GEOMETRIC MILLIBARS MSL FEET	TEMPERATURE		REL. HUM. PERCENT
	AIR DEGREES	DEWPOINT CENTIGRADE	
44.9 70013.5	-60.2		
40.2 72295.4	-59.7		
33.2 76267.5	-55.6		
30.0 78426.0	-55.0		
20.2 86829.2	-52.8		

GEODETIC COORDINATES
 33.16712 LAT DEG
 106.49511 LON DEG

IPP DATA
 090000J063
 JALLEN
 030000

STATION ALTITUDE 4051.00 FEE MSL
 31 MAR. 83 0730 HRS MST
 ASCENSION NO. 63

GEOMETRIC ALTITUDE MSL FEET	PRESSURE MILLIBARS	AIR TEMPERATURE DEGREES CENTIGRADE	TEMPERATURE DEWPOINT DEGREES CENTIGRADE	REL. HUMID. PERCENT	DENSITY GM/CUBIC METER	SPEED OF SOUND KNOTS	WIND DATA DIRECTION DEGREES(TN)	SPEED KNOTS	INDEX OF REFRACTION
4051.0	875.3	7.9	-1.1	57.0	1082.1	654.0	320.0	5.1	1.000270
4500.0	861.0	11.9	.1	44.2	1049.5	658.6	294.7	3.4	1.000263
5000.0	845.5	14.0	-4.1	28.2	1023.9	660.8	246.0	3.2	1.000249
5500.0	830.4	14.2	-5.2	25.7	1004.9	661.0	214.3	4.9	1.000243
6000.0	815.5	14.1	-6.2	24.0	987.4	660.8	204.3	7.2	1.000238
6500.0	800.9	13.4	-6.7	24.0	971.9	660.0	220.0	10.1	1.000234
7000.0	786.5	12.7	-7.3	24.0	956.7	659.3	228.4	13.4	1.000230
7500.0	772.3	12.1	-7.9	24.0	941.8	658.5	235.5	16.4	1.000226
8000.0	758.4	11.2	-9.3	22.6	927.7	657.5	240.4	19.6	1.000221
8500.0	744.6	10.3	-11.4	20.4	914.1	656.3	248.4	19.7	1.000216
9000.0	731.1	9.3	-13.7	18.2	900.7	655.1	256.7	19.7	1.000211
9500.0	717.8	8.2	-15.5	16.7	887.9	653.8	265.1	17.7	1.000207
10000.0	704.6	6.9	-17.0	16.2	875.6	652.5	273.8	17.0	1.000203
10500.0	691.7	5.7	-18.1	16.0	863.4	650.8	277.5	19.4	1.000199
11000.0	678.9	4.4	-19.2	16.0	851.4	649.3	279.7	22.1	1.000196
