AVAPS Dropsonde Report for ACTIVATE
Winter/Spring and Summer Campaign 2022
Updated R1: 20230131

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Any questions, comments, or concerns with the sonde data can be directed to the PI and/or the DM. Users are strongly encouraged to consult with the PI and/or DM for data usage. More information about individual sondes is available in the header of each data file.

For R1 Data:

All soundings were reprocessed from raw data. The details of this processing are described in

Vömel et al. (2023): Dropsonde observations during the Aerosol Cloud meTeorology Interactions oVer the western ATlantic Experiment, Scientific Data, submitted.

Most changes compared to release R0 are minor and it is not expected that studies are required to use the updated data set.
Release R1 contains more data compared to the previous releases.
New users of the ACTIVATE dropsonde data should use release R1.

The most significant difference to the earlier release R0 are:

* All soundings processed with the same ASPEN version (3.4.7)

* Almost all profiles contain more data closer to the aircraft (on average 700 m more data).

* Twenty three soundings were added to the archive, which had not been included in the initial data release. Test flight soundings were also included in this release.

* Vertical wind speed were bias adjusted and noise to due pressure sensor removed.
The vertical wind data field is called "Wwind" instead of "Ascent".
Studies using vertical winds must use the vertical wind speed estimate of release R1.
See Vömel et al. (2023) for details on the vertical wind calculations.

* The precision of latitude and longitude was increased from 2 decimals to 6 decimals.

* All parameters may see insignificant changes in values due to updates in smoothing and filtering.

* Data files contain a few additional metadata fields, in particular launch latitude, longitude, and altitude.

* For a few soundings the launch time and launch lat/lon was updated.
The correct launch time is part of the metadata and may be inconsistent with the file name (see Vömel et al. for additional information).
The date stamps in the filename between release R0 and release R1 are consistent.

* Four soundings have significant changes in the reported pressure after a missing offset correction was applied

Overview

This dropsonde reports encompasses the flights for the second year of the Aerosol Cloud meTeorology Interactions oVer the western ATlantic Experiment (ACTIVATE) campaign. For information on other deployments, please refer to the ACTIVATE dropsonde report for 2020 and 2021 available at https://www-air.larc.nasa.gov/missions/activate/index.html. ACTIVATE conducted two deployments in 2022, the first deployment conducted from December 2021-March 2022 (Winter/Spring) and the second deployed from May-June 2022 (Summer). The Airborne Vertical Atmospheric Profiling System (AVAPS) was mounted on the NASA King Air (UC12) and utilized the nRD41 mini sondes for the duration of the mission. A total of 370 sondes were launched for both deployments, with 215 sondes launched in the winter/spring deployment and 155 launched in the summer deployment. Sonde release strategies were determined on a flight-by-flight basis. There were three commonly conducted flight tracks; a “statistical survey” (out to a certain point and back), a “process study” (a circle of sonde launches around a determined point or a wall pattern that focused on a certain leg of the flight), and a “satellite overpass” (flying under the satellite track, dropping sondes along the path). There

was also a flight track that would exit out one corridor, fly in a triangle or "loop", and enter the corridor (either same or different), creating a loop to study cold air outbreak conditions (For this document, the track is referred to as a "Cold Air Outbreak Loop" (but there is probably another name used by the science team). When not in Cold Air Outbreak conditions, this flight pattern is referred to as "loop". For the winter/spring deployment of ACTIVATE, we also were able to fly up to KOQU, Rhode Island and TXKF, Bermuda for a turnaround point/ remote base and return to Langley AFB in the same day. These flights are labeled as "(type of flight) to/from RMTB" in the flight type. (Unicorn) refers to a clear air statistical survey of the falcon in a spiral collocated with the UC-12 specifically to focus on RSP retrievals. The "mini-wall" denotes the process studies that were completed for the winter portion of the 2022 campaign, an iteration on the process study loop that was completed for both the 2020 and the 2021 campaigns. For a portion of the Summer 2022 flights, the ACTIVATE aircrafts based out of Bermuda (TXKF). These flights are labeled with the "TXKF" as the corridor used, since there were no commonly used corridors for this portion of the campaign.

Table 1 contains information about each flight including the number of sondes launched, the transit path taken, and the approximate direction the sondes were launched after transit. Please note that since this is the third year of the mission, the Flight Number continues from the previous mission. More detailed information about the flight strategies can be found in the flight reports on the archive and should be used for further understanding on the sonde strategy.

Table 1. Summary of Sondes for the ACTIVATE, Winter/Spring and Summer 2022 Campaign

Flight #	Day (YYYYMMDD)	# Sondes	ZIBUT or OXANA	Direction after Corridor	Flight Type*
RF94	20211130	4	OXANA	SE	SS
RF95	20211201	4	OXANA	SE	SS
RF96	20211207	4	ZIBUT	NE	SS
RF97	20211209	5	ZIBUT	NE	SS to RMTB
RF98	20211209	6	Other (left KOQU)	SW	SS from RMTB
RF99	20211210	4	ZIBUT	E	SS
RF100	20220111	7	Other (north corridor)	E	Loop
RF101	20220111	7	ZIBUT	SE	SS
RF102	20220112	4	ZIBUT	SE	SS
RF103	20220112	5	ZIBUT	S	SO
RF104	20220115	6	ZIBUT	E	SS
RF105	20220118	8	Other (north corridor)	SE	loop
RF106	20220118	5	ZIBUT	SE	SS
RF107	20220119	4	ZIBUT	NE	SS
RF108	20220119	4	OXANA	E	SS
RF109	20220124	4	OXANA	SE	SS
RF110	20220124	4	OXANA	SW	SS
RF111	20220126	4	ZIBUT	NE	SS

RF112	20220126	3	Other (north corridor)	SE	SS
RF113	20220127	4	Other (CROAK, point before ZIBUT)	NE	SS
RF114	20220127	4	Other (left KOQU)	SW	SS
RF115	20220201	4	ZIBUT	NE	SS
RF116	20220202	4	OXANA	SE	SS
RF117	20220203	4	OXANA	SE	SS
RF118	20220203	4	OXANA	SW	SS
RF119	20220205	3	Other (north corridor)	SE	SS
RF120	20220215	4	OXANA	S	SS
RF121	20220215	3	OXANA	E	SS
RF122	20220216	3	OXANA	S	SS
RF123	20220216	3	ZIBUT	E	SS
RF124	20220219	2	OXANA		SS
RF125	20220219	3	Other (CROAK, point before ZIBUT)	S	SS
RF126	20220222	3	OXANA	SW	SS
RF127	20220222	3	ZIBUT	E	SS
RF128	20220226	4	ZIBUT (to alt base KPVD)	NE	SS
RF130	20220302	4	ZIBUT	E	SS (unicorn)
RF131	20220303	3	OXANA	NE	SS (unicorn)
RF132	20220303	3	ZIBUT	SE	SS loop
RF133	20220304	4	OXANA	SE	SS
RF134	20220304	3	ZIBUT	NE	SS
RF135	20220307	3	OXANA	SE	SS
RF137	20220313	11	ZIBUT	SE	PS (mini-wall study)
RF138	20220313	3	Other (3742N07415W)	SE	SS
RF139	20220314	3	OXANA	SE	SS
RF140	20220314	3	OXANA	SW	SS
RF141	20220318	3	ZIBUT	E	SS
RF142	20220322	3	ZIBUT	SE	SS to RMTB
RF143	20220322	4	Other (left TXKF)	NW	SS from RMTB
RF144	20220326	3	OXANA	SE	SS
RF145	20220326	3	OXANA	SE	SS
RF146	20220328	4	ZIBUT	SE	SS loop
RF147	20220329	4	Other (north corridor)	SE	SS loop
RF148	20220329	4	Other (north corridor)	SE	PS loop

