

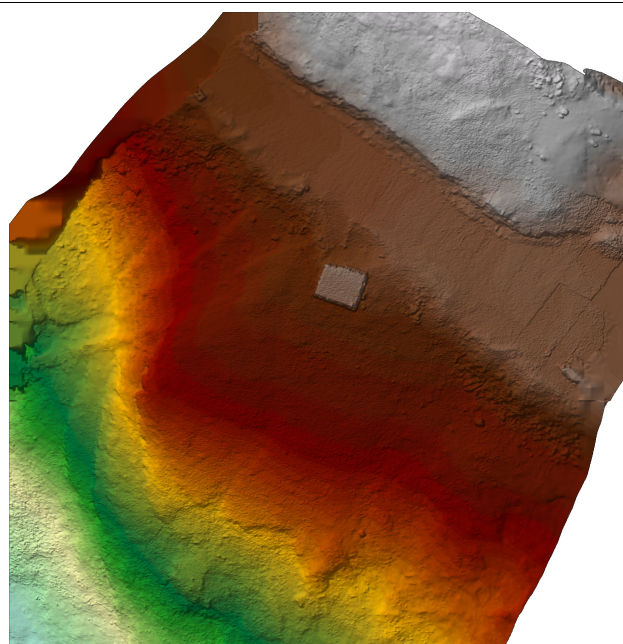
Quality Report

Summary

Project Name	LiMAPPER-BLOGPOST
Created Time	Sun Nov 4 19:15:17 2018
Photos Number	35
Region Area	0.0142001 Km ²
Average Height	51.6484 [m]
Ground Control Points	7
Referencing Coordinate System	[EPSG::6707] RDN2008_TM32
Align Photos time	2.694 [minutes]
Build dense cloud time	19.434 [minutes]
Build DEM/DSM time	14.72917 [seconds]
Build DOM/TDOM time	4.201 [minutes]



TDOM



DSM

2D KeyPoints Detection

Total 2D Keypoints	279039
Max Dimension	Large
Max Keypoints per Image	8192
Mean Keypoints per Image	7972
Max Keypoints Image	8192 (Index = 9, GroupId = 0, FP-01-NADIR-0010-0043.jpg)
Min Keypoints Image	7369 (Index = 28, GroupId = 0, FP-01-NADIR-0037-0070.jpg)

2D KeyPoints Matching

Created 3D Match Tracks	30813
Pair Selection Mode	Reference
Max 2-View Tracks per Image	1024
Mean Tracks per Image	6014
Max Tracks Image	7161 (Index = 23, GroupId = 0, FP-01-NADIR-0032-0065.jpg)
Min Tracks Image	3905 (Index = 0, GroupId = 0, FP-01-NADIR-0001-0034.jpg)
Connected Image Component 0	component 0 (35 images): Index = 0, 1, 2, 11, ..., 14, 30, 28, 29

Camera Calibration Details

Image Groups	Camera Type	Image Size	Focal-Length	Principal Point	K1,K2,K3	P1,P2	B1,B2	Images	RMSE
Group 0	FC6310	[5464x3640]	23.956 [mm] 3635.99 [pixels]	2731.82, 1822.28 [pixels]	0.0225172, 0.0174387, - 0.00567384	0.000522713, 0.00271039	-2.21933, - 3.95827	35/35	0.74489 [pixels]

Aerotriangulation

Registered Images	35/35
Georeferencing	Georeferenced From Rigid GCP
Outlier Threshold (pixels)	6
Number of Sparse 3D Points	30306
Number of 2D Observations	204617
Mean 2D Observations per Image	5846
Max Sparse 3D Points Image	6956(Index = 23, GroupId = 0, FP-01-NADIR-0032-0065.jpg)
Min Sparse 3D Points Image	3801(Index = 0, GroupId = 0, FP-01-NADIR-0001-0034.jpg)
Mean Reprojection Error	0.838738 [pixels]
RMS Reprojection Error	0.74489 [pixels]

Dense Cloud

Number of Points	5120560
Quality	High
Type	3D
Average GSD	0.0553751 m

DEM/DSM

Mode	DSM
Resolution	0.0314251 m

DOM/TDOM

Mode	TDOM
Blend Level	Medium
Color Correction	Enabled
Max Oblique Angle	60 degree
Resolution	0.0157126 m