11500.0	666.3	3.3	-20.1	16.0	839.1	647.9	280.3	25.2	1.000193
12000.0	653.9	2.7	-20.6	16.0	825.2	647.3	280.1	27.0	1.000190
12500.0	641.7	2.1	-21.0	16.0	811.5	646.6	279.0	27.4	1.000186
13000.0	629.6	1.0	-22.0	16.0	799.6	645.2	278.8	29.2	1.000183
13500.0	617.8	-2	-22.9	16.0	787.9	643.9	279.1	31.9	1.000180
14000.0	606.2	-1.3	-23.8	16.0	776.4	642.5	283.9	34.3	1.000177
14500.0	594.6	-2.5	-23.0	19.0	765.0	641.1	288.5	36.8	1.000175
15000.0	583.3	-3.8	-22.4	21.9	753.9	639.6	290.8	37.3	1.000173
15500.0	572.2	-5.0	-22.0	24.8	742.9	638.1	291.2	38.3	1.000171
16000.0	561.1	-6.4	-23.0	25.3	732.2	636.5	289.1	39.9	1.000168
16500.0	550.1	-7.7	-24.0	25.6	721.5	634.9	288.3	41.2	1.000165
17000.0	539.4	-9.0	-25.0	25.9	711.1	633.3	288.3	42.2	1.000163
17500.0	528.9	-10.4	-26.1	26.2	700.8	631.7	287.2	42.5	1.000160
18000.0	518.6	-11.7	-27.1	26.5	690.7	630.0	285.7	42.5	1.000157
18500.0	508.4	-13.1	-28.2	26.7	680.7	628.4	284.0	44.0	1.000155
19000.0	498.5	-14.4	-29.2	27.0	670.8	626.8	282.8	45.4	1.000152
19500.0	488.4	-15.6	-30.4	26.7	660.4	625.3	283.9	45.9	1.000150
20000.0	478.5	-16.9	-31.6	26.5	650.2	623.8	284.8	45.9	1.000147
20500.0	468.6	-18.1	-32.7	26.3	640.1	622.3	285.2	45.1	1.000145
21000.0	459.3	-19.3	-33.9	26.0	630.3	620.7	286.2	45.9	1.000142
21500.0	450.0	-20.6	-35.1	25.8	620.6	619.2	287.5	48.1	1.000140
22000.0	440.9	-21.8	-36.3	25.5	611.0	617.7	289.4	50.5	1.000138
22500.0	432.0	-23.1	-37.4	25.3	601.6	616.1	291.4	53.0	1.000135
23000.0	423.2	-24.3	-38.6	25.1	592.4	614.6	291.7	54.1	1.000133
23500.0	414.5	-25.6	-39.8	24.7	583.1	613.1	291.4	54.5	1.000131

