

## Payload 1 Daily Flight Report



Date: 2022-09-06

Flight Campaign ID: P1C1

Airport, FBO ID, City: Tucson International Airport - Tucson, AZ

Aircraft: N331AR

Domain: 14 (Desert Southwest)

Sites Flown: SRER\_P2 (Santa Rita Experimental Range Priority 2), SRER\_P3 (Santa Rita Experimental Range Priority 3)

Days left in Domain: 5

Report Author: Elissa

**Lidar Operators**: Elissa Flight Hours: 04:31

Spectrometer Operators: Abe Hours until maintenance: 21.33

**Pilots**: Magnus, Steven **GPS Instruments**: 04 - FBO\_KTUS, AOP-SRER

#### **Summary**

Yet another full flight was conducted today in green conditions, this time over SRER. 28 lines were collected in the priority 2 and 3 flight boxes.

#### **Concerns**

Extractions are still backed up but are moving along. The extraction of Sunday's JORN flight was advanced to the second waveform disk this afternoon.

#### **Comments**

D14 field staff came by for a tour of the plane after flights today. Always a good time to interact with the other side of the NEON operation!

#### **Daily Coverage**

## **Estimated Cloud Cover Key**

LJUITIALCE	cioud co	vei ney
Green:	Yellow:	Red:
0-10%	11-50%	>50%

## D14|SRER\_P2

Line #	42	43	44	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61
Lidar	<b>✓</b>	<b>✓</b>	✓	<b>✓</b>	<b>✓</b>	<b>✓</b>	<b>\</b>	<b>\</b>	<b>✓</b>	<b>✓</b>	<b>✓</b>	<b>✓</b>	<b>\</b>	<b>\</b>	<b>✓</b>	<b>✓</b>	<b>\</b>	<b>\</b>	<b>\</b>	✓
Spectrometer	✓	✓	✓	✓	✓	✓	<b>✓</b>	<b>√</b>	✓	✓	✓	✓	<b>√</b>	<b>√</b>	✓	✓	<b>✓</b>	<b>√</b>	<b>✓</b>	✓
Camera	✓	✓	✓	✓	✓	✓	<b>✓</b>	✓	✓	✓	✓	✓	<b>√</b>	✓	✓	✓	<b>✓</b>	✓	<b>✓</b>	✓
Cloud Cover																				

Line #	62	63	64
Lidar	<b>√</b>	<b>√</b>	<b>√</b>
Spectrometer	<b>√</b>	<b>√</b>	<b>√</b>
Camera	✓	✓	<b>√</b>
Cloud Cover			

Total number of lines flown: 23

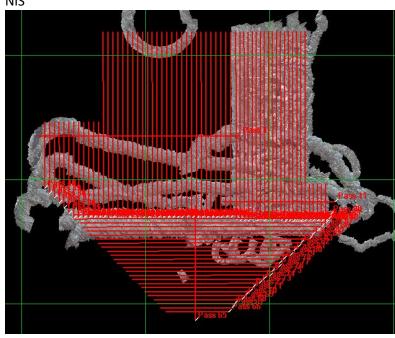
# D14|SRER\_P3

Line #	86	87	88	89	90
Lidar	<b>✓</b>	<b>✓</b>	<b>✓</b>	<b>✓</b>	<b>✓</b>
Spectrometer	✓	<b>√</b>	<b>√</b>	✓	<b>√</b>
Camera	✓	✓	✓	✓	✓
Cloud Cover					

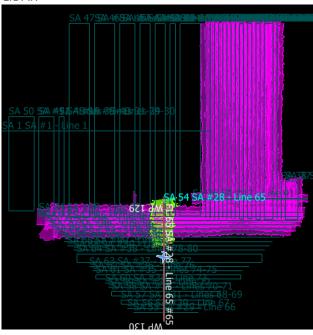
Total number of lines flown: 5

# **Flight Screenshots**

NIS



Lidar



## **Cumulative Domain Coverage**

D14|JORN\_P1 (Jornada Priority 1)

_				1			<u> </u>													
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20
	21	22	23	24	25	26	27	28	29	30	31	32	33	34						

Flown: 100% (34/34) Green: 100% (34/34) Yellow: 0% (0/34) Red: 0% (0/34)

<sup>\*</sup>Lines 89 and 90 were flown but will be re-flown for better data quality if time allows

## D14|JORN P2 (Jornada Priority 2)

-				1			<u> </u>													
I	35	36	37	38	39	40	41	42	43	44	45	46	47	48	49	50	51	52	53	54
I	55																			

Flown: 100% (21/21) Green: 43% (9/21) Yellow: 57% (12/21) Red: 0% (0/21)

## D14 | N14A (D14 Nominal Runway)

1

Flown: 0% (0/1) Green: 0% (0/1) Yellow: 0% (0/1) Red: 0% (0/1)

## D14 | SRER\_P1 (Santa Rita Experimental Range Priority 1)

			_	•						,	,	,								
														14						
2	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40

Flown: 100% (40/40) Green: 98% (39/40) Yellow: 2% (1/40) Red: 0% (0/40)

## D14 | SRER\_P2 (Santa Rita Experimental Range Priority 2)

			`						,										
41	42	43	44	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60
61	62	63	64																

Flown: 100% (24/24) Green: 100% (24/24) Yellow: 0% (0/24) Red: 0% (0/24)

#### D14|SRER P3 (Santa Rita Experimental Range Priority 3)

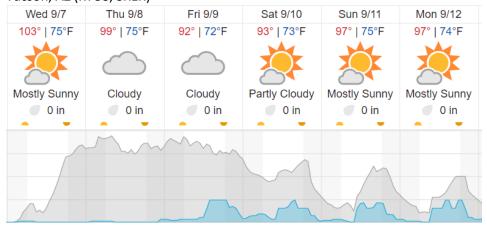
		_	`						,	,	,								
65	66	67	68	69	70	71	72	73	74	75	76	77	78	79	80	81	82	83	84
85	86	87	88	89	90														

Flown: 15% (4/26) Green: 15% (4/26) Yellow: 0% (0/26) Red: 0% (0/26)

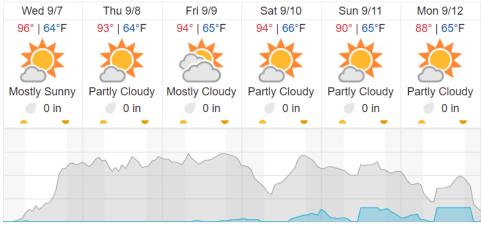
<sup>\*</sup>Lines 89 and 90 were flown but will be re-flown for better data quality if time allows

#### **Weather Forecast**

#### Tucson, AZ (KTUS, SRER)



#### Hatch, NM (JORN)



Cloud Cover (%) Chance of Precip. (%)

source: wunderground.com

## Flight Collection Plan for 7 September 2022

Flyority 1

Collection Area: Santa Rita Experimental Range (SRER) – Priority 3 Box

Flight Plan Name: D14\_SRER\_C1\_P1\_v6\_PRM.xml 40° On-station Time: 16:20 UTC / 09:20 MST

Flyority 2 (if green)

Collection Area: Jornada (JORN) – Priority 2 Flight Box Flight Plan Name: D14\_JORN\_R1\_P1\_v5\_PRM.xml 35° On-station Time: 15:40 UTC / 09:40 MDT / 8:40 MST

Flyority 3

Collection Area: Nominal Runway – D14

Flight Plan Name: D14\_N14A\_Nominal\_Runway\_Test\_v1\_PRM

On-station Time: N/A

Crew: Elissa, Abe