

BED



Station Occupation Report For Airborne GPS

Project: Fema Mass

Location: KBED (Hanscom Field)

Project Number: 7556-005

Completed by: Berry / Galieti

Date: December 2, 2010

Receiver: Trimble

Receiver Type: 5700

Antenna Type: Zephyr Geodetic

Station ID: BEBA

Start -- H.I. (m): 1.384 m / 1.382 m / 1.383 m

End -- H.I. (m): 1.383 m

H.I. (ft): 4.54 ft

Start Time: 1809 Z / 109 PM

End Time: 440 PM

Time Zone: EST

Operator: Berry / Galieti

Comments: 101202a-246

101202a-247



2670 Wilhite Drive - Lexington KY - 40503 - 859.277.8700 - www.photoscience.com

ODD North
EVEN South

Date Flown: 12/2/2015	
Takeoff Time (Z):	Local: Airport BED
Landing Time (Z):	Local: Airport

	Ground	Airport
Begin Temp	6°C	KBE D
Begin Dewpoint	-4°C	
Begin Pressure	29.95 Hg	
End Temp	6°C	
End Dewpoint	-4°C	KBE D
End Pressure	29.96 Hg	

10200-27

117

**Station Occupation Report
For Airborne GPS**

Project: FEMA MASS

Location: KBED HANSCOM FIELD

Project Number: 7556-005

Completed by: Berry / Balisti

Date: December 3, 2010

Receiver: Trimble

Receiver Type: 5700

Antenna Type: Zephyr Geodetic

Station ID: BED A

Start -- H.I. (m): 1.444m / 1.445m / 1.445m

End -- H.I. (m): 1.445m

H.I. (ft): 4.74 ft.

Start Time: 7:36 AM

End Time: 1042 AM

Time Zone: EST

Operator: Berry

Comments 1012039-246

1012030-247



2670 Wilbille Drive - Lexington KY - 40503 - 850 977 8700
www-abe@ccojazz.com

Date Flown:	12/3/2010		
Takeoff Time (Z):	13:40	Local:	840 EST
Landing Time (Z):	15:47	Local:	1007 EST
		Airport:	KRFD

	Ground	Airport
Begin Temp	-13°C	KBE0
Begin Dewpoint	-14°C	
Begin Pressure	19.96	
End Temp	2 °C	
End Dewpoint	-30°C	
End Pressure	1995.44	KBE0.

7-22-01

	Pedo	fes	low	
	7			
	1419			
	1433			
	5180			
	254			
	115			
	6000			
	3			



Station Occupation Report For Airborne GPS

Project:

FEMA - MASS

Location:

KBED HANSCOM FIELD

Completed by:

Berry/Galieti

Project Number: 7556-005

Date: December 7, 2010

Receiver:

Trimble "4"

Receiver Type:

5700

Antenna Type:

Zephyr

Station ID:

BEDA

Start -- H.I. (m):

1.433

End -- H.I. (m):

1.433

H.I. (ft):

4.695

Start Time:

750AM

End Time:

11:51AM

Time Zone:

EST

Operator:

Berry



Comments

101207a-246

101207a-247

LIDAR MISSION RECORD SHEET - Optech

PHOTO SCIENCE

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Project Name	FEMA MASS
Project Number	756-005
Altitude	150 - Charles, Va

Pilot	Young
Operator	BEAR
Aircraft	N7266Z

Date Flown:	December 7, 2010
Takeoff Time (Z)	1315Z
Landing Time (Z)	1515Z
Local:	8:45 AM EST
Local:	1045 AM MST
Airport	BEAR
Airport	BEAR

FOV (half-degrees):	± 9.0°	Altitude AGL (ft):	5000'
Scan Rate:	30.0 Hz	MPIA or SPIA	Fixed or Auto
Pulse Rate:	71 KHz	Fixed or Auto	Auto
Ground Speed:	116 kts	Samples	Range
A.R.F.:	Range		

LIDAR Unit	Optech Gemini sr246
HD #	246102
POS File Name	101207a
from, to	100 - 003