STATION ALTITUDE 4051.00 FFF: MSL
 31 MAR. 63 0730 HRS MST
 ASCENSION NO. 63

JPP. DATA
 0900030063
 JALLEN

GEODETIC COORDINATES
 33.16712 LAT DEG
 106.49511 LON DEG

TABLE NO. 00001

GEOMETRIC ALTITUDE MSL FEET	PRESSURE MILLIBARS	TEMPERATURE		REL. HUM. PERCENT	DENSITY GM/CUBIC METER	SPEED OF SOUND KNOTS	WIND DATA		INDEX OF REFRACTION
		AIR DEGREES CENTIGRADE	DEWPOINT CENTIGRADE				DIRECTION DEGREES(TN)	SPEED KNOTS	
24000.0	405.9	-26.8	-41.1	24.3	573.9	611.5	289.7	55.2	1.000129
24500.0	397.4	-28.0	-42.4	23.5	564.7	610.0	287.7	56.0	1.000127
25000.0	389.1	-29.0	-43.8	22.1	555.0	608.8	286.7	56.6	1.000124
25500.0	380.9	-29.9	-45.3	20.6	545.5	607.2	285.6	57.1	1.000122
26000.0	372.8	-31.1	-46.3	20.7	536.6	606.1	284.0	56.9	1.000120
26500.0	364.8	-32.5	-47.0	21.8	528.1	604.4	283.1	57.3	1.000118
27000.0	357.0	-33.9	-47.7	23.0	519.8	602.6	282.9	58.3	1.000116
27500.0	349.4	-35.3	-48.5	24.1	511.6	600.9	283.8	59.7	1.000114
28000.0	341.9	-36.6	-49.3	25.0	503.4	599.2	285.2	61.2	1.000113
28500.0	334.4	-37.8	-50.4	25.0	494.9	597.7	285.9	61.5	1.000111
29000.0	327.1	-39.0	-51.4	25.0	486.6	596.2	286.6	61.6	1.000109
29500.0	319.9	-40.3	-52.0	18.2**	478.7	594.4	287.6	61.3	1.000107
30000.0	312.8	-41.7	-53.6	12.2**	470.9	592.7	288.8	61.2	1.000105
30500.0	305.9	-43.1	-55.4	5.7**	463.2	590.9	290.4	62.3	1.000103
31000.0	299.1	-44.4			455.6	589.2	292.0	63.6	1.000101
31500.0	292.3	-45.6			447.4	587.7	293.2	65.4	1.000100
32000.0	285.7	-46.7			439.5	586.3	293.9	67.6	1.000098
32500.0	279.2	-47.8			431.6	584.8	294.0	70.2	1.000096
33000.0	272.9	-48.9			423.9	583.4	293.4	72.4	1.000094
33500.0	266.7	-50.0			416.4	581.9	292.4	74.4	1.000093
34000.0	260.5	-51.2			408.9	580.4	291.6	75.6	1.000091
34500.0	254.5	-51.7			400.3	579.8	290.9	76.3	1.000089
35000.0	248.6	-51.8			391.3	579.6	291.0	81.5	1.000087
35500.0	242.9	-51.5			381.6	580.1	291.5	88.5	1.000085
36000.0	237.2	-51.6			373.0	579.9	292.2	97.6	1.000083
36500.0	231.7	-52.8			366.3	578.3	292.8	107.2	1.000082
37000.0	226.3	-52.0			359.7	576.7	293.3	106.1	1.000080
37500.0	221.0	-55.2			353.2	575.2	293.9	104.5	1.000079
38000.0	215.8	-56.4			346.8	573.6	293.6	101.0	1.000077
38500.0	210.7	-57.1			339.8	572.7	293.2	97.3	1.000076
39000.0	205.8	-56.1			330.3	573.9	291.6	98.0	1.000074
39500.0	200.9	-55.2			321.1	575.2	289.9	99.3	1.000072
40000.0	196.2	-54.1			312.1	576.6	288.5	99.1	1.000070
40500.0	191.7	-53.0			303.3	578.0	287.1	98.7	1.000068
41000.0	187.2	-51.9			294.8	579.4	286.6	97.2	1.000066
41500.0	182.9	-51.2			287.0	580.4	286.2	95.5	1.000064
42000.0	178.6	-51.6			280.8	579.9	286.3	93.2	1.000063
42500.0	174.5	-52.0			274.8	579.4	286.5	90.9	1.000061
43000.0	170.4	-52.4			268.9	578.9	286.7	86.5	1.000060
43500.0	166.5	-52.7			263.2	578.4	286.9	81.8	1.000059