Geo-Registration From GCP

Unit:m

Geo-Registration GCP Count	Registration RMSE	RMSE-X	RMSE-Y	RMSE-Z
7	0.0257036	0.0121468	0.0110204	0.0197909

GCP-Registration List

Unit:m

Index	Flag	Type	Init-X	Init-Y	Init-Z	Aligned-X	Aligned-Y	Aligned-Z	Error	dX	dY	dZ
100	Ctrl	XYZ	591092.2045	4885301.486	1276.14	591092.2169	4885301.49	1276.142275	0.0131745	0.0124288	0.00373071	0.00227473
101	Check	XYZ	591079.1809	4885312.915	1275.7	591079.197	4885312.932	1275.710482	0.0255039	0.0160939	0.0167798	0.010482
102	Ctrl	XYZ	591067.8085	4885320.806	1275.12	591067.823	4885320.812	1275.09141	0.0325081	0.0144712	0.00547281	-0.0285903
103	Check	XYZ	591067.2624	4885295.998	1271.52	591067.2631	4885296.007	1271.554276	0.035461	0.000673996	0.00906458	0.0342763
104	Ctrl	XYZ	591048.4286	4885285.35	1266.2	591048.4255	4885285.334	1266.181237	0.024809	-0.0031187	-0.015928	-0.0187633
105	Ctrl	XYZ	591082.3265	4885275.629	1266.89	591082.3276	4885275.643	1266.881132	0.0160258	0.00110159	0.0133029	-

												0.00886819
106	Ctrl	XYZ	591074.2415	4885290.206	1270.56	591074.2215	4885290.203	1270.574274	0.0247818	-0.0199629	0.00344765	0.0142735