RF149	20220503	4	ZIBUT	NE	SS
RF150	20220505	4	ZIBUT (to alt base KPVD)	NE	SS to RMTB
RF151	20220505	4	Other (left KPVD)	SE	SS from RMTB
RF152	20220510	4	ZIBUT	NE	SS
RF153	20220516	4	ZIBUT	SE	SS
RF154	20220516	4	ZIBUT	SE	SS
RF155	20220517	3	ZIBUT	NE	SS
RF156	20220518	4	ZIBUT (to alt base TXKF)	SE	SS to RMTB
RF157	20220518	4	TXKF (to KLFI)	NW	SO, from RMTB
RF158	20220520	4	OXANA	SW	SS
RF159	20220521	5	ZIBUT (to alt base TXKF)	SE	SS to RMTB
RF160	20220521	5	TXKF (to KLFI)	NW	SS from RMTB
RF161	20220531	3	ZIBUT (to alt base TXKF)	SE	SS (to RMTB, TXKF)
RF165	20220605	4	TXKF	NE	SS
RF166	20220607	5	TXKF	NE	SS
RF167	20220607	5	TXKF	NE	SS
RF168	20220608	5	TXKF	NW	SS, SO
RF169	20220608	5	TXKF	SE	SS
RF170	20220610	7	TXKF	SW	SS, SO
RF171	20220610	16	TXKF	SW	PS
RF172	20220611	4	TXKF	W	SS
RF173	20220611	23	TXKF	S	PS
RF174	20220613	3	TXKF	E	SS
RF175	20220613	5	TXKF	S	SO
RF176	20220614	5	TXKF	S	PS
RF177	20220616	3	TXKF	N	SS
RF178	20220617	8	TXKF	NE	SS
RF179	20220618	5	TXKF (to home, KLFI)	NW	SS

*Flight Type: SS, statistical survey; PS, Process study; SO, satellite overpass; CAOL, Cold Air Outbreak Loop, RMTB; Remote Base

Sonde Performance

Overall, sonde performance was optimal for the duration of both campaigns. Table 1 highlights the overall performance parameters for the sondes during both campaigns. For sonde performance of each individual sonde, please refer to the header for each sonde data file.

Table 1. Overview of Sondes for ACTIVATE, Winter/Spring and Summer 2022 Campaign

	Winter/Spring Deployment	Summer Deployment
Total Number of Sondes	215	155
Fast Falls	1	1
Time Sync Issues	4	0
Lost/Weak Telemetry	9	0
No Winds	4	0

Fast Fall

There was a total of two occurrences during the two deployments where the sonde encountered a "fast fall" scenario, one in the Spring and one in the Summer. Fast Falls occur when a sonde fails to deploy the parachute. Sonde 461 was not added to the archive due to the full fast fall deployment scenario while sonde 696 was since it was only a partial fast fall. All other sondes from both campaigns had successful parachute deployments and transferred data down to the surface. Table 2 has the information for the fast fall sonde and the information can also be seen in the table displaying all sondes for both campaigns.

Table 2. Fast Fall Sonde Information

Sonde #	Flight #	Sonde ID	Flight Date (YYMMDD)	Time (HHMMSS.SS)	Note
461	RF101	190520735	220111	200008.48	Fast Fall, not in archive
696	RF161	190630337	220531	133513.75	Partial Fast Fall

Time Sync Error

There were times in the Spring deployment where the computer clock and the time in the AVAPS software were not in sync. When this happened, sondes would not transmit the sonde data properly to a format that was easy to read by the QC program (ASPEN). When this occurred, sonde data had to be recovered using the decoded binary files. This work was completed by Holger Vömel at NCAR. This created uncertainty in the launch time for these sondes. Table 4 includes the sondes that suffered from the time sync issue. The issue was prevented by ensuring that the computer time and the time in the AVAPS program were synced. Sonde 580 transmission of data was cut off early and is denoted with **. This sonde is not in the archive due to the incomplete profile.

Table 4. Time Sync Error Sonde Information

Sonde #	Flight #	Sonde ID	Flight Date (YYMMDD)	Time (HHMMSS.SS)	Note
579	RF130	194240033	220302	202900.00	Recovered and archived
580**	RF130	194210825	220302	203313.50	Sonde transmission cut off early due to time sync issue
581	RF130	190630423	220302	211001.25	Recovered and archived
582	RF130	194230740	220302	2225140.00	Recovered and archived

Lost/Weak Telemetry

Sondes occasionally with have intermittent connections issues that can be associated with poor connection to the satellites or poor data transmission to the chassis. There were nine sondes that lost telemetry or had poor connection after being dropped. Based on the amount of data lost, the sonde was pulled from the archive and noted here as well as in the header. If there is interest in partial profile sondes, please reach out to the PI/DM. These "Lost/Weak Telemetry" sondes are noted in Table 5.

Table 5. Lost Telemetry Sonde Information

Sonde #	Flight #	Sonde ID	Flight Date (YYMMDD)	Time (HHMMSS.SS)	Note
479	RF105	194140549	220118	140244.56	Lost Telemetry halfway through drop, not in archive
480	RF105	190520640	220118	141218.58	Spotty GPS connection through the drop
486	RF105	194140559	220118	162712.88	Weak telemetry towards the middle of the drop
488	RF106	194140510	220118	194932.37	Failed QC Winds, weak telemetry, not in archive
568	RF125	194240565	220219	214544.50	Weak telemetry at beginning of drop, recovered
571	RF126	194330230	220219	162620.25	Weak telemetry at beginning of drop, recovered
601	RF137	204940575	20220313	140629.75	Weak telemetry below 550mb
611	RF138	204910528	20220313	185850.25	Weak telemetry below 650mb
624	RF142	204950421	20220322	150135.25	Weak telemetry bwtn 900-975mb

No GPS/Winds Data

Sondes occasionally have intermittent connection issues that can be associated with poor connection to the satellites or poor data transmission to the chassis. None of these sondes are in the archive. If there is interest in sonde profiles that do not contain all of the relevant data, please reach out to the PI/DM. These "No GPS/Winds" sondes are noted in Table 6.