** AT LEAST ONE ASSUMED RELATIVE HUMIDITY VALUE WAS USED IN THE INTERPOLATION.

STATION ALTITUDE 4051.00 FEET MSL
 31 MAR. 83 0730 HRS MST
 ASCENSION NO. 63

IPP DATA
 050600063
 JALLEN
 051110 000000

GEODETIC COORDINATES
 33.16712 LAT DEG
 106.49511 LON DEG

GEOMETRIC ALTITUDE MSL FEET	PRESSURE MILLIBARS	TEMPERATURE AIR DEGREES	REL. HUM. PERCENT	DENSITY GM/CUBIC METER	SPEED OF SOUND KNOTS	WIND DIRECTION DEGREES(TN)	WIND SPEED KNOTS	INDEX OF REFRACTION
44000.0	162.6	-53.1		257.5	577.9	287.1	79.4	1.000057
44500.0	158.8	-54.2		252.7	576.5	287.2	78.0	1.000056
45000.0	155.1	-55.4		248.1	574.9	287.2	78.3	1.000055
45500.0	151.5	-56.6		243.7	573.3	287.2	80.2	1.000054
46000.0	147.9	-57.4		238.8	572.2	287.3	81.5	1.000053
46500.0	144.4	-58.0		233.7	571.5	287.3	80.8	1.000052
47000.0	140.9	-58.5		228.7	570.7	287.2	80.2	1.000051
47500.0	137.6	-59.1		223.9	570.0	287.3	78.7	1.000050
48000.0	134.3	-59.9		219.4	568.8	287.3	77.1	1.000049
48500.0	131.0	-61.5		215.7	566.7	287.3	75.6	1.000048
49000.0	127.8	-62.8		211.7	565.0	287.3	74.4	1.000047
49500.0	124.7	-63.8		207.5	563.7	287.3	73.1	1.000046
50000.0	121.6	-64.8		203.4	562.4	287.1	72.3	1.000045
50500.0	118.6	-65.8		199.3	561.0	287.0	71.6	1.000044
51000.0	115.7	-66.8		195.3	559.7	286.7	70.6	1.000043
51500.0	112.9	-67.7		191.4	558.4	286.4	69.6	1.000042
52000.0	110.1	-68.6		187.5	557.2	286.0	68.5	1.000041
52500.0	107.3	-69.1		183.2	556.5	285.8	69.8	1.000040
53000.0	104.6	-69.6		179.1	555.8	285.6	71.0	1.000039
53500.0	102.0	-70.2		175.1	555.0	285.5	73.4	1.000038
54000.0	99.4	-70.7		171.1	554.3	285.5	76.0	1.000037
54500.0	96.9	-71.1		167.1	553.8	285.6	76.6	1.000036
55000.0	94.5	-71.5		163.2	553.2	285.7	76.2	1.000035
55500.0	92.1	-71.9		159.4	552.6	285.9	74.6	1.000035
56000.0	89.7	-72.4		155.7	552.0	286.0	71.9	1.000035
56500.0	87.4	-72.8		152.0	551.5	286.2	68.5	1.000034
57000.0	85.2	-72.3		147.8	552.2	286.3	60.5	1.000033
57500.0	83.1	-70.6		142.9	554.4	286.5	52.6	1.000032
58000.0	81.0	-69.0		138.2	556.7	286.5	42.7	1.000031
58500.0	79.0	-65.5		132.5	561.4	286.6	32.0	1.000030
59000.0	77.0	-62.9		127.6	564.9	286.4	22.7	1.000028
59500.0	75.2	-63.7		125.0	563.8	285.1	17.6	1.000028
60000.0	73.3	-64.5		122.4	562.7	282.8	12.5	1.000027
60500.0	71.5	-65.4		119.9	561.6	279.2	12.9	1.000027
61000.0	69.8	-66.1		117.4	560.6	276.2	14.3	1.000026
61500.0	68.1	-65.7		114.3	561.1	274.6	16.3	1.000025
62000.0	66.4	-65.4		111.3	561.6	274.0	18.7	1.000025
62500.0	64.8	-65.0		108.4	562.1	273.5	20.8	1.000024
63000.0	63.2	-63.3		104.9	564.3	273.3	21.6	1.000023
63500.0	61.6	-61.2		101.3	567.2	273.1	22.5	1.000023