Geo-Registration From GPS

Unit:m

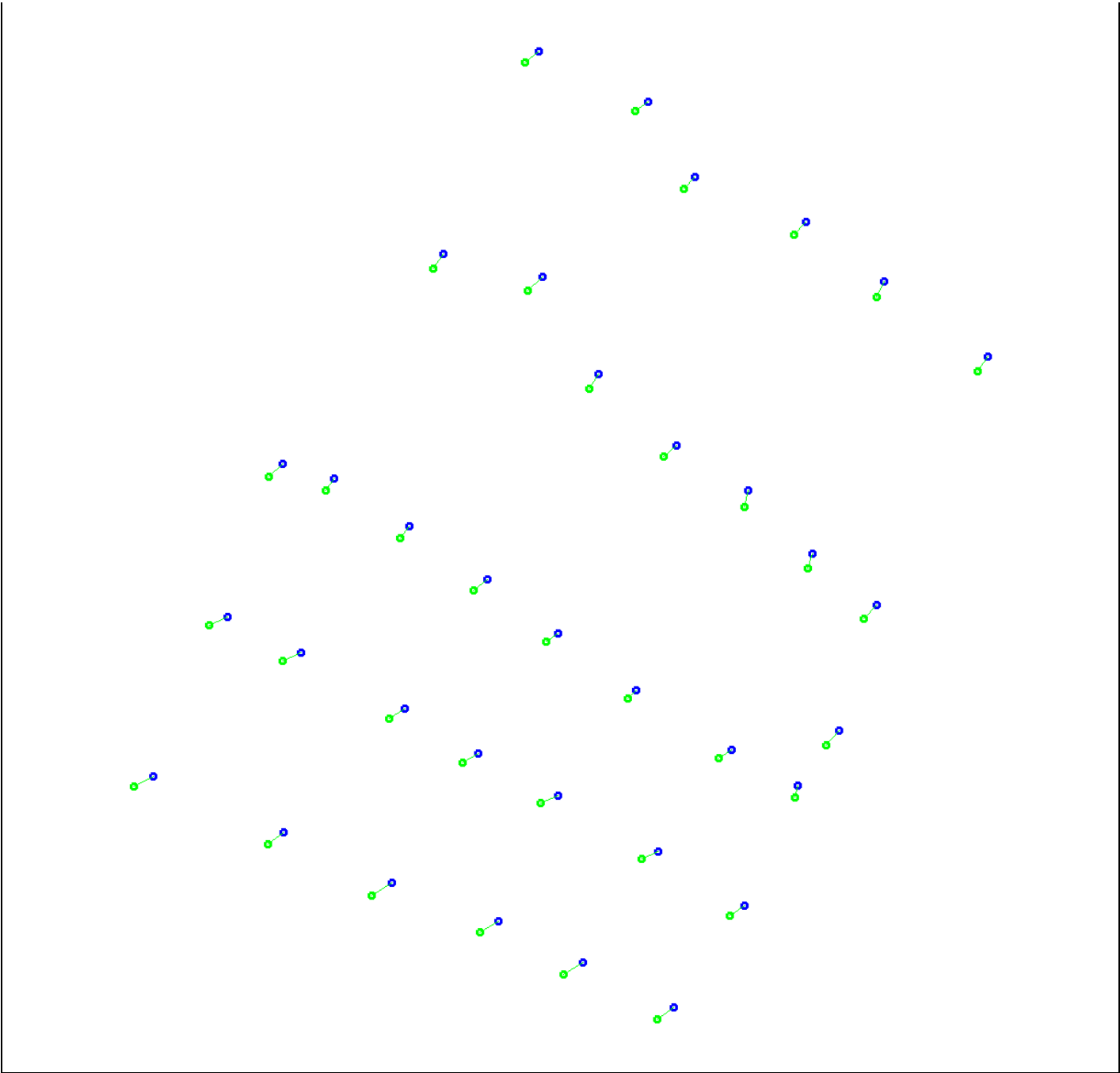
Geo-Registration GPS Count	Registration RMSE	RMSE-X	RMSE-Y	RMSE-Z
35	85.7345	0.827968	0.711665	85.7276
Min Registration X-Axis Error Image	Index = 10, FP-01-NADIR-0011-0044.jpg , init GPS(591083.7229, 4885299.869, 1236.936281), aligned GPS(591083.5326, 4885298.882, 1322.778505), dist = 85.8481 (dx = -0.190335, dy = -0.987171, dz = 85.8422)			
Min Registration Y-Axis Error Image	Index = 23, FP-01-NADIR-0032-0065.jpg , init GPS(591078.2903, 4885277.946, 1231.43543), aligned GPS(591077.2981, 4885277.524, 1317.059274), dist = 85.6306 (dx = -0.992235, dy = -0.422035, dz = 85.6238)			
Min Registration Z-Axis Error Image	Index = 30, FP-01-NADIR-0039-0072.jpg , init GPS(591055.5976, 4885279.114, 1231.435964), aligned GPS(591054.6238, 4885278.435, 1316.560875), dist = 85.1332 (dx = -0.97386, dy = -0.678812, dz = 85.1249)			
Min Registration Error Image	Index = 30, FP-01-NADIR-0039-0072.jpg , init GPS(591055.5976, 4885279.114, 1231.435964), aligned GPS(591054.6238, 4885278.435, 1316.560875), dist = 85.1332 (dx = -0.97386, dy = -0.678812, dz = 85.1249)			
Max Registration X-Axis Error Image	Index = 31, FP-01-NADIR-0040-0073.jpg , init GPS(591062.1761, 4885276.057, 1231.33569), aligned GPS(591060.9553, 4885275.297, 1316.505518), dist = 85.182 (dx = -1.22074, dy = -0.760218, dz = 85.1698)			
Max Registration Y-Axis Error Image	Index = 10, FP-01-NADIR-0011-0044.jpg , init GPS(591083.7229, 4885299.869, 1236.936281), aligned GPS(591083.5326, 4885298.882, 1322.778505), dist = 85.8481 (dx = -0.190335, dy = -0.987171, dz = 85.8422)			
Max Registration Z-Axis Error Image	Index = 0, FP-01-NADIR-0001-0034.jpg , init GPS(591098.283, 4885308.032, 1236.936334), aligned GPS(591097.6692, 4885307.133, 1323.717441), dist = 86.7879 (dx = -0.613794, dy = -0.899804, dz = 86.7811)			
Max Registration Error Image	Index = 0, FP-01-NADIR-0001-0034.jpg , init GPS(591098.283, 4885308.032, 1236.936334), aligned GPS(591097.6692, 4885307.133, 1323.717441), dist = 86.7879 (dx = -0.613794, dy = -0.899804, dz = 86.7811)			