Table 6. No GPS/Winds Sonde Information

Sonde #	Flight #	Sonde ID	Flight Date (YYMMDD)	Time (HHMMSS.SS)	Note
439	RF097	194410234	201209	154136.51	No Winds, not on archive
470	RF103	204140943	220112	194235.03	No GPS, not in archive
476	RF104	194410226	220115	151357.80	No GPS, not in archive
481	RF105	204030671	220118	142138.60	No GPS, not in archive

Table 7. List of all Sondes for the ACTIVATE Winter/Spring and Summer 2022 Campaign

Sonde #	Flight #	Sonde ID	Date (YYMMDD)	Time (HHMMSS.SS	Lat	Long	Alt (m)	Status	Notes
422	ICF1	190510316	211119	173915.04	36.935154	-73.898264	7924.07	Good Drop	None/ not in archive because ICF
423	RF094	194230732	211130	171556.92	34.388024	-73.790762	8666.61	Good Drop	none
424	RF094	190640173	211130	174336.98	32.863511	-71.826428	8709.25	Good Drop	none
425	RF094	194240997	211130	181543.06	33.724277	-72.926001	8688.25	Good Drop	none
426	RF094	194240568	211130	185953.16	35.323177	-74.960757	8631.82	Good Drop	none
427	RF095	194210802	211201	162036.20	34.424632	-73.836758	8704.12	Good Drop	none
428	RF095	183630635	211201	165106.27	33.608660	-70.983282	8732.13	Good Drop	none
429	RF095	194240055	211201	171932.33	34.064267	-72.516821	8712.23	Good Drop	none
430	RF095	194140462	211201	180924.45	35.446604	-75.119932	7141.47	Good Drop	none
431	RF096	180520409	211207	174104.98	36.946688	-72.651271	8716.81	Good Drop	none
432	RF096	194240084	211207	181838.06	38.554524	-69.527043	8675.58	Good Drop	none
433	RF096	194240287	211207	185240.13	37.719773	-71.186918	8693.78	Good Drop	none
434	RF096	190630760	211207	200013.28	36.928079	-75.279309	8701.24	Good Drop	none
435	RF097	194410230	211209	132620.20	36.938826	-73.102587	8703.15	Good Drop	none
436	RF097	194250322	211209	135650.27	37.887544	-70.736313	8640.06	Good Drop	none
437	RF097	194250359	211209	142834.34	38.991241	-68.336815	8570.40	Good Drop	none
438	RF097	190630358	211209	144538.38	39.542749	-67.587523	8531.03	Good Drop	none
439	RF097	194410234	211209	154136.51	41.071625	-69.719599	8499.00	No Winds/GPS	No Winds, not on archive

440	RF098	190430394	211209	174235.36	40.939964	-70.615221	6347.88	Good Drop	QC Winds error for first half of profile
441	RF098	194240204	211209	180059.40	39.883655	-69.389672	6762.38	Good Drop	none
442	RF098	190630364	211209	181641.44	38.997765	-68.570031	6798.86	Good Drop	none
443	RF098	194210789	211209	185119.52	38.421020	-70.435042	6830.14	Good Drop	none
444	RF098	190230182	211209	193844.63	37.121046	-72.588747	6871.55	Good Drop	none
445	RF098	194210787	211209	202428.74	36.923689	-75.248599	6867.94	Good Drop	none
446	RF099	190430387	211210	183918.11	36.880952	-72.411235	8769.21	Good Drop	none
447	RF099	171330184	211210	191407.19	36.069125	-69.358050	8167.80	Good Drop	none
448	RF099	180440264	211210	194000.25	36.569354	-71.092792	8148.41	Good Drop	none
449	RF099	194210864	211210	203729.39	36.920444	-75.031360	8157.54	Good Drop	none
450	RF100	190630759	220111	142119.81	38.916241	-74.556349	8016.35	Good Drop	none
451	RF100	194250496	220111	143305.83	38.464595	-73.551103	8254.62	Good Drop	none
452	RF100	194240044	220111	144201.85	38.06309	-72.77303	8306.09	Good Drop	none
453	RF100	194240032	220111	145828.89	37.024648	-71.700756	8364.56	Good Drop	none
454	RF100	194210836	220111	151357.92	36.027023	-70.682586	8426.64	Good Drop	none
455	RF100	190630375	220111	155803.02	36.93771	-72.701517	8421.93	Good Drop	none
456	RF100	180630060	220111	163830.11	36.919027	-75.154678	8493.12	Good Drop	none
457	RF101	194410241	220111	191826.39	36.937761	-72.579405	8463.62	Good Drop	none
458	RF101	194410225	220111	192935.41	36.875591	-71.528627	8427.27	Good Drop	none
459	RF101	183630663	220111	193742.43	36.318735	-70.977915	8452.99	Good Drop	none
460	RF101	194320900	220111	194808.45	35.619819	-70.303691	8482.98	Good Drop	none
461	RF101	190520735	220111	200008.48	35.444759	-70.136795	8495.71	Weak Telemetry	Possible Fast Fall, not in archive
462	RF101	204140945	220111	200249.49	35.541195	-70.228477	8490.4	Weak Telemetry	No Issue, flagged as weak telem
463	RF101	194240035	220111	213522.7	36.924408	-75.252988	8554.85	Good Drop	none
464	RF102	204250069	220112	140859.25	36.938559	-72.718504	8577.3	Good Drop	none
465	RF102	194410238	220112	144925.34	35.244906	-69.744302	8629.17	Good Drop	none
466	RF102	194240097	220112	151704.4	36.166582	-71.301415	8586.49	Good Drop	none
467	RF102	204250056	220112	161357.53	36.919298	-75.150087	8585.56	Good Drop	none
468	RF103	203830648	220112	184755.90	36.945182	-72.486968	8554.87	Good Drop	none
469	RF103	203710523	220112	193337.01	33.908385	-71.540365	8602.35	Good Drop	none
470	RF103	204140943	220112	194235.03	34.306595	-71.654332	8592.78	Good Drop	No GPS, not in archive
471	RF103	204030672	220112	201842.11	36.717137	-72.398922	8564.17	Good Drop	none
472	RF103	194250375	220112	205745.20	36.921258	-75.235597	8555.15	Good Drop	none
473	RF104	203710476	220115	134022.58	36.938560	-72.723049	8446.77	Good Drop	none
474	RF104	204250068	220115	142528.68	35.971582	-68.843699	8466.49	Good Drop	none