STATION ALTITUDE 4051.00 FEET MSL
 31 MAR. 83 0730 HRS MST
 ASCENSION NO. 63

IPF 0900030063
 JALLEN

GEODETIC COORDINATES
 33.14712 LAT DEG
 106.49511 LON DEG

GEOMETRIC ALTITUDE MSL FEET	PRESSURE MILLIBARS	AIR TEMPERATURE DEGREES CENTIGRADE	REL. HUM. PERCENT	DENSITY GM/CUBIC METER	SPEED OF SOUND KNOTS	WIND DIRECTION DEGREES (TN)	WIND SPEED KNOTS	INDEX OF REFRACTION
64000.0	60.2	-61.0		98.8	567.4	274.4	20.1	1.000022
64500.0	58.7	-61.0		96.4	567.5	276.2	17.6	1.000021
65000.0	57.3	-60.9		94.1	567.5	279.8	14.6	1.000021
65500.0	55.9	-60.9		91.8	567.6	287.4	11.2	1.000020
66000.0	54.6	-60.8		89.5	567.7	300.4	8.3	1.000020
66500.0	53.3	-60.8		87.4	567.8	306.5	7.6	1.000019
67000.0	52.0	-60.7		85.2	567.8	313.6	7.1	1.000019
67500.0	50.7	-60.6		83.2	567.9	319.8	7.5	1.000019
68000.0	49.5	-60.6		81.1	568.0	313.7	8.5	1.000018
68500.0	48.3	-60.5		79.2	568.1	311.7	9.6	1.000018
69000.0	47.2	-60.4		77.2	568.3	306.3	11.2	1.000017
69500.0	46.0	-60.3		75.3	568.4	302.3	12.8	1.000017
70000.0	44.9	-60.2		73.5	568.5	299.0	13.4	1.000016
70500.0	43.9	-60.1		71.7	568.6	295.5	13.0	1.000016
71000.0	42.8	-60.0		70.0	568.8	292.0	12.6	1.000016
71500.0	41.8	-59.9		68.2	568.9	299.1	7.5	1.000015
72000.0	40.8	-59.8		66.6	569.1	331.0	2.9	1.000015
72500.0	39.8	-59.5		64.9	569.5	64.7	3.7	1.000014
73000.0	38.9	-59.0		63.2	570.1	84.3	7.8	1.000014
73500.0	37.9	-58.5		61.6	570.8	90.1	12.2	1.000014
74000.0	37.0	-57.9		60.0	571.5	89.9	11.7	1.000013
74500.0	36.2	-57.4		58.4	572.2	89.0	10.5	1.000013
75000.0	35.3	-56.9		56.9	572.9	84.7	8.7	1.000013
75500.0	34.5	-56.4		55.4	573.5	64.9	5.9	1.000012
76000.0	33.7	-55.9		54.0	574.2	26.3	4.7	1.000012
76500.0	32.9	-55.5		52.6	574.7	355.7	6.2	1.000012
77000.0	32.1	-55.4		51.4	574.9	341.8	8.7	1.000011
77500.0	31.3	-55.3		50.1	575.1	334.5	11.4	1.000011
78000.0	30.6	-55.1		48.9	575.2	333.7	12.5	1.000011
78500.0	29.9	-55.0		47.7	575.4	333.1	13.7	1.000011
79000.0	29.2	-54.8		46.6	575.6	332.4	14.8	1.000010
79500.0	28.5	-54.7		45.5	575.8	331.2	15.0	1.000010
80000.0	27.9	-54.6		44.4	575.9	330.1	15.2	1.000010
80500.0	27.2	-54.5		43.3	576.1	328.7	15.4	1.000010
81000.0	26.6	-54.3		42.3	576.3	326.2	15.1	1.000009
81500.0	26.0	-54.2		41.3	576.5	323.6	14.9	1.000009
82000.0	25.4	-54.1		40.3	576.6	322.4	14.3	1.000009
82500.0	24.8	-53.9		39.4	576.8	325.2	12.4	1.000009
83000.0	24.2	-53.8		38.4	577.0	328.9	10.6	1.000009
83500.0	23.6	-53.7		37.5	577.2	336.0	8.8	1.000008

STATION ALTITUDE 4051.00 FEET MSL
 31 MAR. 83 0730 HRS MST
 ASCENSION NO. 63

PP. DATA
 0500000063
 JALLEN

GEODETIC COORDINATES
 33.16712 LAT DEG
 106.49511 LONG DEG

GEOMETRIC ALTITUDE MSL FEET	PRESSURE MILLIBARS	AIR TEMPERATURE DEGREES CENTIGRADE	REL. HUM. PERCENT	DENSITY GM/CUBIC METER	SPEED OF SOUND KNOTS	WIND DIRECTION DEGREES(TN)	WIND DATA SPEED KNOTS	INDEX OF REFRACTION
84000.0	23.1	-53.5		34.6	577.3	350.8	7.2	1.0000008
84500.0	22.5	-53.4		35.7	577.5	12.0	6.2	1.0000008
85000.0	22.0	-53.3		34.9	577.7			1.0000008
85500.0	21.5	-53.1		34.1	577.8			1.0000008
86000.0	21.0	-53.0		33.2	578.0			1.0000007
86500.0	20.5	-52.9		32.4	578.2			1.0000007