Begin Temp	-3°C	Ground	Airport
Begin Dewpoint	-10°C		
Begin Pressure	29.33"		
End Temp	0°C		
End Dewpoint	-11°C		
End Pressure	29.35"		

101207a-246

GPS Base Location(s)	BEAR A
PDOP Avoidance	Good all day
Static or Flyover?	Static
→ if flyovers, times: -	

Flight Line Name/#	Start Time	End Time	Alt. (AMSL)	Heading	Speed	Returns	Crab	NOTES (weather, visibility, winds, tide, etc.)
86	1327	1333	5300'	S	116	100%	8	Smooth Calm. Clouds above and SE/SW
31	1338	1341	5350'	N	116	100%	9	Just the bend for patching
32	1345	1357	5350'	S	116	100%	8	Some turbulence on South end
33	1401	1412	5350'	N	116	100%	9	Some turbulence on South end
34	1417	1428	5350'	S	116	100%	7	"
35	1432	1442	5350'	N	116	100%	9	"
36	1446	1456	5300'	S	116	100%	7	"
37	1501	1511	5300'	N	116	100%	8	"
38	1515	1522	5300'	S	116	100%	11	"
39	1526	1534	5300'	N	116	100%	7	"
Improv	1537	1539	5300'	E	116	100%	12	"

Refly

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Date Flown: 12/7/2010			
Takeoff Time (Z): 1345	Local: 840	Airport: KRed	
Landing Time (Z): 1636	Local: 1136	Airport: KRed	

	Ground	Airport
Begin Temp	-3 C	KBED
Begin Dewpoint	-10 C	
Begin Pressure	29.334 in.	
End Temp		
End Dewpoint		
End Pressure		KBED.

[illegible]

10
5
0



Station Occupation Report For Airborne GPS

Project:

FEMA-Mass

Location:

KBED

Completed by:

Berry

Project Number: 7556-005

Date: 12-10-2010

Receiver:

Trimble '4'

Receiver Type:

5700

Antenna Type:

Zephyr

Station ID:

BED A

Start -- H.I. (m):

1.410

End -- H.I. (m):

1.410

H.I. (ft):

4.625

Start Time:

11:35 AM EST

End Time:

5:53 PM EST

Time Zone:

EST

Operator:

Berry

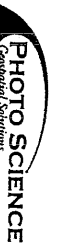
Comments

101210b-246

101210b-247



LIDAR MISSION RECORD SHEET - Optech



2670 Winthia Drive • Lexington KY • 40503 • 859.277.8700 • www.photoscience.com

Project Name	Fama - Mass
Project Number	1356-005
ASTM NAV file	Ben-Charles.ph

Pilot	Younis
Operator	Berry
Aircraft	N7266Z

Date Flown:	December 12 2010
Takeoff Time (Z):	1355Z
Landing Time (Z):	1845Z
Local:	1235 PM EST
Local:	3:45 PM EST
Altitude:	Altitude

FOV (half-degrees):	± 10°	Altitude AGL (ft):	5000'
Scan Rate:	8000 Hz	MPA or SPIA	
Pulse Rate:	71 KHz	Fixed or Auto	
Ground Speed:	116 kts	Samples	
A.R.F.:		Range	

LIDAR Unit	Optech Gemini sn246
HD #	210401
POS File Name	1012106
from, to	005 - 087

Begin Temp	-7°C	Ground	Altitude
Begin Dewpoint	-14°C		
Begin Pressure	30.39		
End Temp	-4°C		
End Dewpoint	-15°C		
End Pressure	30.28		

GPS Base Location(s)	Bed A
PDOP Avoidance	Good all day
Static or Flyover?	Static
-> If flyovers, times: -	