GPS-Registration List

Unit:m

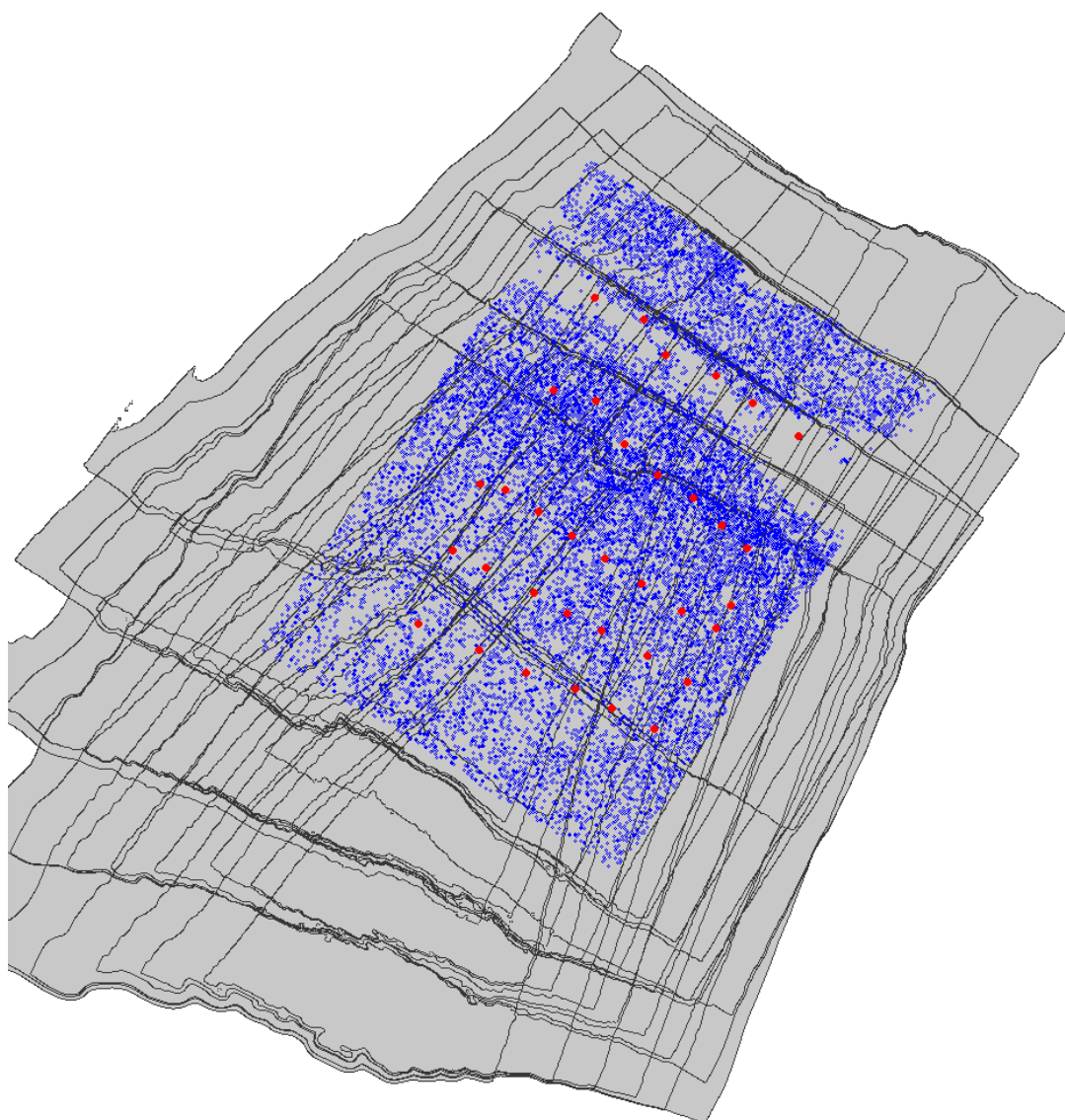
Index	Init-X	Init-Y	Init-Z	Aligned-X	Aligned-Y	Aligned-Z	Error	dX	dY	dZ
0	591098.283	4885308.032	1236.936334	591097.6692	4885307.133	1323.717441	86.7879	-0.613794	-0.899804	86.7811
1	591091.9508	4885312.574	1237.03667	591091.5476	4885311.627	1323.669117	86.6386	-0.403282	-0.947061	86.6324
2	591087.2318	4885316.211	1236.936929	591086.5339	4885315.392	1323.433221	86.503	-0.697971	-0.819569	86.4963
3	591080.5252	4885318.896	1236.937189	591079.8261	4885318.168	1323.312903	86.3816	-0.699123	-0.727694	86.3757
4	591077.6605	4885323.485	1237.037452	591076.8905	4885322.931	1323.578743	86.5465	-0.769953	-0.554267	86.5413
5	591071.0821	4885326.542	1236.937727	591070.211	4885325.883	1323.355064	86.4242	-0.871105	-0.658808	86.4173
6	591065.2496	4885314.241	1237.037307	591064.6878	4885313.359	1323.249445	86.2185	-0.561815	-0.881854	86.2121
7	591071.2715	4885312.843	1236.937116	591070.405	4885312.01	1323.104881	86.1762	-0.866518	-0.833242	86.1678
8	591074.6876	4885306.965	1236.936784	591074.144	4885306.067	1322.913028	85.9827	-0.543587	-0.898275	85.9762
9	591079.4168	4885302.587	1236.936491	591078.6508	4885301.933	1322.883938	85.9534	-0.765982	-0.654209	85.9474
..	..	..	..	..	..	..	..	..	..	..
25	591067.4032	4885283.906	1231.535926	591066.4565	4885283.355	1316.88776	85.3589	-0.946667	-0.550579	85.3518
26	591062.9637	4885286.622	1231.536136	591062.009	4885286.044	1316.804442	85.2756	-0.954692	-0.577905	85.2683
27	591056.6469	4885290.052	1231.436422	591055.5647	4885289.525	1316.869262	85.4413	-1.08218	-0.527599	85.4328
28	591052.2151	4885292.213	1231.436613	591051.0777	4885291.731	1316.847601	85.4199	-1.13742	-0.481893	85.411
29	591047.6804	4885282.522	1231.536281	591046.5034	4885281.924	1316.734028	85.208	-1.17705	-0.598267	85.1977
30	591055.5976	4885279.114	1231.435964	591054.6238	4885278.435	1316.560875	85.1332	-0.97386	-0.678812	85.1249
31	591062.1761	4885276.057	1231.33569	591060.9553	4885275.297	1316.505518	85.182	-1.22074	-0.760218	85.1698
32	591068.6109	4885273.739	1231.335453	591067.5234	4885273.085	1316.534428	85.2084	-1.08748	-0.653436	85.199
33	591073.7147	4885271.217	1231.435232	591072.5491	4885270.535	1316.756247	85.3317	-1.16557	-0.681952	85.321
34	591079.2211	4885268.516	1231.434999	591078.264	4885267.779	1316.711825	85.2854	-0.957045	-0.737188	85.2768