STATION ALTITUDE 4051.00 FEET MSL
 31 MAR. 93 0730 HRS MST
 ASCENSION NO. 63

INDICATED LEVELS
 05000-0063
 JALLEN

GEODETIC COORDINATES
 33.16712 LAT DEG
 106.49511 LON DEG

PRESSURE MILLIBARS	GEOPOTENTIAL FEET	TEMPERATURE		REL. HUMID. PERCENT	WIND DATA	
		AIR DEGREES CENTIGRADE	DEWPOINT CENTIGRADE		DIRECTION DEGREES(TN)	SPEED KNOTS
850.0	4851.	13.9	-3.8	29.	260.5	3.0
800.0	6527.	13.4	-6.8	24.	220.6	10.3
750.0	8299.	10.6	-10.6	21.	245.0	19.8
700.0	10169.	6.5	-17.5	16.	275.2	17.8
650.0	12146.	2.5	-20.7	16.	279.7	27.2
600.0	14252.	-2.0	-23.3	18.	286.6	35.7
550.0	16497.	-7.7	-24.0	20.	288.3	41.2
500.0	18900.	-14.2	-29.0	27.	282.7	45.3
450.0	21490.	-20.6	-35.1	26.	287.6	46.2
400.0	24309.	-27.7	-42.0	24.	288.4	55.7
350.0	27415.	-35.1	-48.4	24.	283.7	59.5
300.0	30874.	-44.3			291.8	63.3
250.0	34808.	-51.9			290.9	79.6
200.0	39503.	-55.0			289.7	99.5
175.0	42335.	-51.9			286.4	91.2
150.0	45584.	-57.1			287.3	80.9
125.0	49321.	-63.7			287.3	73.3
100.0	53728.	-70.6			285.5	75.3
80.0	58054.	-67.7			286.6	38.1
70.0	60731.	-66.1			276.7	14.1
60.0	63829.	-61.0			274.5	20.0
50.0	67549.	-60.6			314.6	8.0
40.0	72117.	-59.6			50.5	2.9
30.0	78098.	-55.0			333.2	13.5
25.0	81929.	-54.0			323.7	13.4

** AT LEAST ONE ASSUMED RELATIVE HUMIDITY VALUE WAS USED IN THE INTERPOLATION.

STATION ALTITUDE 4940.00 FEET MSL
 31 MAR. 83 0850 HRS MST
 ASCENSION NO. 2

SI FT
 0.0000002
 STALLION

GEODETIC COORDINATES
 33.41920 LAT DEG
 106.66501 LON DEG

STATION ALTITUDE MILLIBARS MSL FEET	GEOMETRIC ALTITUDE	TEMPERATURE AIR DEWPOINT DEGREES CENTIGRADE	REL. HUM. PERCENT
848.0	4940.0	13.9	10.0
826.1	5662.4	12.7	31.0
809.0	6239.8	13.8	27.0
769.0	7636.8	11.7	20.0
759.2	7988.6	11.5	20.0
700.0	10190.5	5.3	21.0
677.8	11050.9	2.7	22.0
653.4	12021.3	1.6	20.0
640.2	12560.6	1.8	18.0
622.1	13318.0	.2	22.0
529.0	17504.7	-10.4	31.0
500.0	18922.5	-13.9	25.0
400.0	24354.0	-27.2	26.0
338.6	28228.4	-36.7	32.0
325.6	29116.1	-39.2	35.0
308.9	30294.9	-42.7	