1012106-246

Flight Line Name#	Start Time	End Time	Alt. (AMSL)	Heading	Speed	Returns	Crab	NOTES (weather, visibility, winds, ride, etc.)
36	1744	1754	5300'	S	116	100%	5	Clear below and smooth, Harry
37	1758	1808	5300'	N	116	100%	-7	
38	1811	1831	5300'	S	116	100%	6	
39	1835	1844	5300'	N	116	100%	-6	
40	1837	1846	5300'	S	116	100%	5	
41	1849	1857	5300'	N	116	100%	-6	
42	1900	1909	5300'	S	116	100%	4	
43	1911	1919	5300'	N	116	100%	-7	
44	1923	1931	5300'	S	116	100%	5	
45	1934	1942	5300'	N	116	100%	-6	
46	1947	1953	5300'	S	116	100%	5	
47	1956	2003	5370'	N	116	100%	-9	
48	2006	2012	5350'	S	116	100%	6	
49	2015	2020	5350'	N	116	100%	-7	
50	2024	2029	5400'	S	116	100%	5	
Turnover	2032	2035	5410'	E	116	100%	7	

LIDAR MISSION RECORD SHEET - Optech

PHOTO SCIENCE

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Project Name	BED Charles.1
Project Number	7556-005
Altitude NAV pin file	Bed-Charles.pln

Pilot	Greeneville
Operator	Gallagher
Aircraft	N248G

Date Flown:	12/10/2010	#2
Takeoff Time (Z)	1730	Local: 1730
Landing Time (Z)	2200	Local: 2000
Airport	KBED	KBED

Projects Scanning Requirements	
FOV (half-degrees):	± 18°
Altitude AGC (ft):	5000
Scan Rate:	30 Hz
Pulse Rate:	70 KHz
Ground Speed:	116 kts
A.R.F.:	Range

Data Information	
LIDAR Unit	Optech Gemini sn247
HD #	2
POS File Name	101210b
from, to	0 → 35

Begin Temp	-7 C	Ground	KBED
Begin Dewpoint	-14 C	Ground	KBED
Begin Pressure	30.394	Ground	KBED
End Temp	-4 C	Ground	KBED
End Dewpoint	-14 C	Ground	KBED
End Pressure	30.354	Ground	KBED

GPS Base Location(s)	BED A
PDOP Avoidance	none during day
Static or Flyover?	static

101210b-247

Flight Line Name/#	Start Time	End Time	Alt. (AMSL)	Heading	Speed	Returns	Crab	NOTES (weather, visibility, winds, tide, etc.)
5	1754	1808	5130	359	116	100	6	
6	1813	1828	5140	179	116	100	7	
7	1832	1846	5170	359	116	100	6	
8	1851	1905	5150	179	114	100	5	
19	1909	1922	5140	359	119	~100	6	high drops might be lakes? @ S-end
20	1927	1940	5180	179	119	100	5	
21	1945	1958	5190	359	119	100	5	
22	2003	2016	5180	179	115	100	6	
23	2021	2033	5200	359	115	100	6	
24	2039	2052	5190	179	112	100	8	3 mi S & N end HZ/4 min cloud
25	2057	—	5230	359	122	—	7	software clipped out mid line.
25	2109	2121	5183	359	125	100	8	
17	2132	2137	5190	359	118	~	7	Reshoot North low of line (high returns prob bad data)
Crossline	2149	2146	5000	270	114	100	6	

whole line →
Reshoot
redo middle 1/3



Station Occupation Report For Airborne GPS

Project: BED-Charles FEMA-MASS 7656-005

Location: KBED

Project Number: 7656-005

Completed by: Nathan Galieti

Date: 12/11/2010

Receiver: _____

Receiver Type: Trimble 5700

Antenna Type: _____

Station ID: KBED A (PAC)

Start -- H.I. (m): 1.471 m.

End -- H.I. (m): 1.469 / 1.470 m

H.I. (ft): 4.83 ft.

Start Time: 845 AM

End Time: 10:35 AM

Time Zone: EST

Operator: Nathan Galieti



Comments 101211a-247

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Date Flown: 12/11/10		
Takeoff Time (Z): 1400	Local: 9:00 AM	Airport KRE D
Landing Time (Z): 1525	Local: 10:25 AM	Airport KJED

	Ground	Airport
Begin Temp	-2 C	KBED
Begin Dewpoint	-6 C	
Begin Pressure	30.25 Hg	
End Temp	-2	
End Dewpoint	-4	
End Pressure	30.25 Hg	KBED -

10611 a-247 winds clim clear

[illegible]