475	RF104	204250071	220115	144957.74	36.300420	-70.112053	8468.63	Good Drop	none
476	RF104	194410226	220115	151357.80	36.638320	-71.432241	8469.68	Good Drop	No GPS, not in archive
477	RF104	194230730	220115	151643.80	36.676900	-71.587586	8467.51	Good Drop	none
478	RF104	194140552	220115	161749.94	36.917723	-75.196954	6654.81	Good Drop	none
479	RF105	194140549	220118	140244.56	38.923231	-74.470700	7909.82	Weak Telemetry	Lost telemetry halfway through profile, not on archive
480	RF105	190520640	220118	141218.58	38.468846	-73.539014	8206.35	Weak Telemetry	Weak telemetry though drop
481	RF105	204030671	220118	142138.60	38.049442	-72.646270	8228.28	No Winds	No GPS, not in archive
482	RF105	204250070	220118	142345.60	37.981390	-72.429014	8233.82	Good Drop	none
483	RF105	194410239	220118	143810.64	37.511809	-70.971744	8267.08	Good Drop	none
484	RF105	204030670	220118	145232.67	37.065938	-69.758179	8299.07	Good Drop	none
485	RF105	194140548	220118	154502.79	36.946757	-72.541971	8329.50	Good Drop	none
486	RF105	194140559	220118	162712.88	36.920501	-75.055770	7776.14	Good Drop	Weak telemetry in middle of profile
487	RF106	194140551	220118	191829.31	36.912690	-72.570310	8386.51	Good Drop	none
488	RF106	194140510	220118	194932.37	36.024105	-69.332432	8407.30	Good Drop	Failed QC Winds, weak telemetry, not in archive
489	RF106	194140494	220118	201837.44	36.316811	-70.355736	8408.81	Good Drop	none
490	RF106	204250061	220118	204314.50	36.622995	-71.468610	8411.23	Good Drop	none
491	RF106	194140507	220118	215604.66	36.918432	-75.172838	8474.47	Good Drop	none
492	RF107	204820148	220119	140905.07	36.998066	-72.085686	7378.09	Good Drop	none
493	RF107	194140469	220119	144813.16	37.248622	-69.025832	7373.46	Good Drop	none
494	RF107	203710497	220119	151805.23	37.107296	-70.924894	7371.07	Good Drop	none
495	RF107	194140561	220119	162004.37	36.917995	-75.156323	5526.70	Good Drop	none
496	RF108	204030669	220119	194007.11	34.342649	-73.595638	8657.61	Good Drop	none
497	RF108	194410237	220119	200942.17	34.004510	-71.038394	8680.08	Good Drop	none
498	RF108	194140550	220119	203327.23	34.174709	-72.270090	8664.96	Good Drop	none
499	RF108	204130040	220119	211933.33	35.343090	-74.988276	8625.85	Good Drop	none
500	RF109	204820127	20220124	143052.50	34.437158	-73.851634	8515.10	Good Drop	none
501	RF109	204820053	20220124	150348.75	32.400167	-72.271136	8602.60	Good Drop	none
502	RF109	204770774	20220124	152938.50	33.496940	-73.092193	8558.00	Good Drop	none
503	RF109	204950432	20220124	161700.25	35.459667	-75.136362	8486.30	Good Drop	none

504	RF110	204820106	20220124	191314.00	34.447809	-73.864132	8535.20	Good Drop	none
505	RF110	194140506	20220124	195811.25	32.559005	-75.446206	8587.70	Good Drop	none
506	RF110	204730530	20220124	201725.75	33.462291	-74.612659	8566.20	Good Drop	none
507	RF110	204910483	20220124	205304.25	35.279510	-74.906644	8518.70	Good Drop	none
508	RF111	204650388	20220126	134715.75	36.948916	-72.979132	8504.90	Good Drop	none
509	RF111	204940521	20220126	142439.50	38.593090	-69.518594	8484.40	Good Drop	none
510	RF111	204770323	20220126	150007.25	37.811266	-71.170721	8494.00	Good Drop	none
511	RF111	204730481	20220126	161922.00	36.926547	-75.268185	6639.30	Good Drop	none
512	RF112	204820161	20220126	190504.75	38.054636	-72.611374	8390.90	Good Drop	none
513	RF112	204770440	20220126	192534.50	39.427886	-71.312528	8325.10	Good Drop	none
514	RF112	204940538	20220126	204643.25	38.835987	-74.272596	8294.90	Good Drop	none
515	RF113	203551026	20220127	133235.00	36.955660	-72.961286	8479.50	Good Drop	none
516	RF113	204940524	20220127	141308.00	38.420136	-69.778618	8446.80	Good Drop	none
517	RF113	204540539	20220127	144801.00	39.574419	-67.629811	8422.70	Good Drop	none
518	RF113	204820145	20220127	152340.25	40.959850	-69.587079	8393.30	Good Drop	none
519	RF114	204940507	20220127	183930.00	39.311816	-67.673777	8431.20	Good Drop	none
520	RF114	204940496	20220127	190915.50	38.404932	-69.815453	8422.50	Good Drop	none
521	RF114	204950405	20220127	195845.00	36.938359	-73.062879	8423.40	Good Drop	none
522	RF114	204770797	20220127	202947.75	36.919927	-75.064055	8442.60	Good Drop	none
523	RF115	204770803	20220201	140931.00	36.938636	-72.729151	8471.00	Good Drop	none
524	RF115	204640444	20220201	145734.50	39.354866	-71.353849	8433.70	Good Drop	none
525	RF115	204940537	20220201	151943.50	38.174391	-72.007525	8462.30	Good Drop	none
526	RF115	204910501	20220201	160931.75	36.921336	-75.024462	8576.60	Good Drop	none
527	RF116	204820055	20220202	192056.75	34.393416	-73.797804	8728.30	Good Drop	none
528	RF116	204940580	20220202	200301.25	32.256322	-71.648118	8730.60	Good Drop	none
529	RF116	204910525	20220202	202743.75	33.372126	-72.719913	8728.80	Good Drop	none
530	RF116	204770024	20220202	211533.50	35.582641	-75.295113	8735.60	Good Drop	none
531	RF117	204770772	20220203	142508.75	34.364651	-73.761906	8844.90	Good Drop	none
532	RF117	204770031	20220203	150041.00	32.768383	-71.803668	8860.70	Good Drop	none
533	RF117	204910231	20220203	152032.50	33.628059	-72.798341	8857.00	Good Drop	none
534	RF117	204650389	20220203	160405.00	35.511984	-75.203769	8841.50	Good Drop	none
535	RF118	204820140	20220203	191014.75	34.448700	-73.864316	8858.00	Good Drop	none
536	RF118	204820138	20220203	194903.50	32.219204	-75.058160	8884.50	Good Drop	none
537	RF118	204820052	20220203	200941.75	33.449093	-74.304226	8865.30	Good Drop	none
538	RF118	204770780	20220203	204710.75	35.457156	-75.133818	8841.60	Good Drop	none
539	RF119	204610870	20220205	154636.25	37.981366	-72.655732	7588.90	Good Drop	none
540	RF119	204770458	20220205	160507.00	38.470255	-73.542057	7506.80	Good Drop	none
541	RF119	204940594	20220205	162134.75	38.860748	-74.461408	7137.70	Good Drop	none
542	RF120	204620017	20220215	143036.25	34.272400	-73.644789	8684.60	Good Drop	none
543	RF120	204770457	20220215	150031.50	32.726094	-71.707151	8745.00	Good Drop	none
544	RF120	204910526	20220215	152823.75	33.565337	-72.750874	8710.10	Good Drop	none