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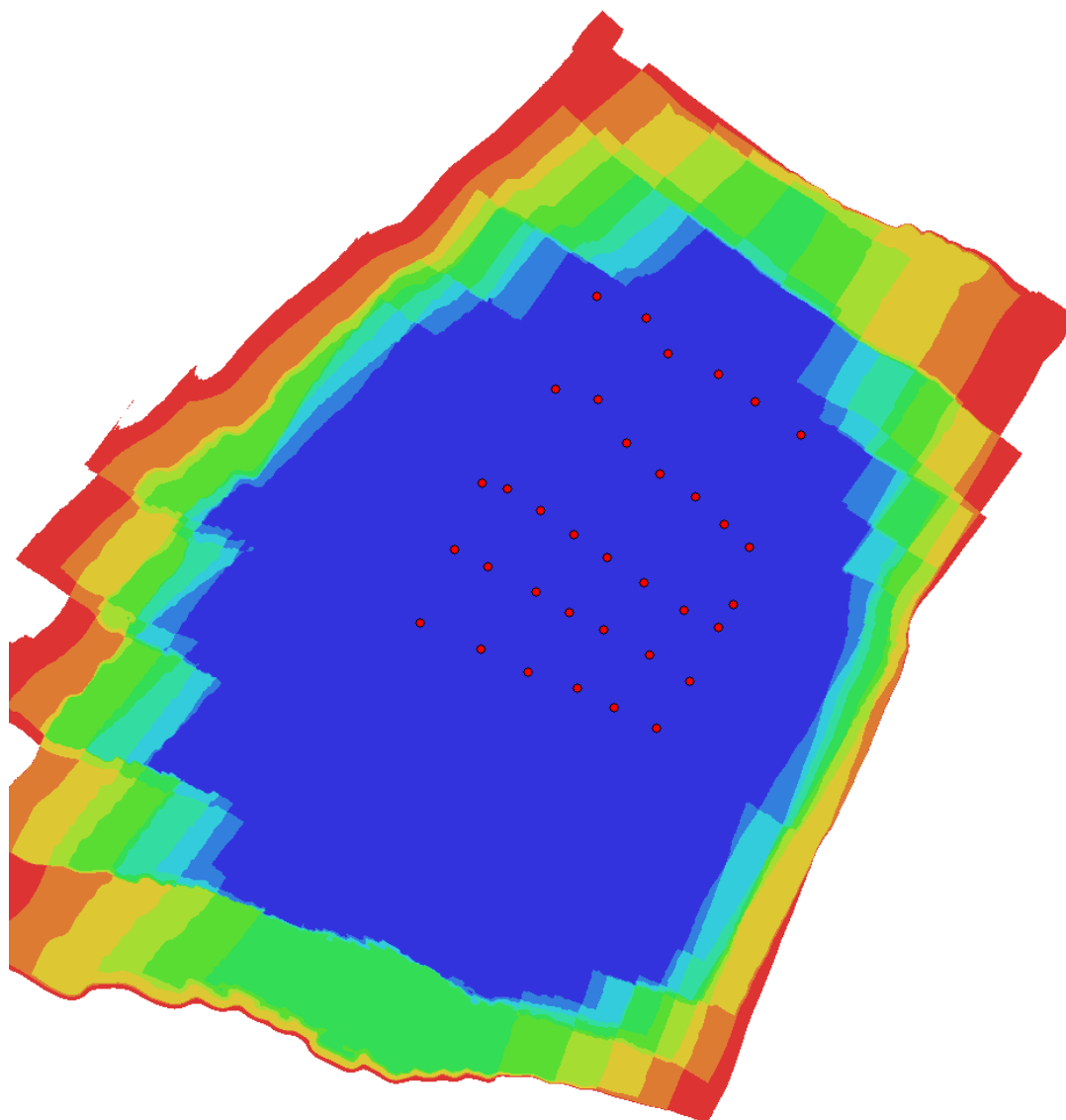
◆ Optimized POS ◆ Init POS