Mass Area: BED-Charles

Project No 7556-005

Contact: Photo Science; F. Godby at
859 277-8700 or Cell: 859 421-5258

Flight Logs

FLIGHT LINE	FL MILES	ALTITUDE	BASE STATION	FLIGHT FILES	DATE FLOWN	S/N	FIELD QC	Comments
1	16.4	5180	BED A	BED_Charles. BED_CHARLE	12/2/2010	247		
2	16.4	5190	BED A	BED_Charles. BED_CHARLE	12/7/2010	247		
3	16.4	5190	BED A	BED_Charles. BED_CHARLE	12/7/2010	247		
4	16.4	5200	BED A	BED_Charles. BED_CHARLE	12/7/2010	247		
5	29.9	5170	BED A	BED_Charles. BED_CHARLE	12/7 12/10	247	X	flew on 12/7 but Atmospheric returns line will be refown
6	29.9	5170	BED A	BED_Charles. BED_CHARLE	12/7 12/10	247	X	same as line 5
7	29.1	5180	BED A	BED_Charles. BED_CHARLE	12/7 12/10	247	X	same as line 5
8	29.1	5170	BED A	BED_Charles. BED_CHARLE	12/7 12/10	247	X	same as line 5
9	29.1	5170	BED A	BED_Charles. BED_CHARLE	12/9/2010	247		
10	11.5	5140	BED A	BED_Charles. BED_CHARLE	12/7/2010	247		
11	11.2	5140	BED A	BED_Charles. BED_CHARLE	12/2/2010	247		
12	10.0	5150	BED A	BED_Charles. BED_CHARLE	12/2/2010	247		
13	8.8	5160	BED A	BED_Charles. BED_CHARLE	12/2/2010	247		

N S N S

Good
Good
Good
Good

Flight Logs should be FAXED to 859-277-8901 immediately
after each days flights with lines and other details noted

Operator: Calieff AIRCRAFT Tail Number: N2448G
Pilot: Greenwell Sensor Serial Number: 247 Date: _____

FLIGHT LINE	FL MILES	ALTITUDE	BASE STATION	FLIGHT FILES	DATE FLOWN	S/N	FIELD QC	Comments
14	8.2	5170	BED A	BED_Charles. BED_CHARLE	12/2/2010	247		possible fast ground speed at south end of line
15	3.5	5200	BED A	BED_Charles. BED_CHARLE	12/2/2010	247		
16	2.3	5190	BED A	BED_Charles. BED_CHARLE	12/2/2010	247		
17	29.1	5170	BED A	BED_Charles. BED_CHARLE	12/3/2010	247		Reflew on 12/7/10 But data bad
18	27.3	5180	BED A	BED_Charles. BED_CHARLE	12/3/2010	247		12/1/10 GOOD ✓ Refly Again
19	27.3	5180	BED A	BED_Charles. BED_CHARLE	12/10/2010	247		
20	27.3	5170	BED A	BED_Charles. BED_CHARLE	12/10/2010	247		
21	27.3	5170	BED A	BED_Charles. BED_CHARLE	12/10/2010	247		
22	27.4	5180	BED A	BED_Charles. BED_CHARLE	12/10/2010	247		
23	27.0	5190	BED A	BED_Charles. BED_CHARLE	12/10/2010	247		
24	27.0	5190	BED A	BED_Charles. BED_CHARLE	12/12/11	247		Refly high returns GOOD ✓
25	26.4	5190	BED A	BED_Charles. BED_CHARLE	12/12/11	247		Refly middle 1/3 of lines high returns. GOOD ✓
26	26.4	5190	BED A	BED_Charles. BED_CHARLE	---			
27	25.5	5200	BED A	BED_Charles. BED_CHARLE				

Flight Logs should be FAXED to 859-277-8901 immediately after each days flights with lines and other details noted