545	RF120	190230148	20220215	162214.25	35.491630	-75.177032	8643.40	Good Drop	none
546	RF121	194210852	20220215	192757.00	34.350132	-73.607170	8680.50	Good Drop	none
547	RF121	204770490	20220215	200040.50	34.028770	-70.266132	8697.30	Good Drop	none
548	RF121	194410240	20220215	203505.25	34.191765	-71.826748	8687.30	Good Drop	none
549	RF122	194230793	20220216	142546.00	34.275761	-73.750855	8715.00	Good Drop	none
550	RF122	194230731	20220216	150100.25	31.969320	-73.503805	8763.80	Good Drop	none
551	RF122	194230797	20220216	160647.00	35.489505	-75.173850	8717.80	Good Drop	none
552	RF123	194240569	20220216	191611.50	36.931585	-72.567222	8696.00	Good Drop	none
553	RF123	194320256	20220216	200130.25	36.588946	-68.415028	8694.10	Good Drop	none
554	RF123	194210835	20220216	214321.00	36.918885	-75.144200	8729.20	Good Drop	none
555	RF124	194230743	20220219	160602.25	34.396462	-73.800560	8710.90	Good Drop	none
556	RF124	194210812	20220219	164047.75	35.389375	-75.046531	8610.40	Good Drop	none
557	RF125	194230791	20220219	202558.00	34.677257	-73.484654	7072.10	Good Drop	none
558	RF125	194240202	20220219	210109.25	36.917025	-73.013890	6934.30	Good Drop	none
559	RF125	194240565	20220219	214544.50	36.934644	-75.323228	6912.00	Good Drop	Sonde not connected at beginning of drop, recovered
560	RF126	194220151	20220222	145804.50	34.193967	-73.899606	8846.90	Good Drop	none
561	RF126	194230796	20220222	152501.75	32.994572	-75.207492	8875.00	Good Drop	none
562	RF126	194330230	20220222	162620.25	35.448675	-75.121862	8851.70	Good Drop	Sonde not connected at beginning of drop, recovered
563	RF127	190220291	20220222	193432.75	36.962057	-72.439453	8815.10	Good Drop	none
564	RF127	194230742	20220222	201320.00	37.272852	-68.939790	8796.80	Good Drop	none
565	RF127	194320115	20220222	214951.50	36.917857	-75.199138	8820.50	Good Drop	none
566	RF128	194330231	20220226	140552.75	36.986204	-72.585033	6250.80	Good Drop	none
567	RF128	194210811	20220226	143733.00	38.556456	-70.383811	6156.80	Good Drop	none
568	RF128	194220152	20220226	150647.00	39.978654	-68.251978	6082.70	Good Drop	none
569	RF128	194410243	20220226	154344.25	41.060415	-69.731376	6023.90	Good Drop	none
570	RF130	194240033	20220302	202900.00	99.000000	999.000000	9999.00	Weak Telemetry	Time not sync'd before flight
571	RF130	194210825	20220302	203313.50	37.228336	-69.163151	8522.20	Weak Telemetry	Time not sync'd before flight, partial profile, not in archive
572	RF130	190630423	20220302	211001.25	99.000000	999.000000	9999.00	Good Drop	Time not sync'd before flight

573	RF130	194230740	20220302	2225140.00	99.000000	999.000000	9999.00	Good Drop	Time not sync'd before flight
574	RF131	194241010	20220303	145933.75	35.429357	-71.443346	8637.20	Good Drop	none
575	RF131	194210851	20220303	151823.50	35.019831	-72.339392	8633.00	Good Drop	none
576	RF131	194230794	20220303	161430.00	35.507954	-75.198371	8646.70	Good Drop	none
577	RF132	194330234	20220303	191235.50	36.930586	-72.647494	7954.50	Good Drop	none
578	RF132	194220147	20220303	194358.25	35.638620	-70.749215	8620.10	Good Drop	none
579	RF132	194240031	20220303	203955.25	34.419638	-73.829904	8654.30	Good Drop	none
580	RF133	204770461	20220304	143731.00	34.322240	-73.720863	8683.70	Good Drop	none
581	RF133	204770786	20220304	151400.75	32.105481	-71.695507	8720.40	Good Drop	none
582	RF133	204770032	20220304	152513.50	32.605600	-72.101823	8710.30	Good Drop	none
583	RF133	204770055	20220304	163741.25	35.519716	-75.209989	8667.40	Good Drop	none
584	RF134	204950407	20220304	192443.75	36.942784	-72.658666	8582.40	Good Drop	none
585	RF134	194220148	20220304	200334.50	38.549963	-69.535905	8444.60	Good Drop	none
586	RF134	204770770	20220304	215148.25	36.919216	-75.162388	8624.50	Good Drop	none
587	RF135	204730485	20220307	142939.75	34.354599	-73.753904	8850.70	Good Drop	none
588	RF135	204940494	20220307	151005.25	32.437244	-72.531786	8884.70	Good Drop	none
589	RF135	204950376	20220307	161527.50	35.583556	-75.295345	8835.10	Good Drop	none
590	RF137	204770034	20220313	131137.25	36.858253	-72.516515	8360.30	Good Drop	none
591	RF137	204940497	20220313	135832.00	35.538823	-70.122008	8505.00	Good Drop	none
592	RF137	204940575	20220313	140629.75	35.738273	-70.472044	8488.80	Good Drop	Weak telemetry below 550mb
593	RF137	204950406	20220313	141048.00	35.834063	-70.641671	8476.70	Good Drop	none
594	RF137	204770416	20220313	141559.75	35.939882	-70.830791	8470.80	Good Drop	none
595	RF137	204770801	20220313	142414.75	36.109143	-71.134921	8457.60	Good Drop	none
596	RF137	204940514	20220313	144003.25	36.420273	-71.700708	8436.60	Good Drop	none
597	RF137	204770026	20220313	145410.00	36.684435	-72.188497	8415.90	Good Drop	none
598	RF137	204910502	20220313	150600.00	36.896018	-72.585312	8401.10	Good Drop	none
599	RF137	204950408	20220313	154159.75	36.934146	-74.073431	8424.70	Good Drop	none
600	RF137	204770027	20220313	160242.50	36.920662	-75.079372	8453.50	Good Drop	none
601	RF138	204770054	20220313	180700.25	37.684841	-74.203639	8443.20	Good Drop	none
602	RF138	204910528	20220313	185850.25	35.366161	-69.815831	8570.20	Good Drop	CRC error with altitude, weak telemetry below 650mb
603	RF138	204770769	20220313	195043.75	36.596023	-72.018809	8520.20	Good Drop	none
604	RF139	204950397	20220314	133145.25	34.334833	-73.740815	8704.60	Good Drop	none
605	RF139	204940506	20220314	140440.25	32.307536	-72.533336	8774.40	Good Drop	none
606	RF139	194210794	20220314	151416.75	35.461057	-75.137760	8074.90	Good Drop	none