STATION ALTITUDE 4940.00 FEET MSL
 31 MAR. 63 0850 HRS MST
 ASCENSION NO. 2

APP DATA
 090004000Z
 STALLION

GEODETIC COORDINATES
 33°41'20" LAT DEG
 106°66'50" LON DEG

GEOMETRIC ALTITUDE MSL FEET	PRESSURE MILLIBARS	TEMPERATURE		REL. HUM. PERCENT	DENSITY GM/CUBIC METER	SPEED OF SOUND KNOTS	WIND DATA		INDEX OF REFRACTION
		AIR DEGREES	DEWPOINT CENTIGRADE				DIRECTION DEGREES(TN)	SPEED KNOTS	
4940.0	848.0	13.9	-3.4	30.0	1027.0	660.7	130.0	6.0	1.000251
5000.0	846.2	13.8	-3.4	30.1	1025.1	660.6	134.1	5.8	1.000250
5500.0	831.0	13.0	-3.8	30.8	1009.6	654.7	176.8	5.3	1.000246
6000.0	816.1	13.3	-4.5	28.7	990.3	660.1	208.2	7.5	1.000241
6500.0	801.4	13.4	-5.8	25.7	972.4	660.1	223.1	10.8	1.000235
7000.0	787.0	12.7	-7.8	23.2	957.7	659.2	230.7	14.5	1.000229
7500.0	772.8	11.9	-9.9	20.7	943.1	658.2	240.8	14.3	1.000224
8000.0	756.9	11.5	-10.7	20.0	927.6	657.7	250.7	14.6	1.000219
8500.0	745.0	10.1	-11.7	20.2	915.3	656.0	259.2	16.1	1.000216
9000.0	731.4	8.7	-12.7	20.5	903.1	654.4	266.1	18.0	1.000212
9500.0	718.1	7.2	-13.8	20.7	891.1	652.7	268.7	20.3	1.000209
10000.0	704.9	5.8	-14.8	20.9	879.3	651.0	269.4	22.8	1.000205
10500.0	691.9	4.4	-15.8	21.4	867.7	649.3	270.8	25.2	1.000202
11000.0	679.1	2.9	-16.8	21.9	856.4	647.5	274.1	27.2	1.000199
11500.0	666.4	1.7	-18.2	21.1	843.9	646.2	277.2	29.5	1.000195
12000.0	653.9	.6	-19.7	20.0	831.4	644.9	281.1	33.0	1.000192
12500.0	641.7	1.7	-19.9	18.2	812.8	646.1	283.6	36.1	1.000187
13000.0	629.6	.9	-19.3	20.3	799.8	645.1	284.3	37.8	1.000185
13500.0	617.7	-.3	-19.1	22.4	787.9	643.8	284.3	38.6	1.000182
14000.0	605.9	-1.5	-19.7	23.5	776.5	642.3	284.0	38.8	1.000180
14500.0	594.3	-2.8	-20.2	24.5	765.1	640.8	282.8	39.7	1.000177
15000.0	582.9	-4.1	-20.8	25.6	754.0	639.3	281.5	40.7	1.000174
15500.0	571.7	-5.3	-21.5	26.7	743.1	637.8	280.1	41.9	1.000171
16000.0	560.7	-6.6	-22.1	27.8	732.3	636.3	278.7	43.2	1.000169
16500.0	550.0	-7.9	-22.8	28.8	721.7	634.8	277.7	44.5	1.000166
17000.0	539.4	-9.1	-23.5	29.9	711.3	633.2	277.5	46.0	1.000163
17500.0	529.1	-10.4	-24.2	31.0	701.0	631.7	277.3	47.5	1.000161
18000.0	518.7	-11.6	-26.1	28.9	690.5	630.2	278.2	47.7	1.000158
18500.0	508.5	-12.9	-28.0	26.8	680.2	628.7	279.1	47.9	1.000155
19000.0	498.4	-14.1	-29.8	25.0	670.0	627.2	279.1	46.8	1.000152
19500.0	488.3	-15.3	-30.8	25.1	659.5	625.7	278.6	45.2	1.000150
20000.0	478.3	-16.5	-31.8	25.2	649.2	624.2	278.4	45.3	1.000147
20500.0	468.6	-17.8	-32.8	25.3	639.0	622.7	278.5	46.0	1.000145
21000.0	459.1	-19.0	-33.8	25.4	629.1	621.2	279.4	47.4	1.000142
21500.0	449.8	-20.2	-34.9	25.5	619.3	619.7	280.7	49.1	1.000140
22000.0	440.6	-21.4	-35.9	25.6	609.7	618.2	281.8	48.8	1.000137
22500.0	431.7	-22.7	-36.9	25.7	600.2	616.6	282.8	47.8	1.000135
23000.0	422.9	-23.9	-38.0	25.8	590.9	615.1	283.4	47.0	1.000133
23500.0	414.3	-25.1	-39.0	25.8	581.7	613.6	283.8	46.3	1.000131
24000.0	405.9	-26.3	-40.0	25.9	572.7	612.1	283.4	47.1	1.000129