Operator: Galich

AIRCRAFT Tail Number: N1448G

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Pilot: Greenwell

Sensor Serial Number: 247

Date: _____

FLIGHT LINE	FL MILES	ALTITUDE	BASE STATION	FLIGHT FILES	DATE FLOWN	S/N	FIELD QC	Comments
14	8.2	5170	BED A	BED_Charles. BED_CHARLE				
15	3.5	5200	BED A	BED_Charles. BED_CHARLE				
16	2.3	5190	BED A	BED_Charles. BED_CHARLE				
17	29.1	5170	BED A	BED_Charles. BED_CHARLE				
18	27.3	5180	BED A	BED_Charles. BED_CHARLE				
19	27.3	5180	BED A	BED_Charles. BED_CHARLE				
20	27.3	5170	BED A	BED_Charles. BED_CHARLE				
21	27.3	5170	BED A	BED_Charles. BED_CHARLE				
22	27.4	5180	BED A	BED_Charles. BED_CHARLE				
23	27.0	5190	BED A	BED_Charles. BED_CHARLE				
24	27.0	5190	BED A	BED_Charles. BED_CHARLE				
25	26.4	5190	BED A	BED_Charles. BED_CHARLE				
26	26.4	5190	BED A	BED_Charles. BED_CHARLE	12-2-10	246	JB	Complete 12-7-10 HALF LINE * *
27	25.5	5200	BED A	BED_Charles. BED_CHARLE	↓	↓	↓	

Flight Logs should be FAXED to 859-277-8901 immediately
after each days flights with lines and other details noted

Operator: Berry

AIRCRAFT Tail Number: N76662

Pilot: Caldwell

Sensor Serial Number: 846

Date: 12-2-2010

YOUNG

FLIGHT LINE	FL MILES	ALTITUDE	BASE STATION	FLIGHT FILES	DATE FLOWN	S/N	FIELD QC	Comments
28	25.5	5210	BED A	BED_Charles. BED_CHARLE	12-2-2010	246	JB	
29	25.5	5230	BED A	BED_Charles. BED_CHARLE	12-3-2010	246	JB	
30	25.5	5240	BED A	BED_Charles. BED_CHARLE				
31	24.0	5240	BED A	BED_Charles. BED_CHARLE				Patched for Clouds
32	24.0	5240	BED A	BED_Charles. BED_CHARLE	12-7-2010	246	JB	
33	24.0	5250	BED A	BED_Charles. BED_CHARLE				
34	22.9	5260	BED A	BED_Charles. BED_CHARLE				
35	22.4	5260	BED A	BED_Charles. BED_CHARLE				
36	22.0	5280	BED A	BED_Charles. BED_CHARLE	12-10-2010	246	JB	Flown but too many atmospheric returns
37	21.2	5300	BED A	BED_Charles. BED_CHARLE				
38	21.2	5300	BED A	BED_Charles. BED_CHARLE				
39	20.6	5310	BED A	BED_Charles. BED_CHARLE				
40	17.2	5300	BED A	BED_Charles. BED_CHARLE				
41	17.4	5300	BED A	BED_Charles. BED_CHARLE				

Flight Logs should be FAXED to 859-277-8901 immediately after each days flights with lines and other details noted

Operator: Berry

AIRCRAFT Tail Number: N72603

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Pilot: Caldwell

Sensor Serial Number: 246

Date: 12-2-2010

Youngs

FLIGHT LINE	FL MILES	ALTITUDE	BASE STATION	FLIGHT FILES	DATE FLOWN	S/N	FIELD QC	Comments
42	17.4	5310	BED A	BED_Charles. BED_CHARLE	10-12-2010	246	93	
43	17.4	5340	BED A	BED_Charles. BED_CHARLE				
44	17.4	5360	BED A	BED_Charles. BED_CHARLE				
45	17.4	5360	BED A	BED_Charles. BED_CHARLE				
46	12.7	5370	BED A	BED_Charles. BED_CHARLE				
47	12.7	5370	BED A	BED_Charles. BED_CHARLE				
48	11.3	5370	BED A	BED_Charles. BED_CHARLE				
49	10.7	5360	BED A	BED_Charles. BED_CHARLE				
50	10.7	5360	BED A	BED_Charles. BED_CHARLE				

Flight Logs should be FAXED to 859-277-8901 immediately after each days flights with lines and other details noted

Operator: Berry AIRCRAFT Tail Number: N22662 Page 4 of 4
Pilot: YANE Sensor Serial Number: 246 Date: 10-12-2010