607	RF140	204770384	20220314	182604.00	34.284201	-73.824148	8693.10	Good Drop	none
608	RF140	194250497	20220314	191859.75	32.678309	-75.725912	8800.80	Good Drop	none
609	RF140	204940573	20220314	201415.25	35.489820	-75.175515	7442.30	Good Drop	none
610	RF141	204820054	20220318	154449.00	36.938002	-72.658396	8733.50	Good Drop	none
611	RF141	204940509	20220318	164035.25	36.930947	-70.566591	8728.40	Good Drop	none
612	RF141	204770799	20220318	174510.25	36.921429	-75.052205	8758.00	Good Drop	none
613	RF142	204940525	20220322	133631.25	36.937582	-72.703924	7123.30	Good Drop	none
614	RF142	204820154	20220322	141709.50	35.056935	-69.176537	7143.30	Good Drop	none
615	RF142	204950421	20220322	150135.25	33.140139	-65.412501	7172.30	Good Drop	Weak telemetry after 900mb
616	RF143	204910492	20220322	181458.25	34.063328	-67.460345	6858.70	Good Drop	none
617	RF143	204940513	20220322	185235.75	35.132905	-69.309938	6843.80	Good Drop	none
618	RF143	204770798	20220322	191707.25	35.789306	-70.502514	6839.70	Good Drop	none
619	RF143	204940504	20220322	201902.25	36.936389	-73.750111	6850.70	Good Drop	none
620	RF144	204940510	20220326	142314.25	33.220303	-72.296769	8599.70	Good Drop	none
621	RF144	204730483	20220326	145507.25	34.416882	-73.825396	8509.90	Good Drop	none
622	RF144	204540536	20220326	152610.00	35.563377	-75.269218	8415.70	Good Drop	none
623	RF145	204770429	20220326	182553.75	34.356083	-73.750005	8787.60	Good Drop	none
624	RF145	194210806	20220326	191508.25	32.201612	-71.229823	8911.00	Good Drop	none
625	RF145	204820056	20220326	204314.25	35.503750	-75.192014	8642.60	Good Drop	none
626	RF146	204950427	20220328	173032.75	36.918421	-72.629050	8235.10	Good Drop	none
627	RF146	204950434	20220328	175416.00	35.705019	-70.471178	8352.60	Good Drop	none
628	RF146	204770319	20220328	191525.00	34.374446	-73.774143	8473.90	Good Drop	none
629	RF146	204770528	20220328	195912.00	35.553233	-75.256049	8425.90	Good Drop	none
630	RF147	204770488	20220329	132105.50	36.936885	-72.653928	8392.70	Good Drop	none
631	RF147	204650033	20220329	134630.75	36.605581	-69.936091	8336.40	Good Drop	none
632	RF147	204770523	20220329	144633.75	37.698601	-72.032425	8341.40	Good Drop	none
633	RF147	204840552	20220329	154630.00	38.864247	-74.327231	8358.50	Good Drop	none
634	RF148	204910498	20220329	190232.00	37.009800	-70.737902	8398.00	Good Drop	none
635	RF148	204770382	20220329	193112.75	37.498106	-71.650972	8388.60	Good Drop	none
636	RF148	204940502	20220329	195817.50	38.018383	-72.646229	8386.80	Good Drop	none
637	RF148	204840692	20220329	202932.25	38.620471	-73.833994	8375.70	Good Drop	none
638	RF149	204840662	20220503	143523.00	37.005154	-72.632685	8791.40	Good Drop	none
639	RF149	204940572	20220503	151501.00	39.267190	-71.404111	7799.60	Good Drop	none
640	RF149	204770526	20220503	153404.46	38.217096	-71.983711	7847.40	Good Drop	none
641	RF149	204770011	20220503	163100.75	36.915404	-75.179853	7566.30	Good Drop	none
642	RF150	204770036	20220505	131632.50	36.952163	-72.637442	8788.10	Good Drop	none
643	RF150	204540582	20220505	142413.37	39.943118	-67.928576	8731.00	Good Drop	none
644	RF150	204770377	20220505	144436.50	41.124113	-67.892023	8696.00	Good Drop	none
645	RF150	204850202	20220505	151502.25	41.071276	-69.722651	8704.20	Good Drop	none
646	RF151	204840707	20220505	175736.75	40.140059	-68.398411	8721.60	Good Drop	none