STATION ALTITUDE 4940.00 FEET MSL
 31 MAR. 83 0850 HRS MST
 ASCENSION NO. 2

STATION COORDINATES
 33°81'20" LAT NEG
 106°66'50" LON DEG

GEOMETRIC ALTITUDE MSL FEET	PRESSURE MILLIBARS	TEMPERATURE ATR DEGREES CENTIGRADE	REL. HUM. PERCENT	DENSITY GM/CUBIC METER	SPEED OF SOUND KNOTS	WIND DIRECTION (DEGREES(TN))	WIND DATA SPEED KNOTS	INDEX OF REFRACTION
24500.0	397.5	-27.6	26.2	563.7	610.6	282.8	48.4	1.000127
25000.0	389.0	-28.8	27.0	554.5	609.0	282.1	49.4	1.000124
25500.0	380.8	-30.0	27.8	545.5	607.5	281.4	50.2	1.000122
26000.0	372.7	-31.2	28.5	536.6	606.0	280.3	50.6	1.000120
26500.0	364.7	-32.5	29.3	527.8	604.4	278.8	50.8	1.000118
27000.0	357.0	-33.7	30.1	519.3	602.9	277.5	50.7	1.000116
27500.0	349.4	-34.9	30.9	510.8	601.3	276.5	50.2	1.000114
28000.0	341.9	-36.1	31.6	502.6	599.8	275.7	50.0	1.000113
28500.0	334.6	-37.5	32.9	494.5	598.1	276.0	50.8	1.000111
29000.0	327.3	-38.9	34.6	486.6	596.3	276.3	51.7	1.000109
29500.0	320.1	-40.3	23.6**	478.9	594.4			1.000107
30000.0	313.0	-41.8	8.8**	471.3	592.5			1.000105

** AT LEAST ONE ASSUMED RELATIVE HUMIDITY VALUE WAS USED IN THE INTERPOLATION.

STATION ALTITUDE 4940.00 F.A.E. MSL
 31 MAR. 83 0850 HRS MST
 ASCENSION NO. 2

IND. LEVELS
 0900040002
 STATION

GEODETIC COORDINATES
 33.81920 LAT DEG
 105.66501 LON DEG

PRESSURE GEOPOTENTIAL MILLIBARS	TEMPERATURE AIR DEGREES CENTIGRADE	DEWPOINT CENTIGRADE	REL. HUM. PERCENT	WIND DATA		
				DIRECTION (DEGREES(TN))	SPEED KNOTS	
800.0	13.3	-6.0	25.	224.0	11.2	
750.0	10.6	-11.3	20.	236.4	15.5	
700.0	5.3	-15.2	21.	269.6	23.8	
650.0	.9	-19.8	19.	282.1	34.1	
600.0	-2.2	-20.0	24.	283.4	39.2	
550.0	-7.9	-22.8	29.	277.7	44.5	
500.0	-13.9	-29.6	25.	279.1	47.0	
450.0	-20.2	-34.8	25.	280.7	49.1	
400.0	-27.2	-40.8	26.	283.0	48.0	
350.0	-34.8	-45.9	31.	276.6	50.3	

END

DATE
FILMED

6 - 83

DTIC