647	RF151	204950417	20220505	181312.50	39.305547	-67.321850	8738.90	Good Drop	none
648	RF151	204820058	20220505	185804.50	38.380275	-69.881892	8782.50	Good Drop	none
649	RF151	204940581	20220505	194507.25	36.937794	-72.710238	8831.90	Good Drop	none
650	RF152	204770367	20220510	133101.00	36.938447	-72.748793	8724.40	Good Drop	none
651	RF152	204770489	20220510	142046.25	39.180143	-70.660934	8755.00	Good Drop	none
652	RF152	204770771	20220510	144859.25	38.067860	-71.675605	8741.90	Good Drop	none
653	RF152	204770776	20220510	153429.25	36.919762	-75.101969	8789.00	Good Drop	none
654	RF153	204770777	20220516	131714.25	36.888596	-72.448647	8799.80	Good Drop	none
655	RF153	204770324	20220516	135545.75	36.084952	-69.404009	8825.00	Good Drop	none
656	RF153	204950424	20220516	142137.75	36.566625	-71.077843	8807.40	Good Drop	none
657	RF153	204770492	20220516	151933.50	36.919189	-75.141009	8784.40	Good Drop	none
658	RF154	204610865	20220516	175351.75	36.936993	-73.317241	8788.70	Good Drop	none
659	RF154	204840544	20220516	183353.75	36.204997	-70.097796	8816.80	Good Drop	none
660	RF154	204910491	20220516	191654.25	36.610563	-71.483227	8805.10	Good Drop	none
661	RF154	204770320	20220516	195755.25	36.932990	-74.225691	8773.20	Good Drop	none
662	RF155	204770459	20220517	145307.50	36.948669	-72.616813	8775.20	Good Drop	none
663	RF155	204650385	20220517	152405.00	38.984432	-71.580633	8695.50	Good Drop	none
664	RF155	204650387	20220517	154256.25	38.256968	-71.967576	8721.90	Good Drop	none
665	RF156	204940590	20220518	131201.75	36.930848	-72.623709	8767.40	Good Drop	none
666	RF156	204840541	20220518	134605.00	36.295884	-69.600026	8780.60	Good Drop	none
667	RF156	204950416	20220518	142930.25	33.421879	-68.773497	8847.20	Good Drop	none
668	RF156	204940522	20220518	150505.75	32.699285	-65.817552	8297.20	Good Drop	none
669	RF157	194210824	20220518	181144.75	33.283501	-68.529874	8837.10	Good Drop	none
670	RF157	204840542	20220518	185021.50	35.064039	-69.248674	8822.10	Good Drop	none
671	RF157	204950433	20220518	191432.25	36.338892	-69.611852	8788.30	Good Drop	none
672	RF157	194250352	20220518	204314.00	36.919497	-75.138913	8214.60	Good Drop	none
673	RF158	194410245	20220520	143939.75	34.322726	-73.805917	8904.50	Good Drop	none
674	RF158	194240036	20220520	151706.75	32.544798	-75.487170	8933.90	Good Drop	none
675	RF158	194220155	20220520	154558.50	33.629657	-73.975341	8903.60	Good Drop	none
676	RF158	204770814	20220520	162038.75	35.408266	-75.070395	8585.30	Good Drop	none
677	RF159	194320255	20220521	130630.500	36.817755	-72.431231	8941.8	Good Drop	none
678	RF159	194250402	20220521	132908.000	35.995954	-70.868856	8947.3	Good Drop	none
679	RF159	194220149	20220521	135255.250	35.113703	-69.267390	8960.7	Good Drop	none
680	RF159	194410242	20220521	142050.250	34.067938	-67.437775	8970.8	Good Drop	none
681	RF159	194240570	20220521	145240.000	32.914256	-65.305563	8978.5	Good Drop	none
682	RF160	194210870	20220521	173640.250	33.015683	-67.391627	8973.5	Good Drop	none
683	RF160	194220145	20220521	181414.250	33.549880	-69.853617	8977.5	Good Drop	none
684	RF160	194410145	20220521	185532.500	34.187298	-72.357390	8962.3	Good Drop	none
685	RF160	194250343	20220521	191609.250	35.286894	-72.671473	8971.4	Good Drop	none
686	RF160	194220154	20220521	194317.000	36.896164	-73.146387	8953.2	Good Drop	none

687	RF161	190630337	20220531	133513.75	36.921053	-72.616076	8948	Good Drop	this sonde would not condition the sensor during pre-flight (at least the LED would not indicate that it was conditioning after 3-4 attempts), partial fast fall.
688	RF161	194220150	20220531	142250.75	35.8193	-69.270737	8904.6	Good Drop	none
689	RF161	194250351	20220531	145739	34.92606	-66.807188	8898.4	Good Drop	none
690	RF165	190630797	20220605	115517.25	34.419818	-62.115806	8903.3	Good Drop	none
691	RF165	194250353	20220605	123902.75	36.274067	-59.767527	8881.2	Good Drop	none
692	RF165	194410244	20220605	130302.75	35.352006	-60.925323	8890.2	Good Drop	none
693	RF165	194230739	20220605	135034.75	33.440161	-63.294332	6975.8	Good Drop	none
694	RF166	204250055	20220607	122402.5	34.296205	-61.865709	8906.8	Good Drop	none
695	RF166	194220156	20220607	125759.75	35.746609	-60.074276	8876.7	Good Drop	none
696	RF166	194410246	20220607	131439.75	35.062173	-60.896347	8904.2	Good Drop	none
697	RF166	194320254	20220607	140503.5	33.034434	-63.407126	8920.7	Good Drop	none
698	RF166	190530081	20220607	143756.75	32.302468	-65.274014	7659.2	Good Drop	none
699	RF167	194210826	20220607	170342.5	33.598434	-61.381569	8921.3	Good Drop	none
700	RF167	194230798	20220607	173419.25	34.477869	-58.940867	7317.4	Good Drop	none
701	RF167	194210841	20220607	175147.25	34.104056	-60.068699	7316.5	Good Drop	none
702	RF167	194410146	20220607	183029	33.096868	-62.640882	7330.5	Good Drop	none
703	RF167	194210828	20220607	191035.25	32.295946	-65.214684	7333.1	Good Drop	none
704	RF168	194230795	20220608	140901.25	34.77884	-67.302905	8927.3	Good Drop	none
705	RF168	194210839	20220608	144419	36.89796	-66.580033	8896.9	Good Drop	none
706	RF168	194230728	20220608	151154	35.312282	-67.126361	8930.3	Good Drop	none
707	RF168	194410235	20220608	154500.25	33.363293	-66.286855	8960.4	Good Drop	none
708	RF168	194250400	20220608	155802.25	32.816443	-65.471535	8944.6	Good Drop	none
709	RF169	194250344	20220608	181637.25	31.623548	-61.25276	8943.5	Good Drop	none
710	RF169	204950409	20220608	185632.25	31.000244	-59.037873	8937.5	Good Drop	none
711	RF169	194220146	20220608	191401.25	31.269742	-60.147681	8936.1	Good Drop	none
712	RF169	204540577	20220608	195811	31.978799	-62.949885	8948.4	Good Drop	none
713	RF169	194140471	20220608	203301	32.254408	-65.263361	8949.6	Good Drop	none
714	RF170	204940578	20220610	125436	29.987226	-65.470772	8973.4	Good Drop	none
715	RF170	204820078	20220610	133033	28.66937	-67.474681	8972.6	Good Drop	none
716	RF170	204950401	20220610	135003	27.927913	-68.551183	8988.7	Good Drop	none
717	RF170	204950402	20220610	142809	29.350542	-66.449649	8993.4	Good Drop	none

718	RF170	204770789	20220610	145109	30.392769	-65.352549	8982.5	Good Drop	none
719	RF170	204910505	20220610	145759.75	30.831891	-65.243288	8985	Good Drop	none
720	RF170	204940584	20220610	151608.5	31.999694	-64.937106	8999.7	Good Drop	none
721	RF171	204770792	20220610	180657.25	31.616873	-65.85242	8967.4	Good Drop	none
722	RF171	204820142	20220610	181127.25	31.401231	-65.681444	8969.2	Good Drop	none
723	RF171	204770374	20220610	181512.25	31.499233	-65.497014	8973.6	Good Drop	none
724	RF171	204770370	20220610	182547.75	31.70989	-66.174462	8972.7	Good Drop	none
725	RF171	204820077	20220610	182924.25	31.534249	-66.212835	8975.8	Good Drop	none
726	RF171	204940586	20220610	184059.75	31.774168	-65.468932	8979.2	Good Drop	none
727	RF171	204770487	20220610	184504	31.981415	-65.573013	8971.9	Good Drop	none
728	RF171	204770378	20220610	185855	31.254213	-65.827197	8959.8	Good Drop	none
729	RF171	204540671	20220610	190206	31.302046	-65.639886	8976	Good Drop	none
730	RF171	204770791	20220610	191330.25	32.011713	-65.865443	8952.7	Good Drop	none
731	RF171	204950391	20220610	191654.25	31.945346	-66.074878	8969.7	Good Drop	none
732	RF171	204950371	20220610	193211	31.643403	-65.352295	8969	Good Drop	none
733	RF171	204250057	20220610	193735.75	31.68746	-65.600895	8960.8	Good Drop	none
734	RF171	204950410	20220610	194513.5	31.486359	-66.073175	8969.5	Good Drop	none
735	RF171	204950403	20220610	194810.75	31.360204	-65.926088	8961.8	Good Drop	none
736	RF171	204540668	20220610	195639.25	31.822143	-65.84783	8968.4	Good Drop	none
737	RF172	204910503	20220611	135825.11	28.11707	-66.488754	8985	Good Drop	none
738	RF172	204820144	20220611	142738.5	29.551369	-66.14801	8987.8	Good Drop	none
739	RF172	204940582	20220611	145418.5	31.253428	-65.865068	8982.9	Good Drop	none
740	RF172	204770022	20220611	151743	32.282548	-65.177657	9006.7	Good Drop	none
741	RF173	204820059	20220611	181135.25	30.519178	-65.460413	8990.2	Good Drop	none
742	RF173	194230790	20220611	181424.75	30.53269	-65.656082	8989.6	Good Drop	none
743	RF173	204820074	20220611	181926.25	30.331329	-65.546565	8988.2	Good Drop	none
744	RF173	204620018	20220611	182426	30.112953	-65.332846	8992.2	Good Drop	none
745	RF173	204820143	20220611	182758.75	30.230751	-65.169158	8991	Good Drop	none
746	RF173	204770800	20220611	183800.25	30.428075	-65.794216	8988.8	Good Drop	none
747	RF173	204770779	20220611	184147.25	30.25767	-65.817656	8985.7	Good Drop	none
748	RF173	204910507	20220611	184705.75	30.389599	-65.53578	8978.5	Good Drop	none
749	RF173	204820080	20220611	185120.5	30.56083	-65.293026	8981.2	Good Drop	none
750	RF173	204940579	20220611	185435.75	30.44708	-65.188659	8981.8	Good Drop	none
751	RF173	204770788	20220611	190644	30.906139	-64.709792	8991.8	Good Drop	none
752	RF173	204940526	20220611	190859.75	31.051689	-64.743782	8991.5	Good Drop	none
753	RF173	204950414	20220611	191358.5	30.970395	-64.485334	8987.2	Good Drop	none
754	RF173	204650031	20220611	191821.5	30.798691	-64.262279	8982.2	Good Drop	none
755	RF173	204770044	20220611	192131.5	30.703381	-64.385975	8986.7	Good Drop	none
756	RF173	194220153	20220611	193022.5	31.238364	-64.483698	8989.8	Good Drop	none
757	RF173	204770441	20220611	193331.5	31.264413	-64.295178	8989.7	Good Drop	none
758	RF173	204770015	20220611	194336.5	30.802213	-64.644342	8992.9	Good Drop	none

759	RF173	204950370	20220611	195620	31.085263	-64.17786	8996	Good Drop	none
760	RF173	204950373	20220611	195946.75	30.922663	-64.134478	8997.2	Good Drop	none
761	RF173	204770048	20220611	200504.75	31.055935	-64.431992	8990.6	Good Drop	none
762	RF173	204521288	20220611	200857	31.214649	-64.664378	8990.4	Good Drop	none
763	RF173	204940540	20220611	202834.75	31.185093	-64.354272	8999.2	Good Drop	none
764	RF174	204840686	20220613	121334.25	31.86571	-62.229476	8852.9	Good Drop	none
765	RF174	204820049	20220613	130039.25	31.866605	-58.847926	8870.8	Good Drop	none
766	RF174	204770796	20220613	142857	32.266081	-65.118673	8858.9	Good Drop	none
767	RF175	204540537	20220613	175050.75	28.620125	-63.596322	8830.5	Good Drop	none
768	RF175	204770017	20220613	181710.5	29.919937	-63.932613	8850.6	Good Drop	none
769	RF175	194210838	20220613	184446.75	31.555589	-64.371327	8841.3	Good Drop	none
770	RF175	204820141	20220613	191558	33.152331	-64.959918	7878.4	Good Drop	none
771	RF175	204910494	20220613	193843.25	32.078376	-65.005901	7874.9	Good Drop	none
772	RF176	204770460	20220614	142158	30.646427	-64.285975	8818.5	Good Drop	none
773	RF176	190550251	20220614	143424.5	30.151399	-64.229003	8816.7	Good Drop	none
774	RF176	204950398	20220614	144830.25	30.50544	-64.723159	8809.1	Good Drop	none
775	RF176	204840549	20220614	150414.5	30.542042	-64.119095	8813.2	Good Drop	none
776	RF176	204950400	20220614	151814.5	30.136735	-64.535904	8817.9	Good Drop	none
777	RF177	204770020	20220616	120226.25	34.147588	-64.565819	8768.8	Good Drop	none
778	RF177	204770793	20220616	121639.75	33.120768	-64.657367	8787.8	Good Drop	none
779	RF177	204940495	20220616	123208.75	32.1216	-65.056873	8813	Good Drop	none
780	RF178	204770056	20220617	133732.5	33.051498	-64.628324	8803.6	Good Drop	none
781	RF178	204540538	20220617	140702.25	34.477576	-63.590615	8925.2	Good Drop	none
782	RF178	204940518	20220617	143346.25	35.873362	-63.040497	8908.8	Good Drop	none
783	RF178	204950374	20220617	145759	37.171612	-62.918101	8895.2	Good Drop	none
784	RF178	204950392	20220617	150804.25	36.52406	-62.952429	8902.1	Good Drop	none
785	RF178	204770058	20220617	153000.75	35.057054	-63.157106	8921.2	Good Drop	none
786	RF178	204770428	20220617	155301	33.783244	-64.102724	8945.7	Good Drop	none
787	RF178	204950395	20220617	162128.25	32.081581	-65.079183	9003.2	Good Drop	none
788	RF179	204650390	20220618	124013.75	33.660186	-66.744841	8921	Good Drop	none
789	RF179	194330216	20220618	131256.75	34.728268	-68.59402	8891.8	Good Drop	none
790	RF179	204770369	20220618	135630.75	35.898728	-70.702778	8849.7	Good Drop	none
791	RF179	204770379	20220618	142130.5	36.612972	-72.03916	8817	Good Drop	none
792	RF179	204910510	20220618	151542.25	36.918538	-75.193488	8805.6	Good Drop	none