Camera Position View



◆ Visible Area ◆ 3D Points ◆ Camera Positions

Bundle View



◆ 1 ◆ 2 ◆ 3 ◆ 4 ◆ 5 ◆ 6 ◆ 7 ◆ 8 ◆ 9 ◆ ≥10

Overlap View

Flight Info

Flight Index(Group Id)	Photo List
Flight 0 (Group0)	FP-01-NADIR-0001-0034.jpg; FP-01-NADIR-0002-0035.jpg; FP-01-NADIR-0003-0036.jpg;
Flight 1 (Group0)	FP-01-NADIR-0004-0037.jpg; FP-01-NADIR-0005-0038.jpg;
Flight 2 (Group0)	FP-01-NADIR-0006-0039.jpg; FP-01-NADIR-0007-0040.jpg;
Flight 3 (Group0)	FP-01-NADIR-0008-0041.jpg; FP-01-NADIR-0009-0042.jpg;
Flight 4 (Group0)	FP-01-NADIR-0010-0043.jpg; FP-01-NADIR-0011-0044.jpg;
Flight 5 (Group0)	FP-01-NADIR-0012-0045.jpg; FP-01-NADIR-0013-0046.jpg;
Flight 6 (Group0)	FP-01-NADIR-0014-0047.jpg; FP-01-NADIR-0023-0056.jpg;
Flight 7 (Group0)	FP-01-NADIR-0024-0057.jpg; FP-01-NADIR-0025-0058.jpg; FP-01-NADIR-0026-0059.jpg; FP-01-NADIR-0027-0060.jpg; FP-01-NADIR-0028-0061.jpg; FP-01-NADIR-0029-0062.jpg; FP-01-NADIR-0030-0063.jpg;
Flight 8 (Group0)	FP-01-NADIR-0031-0064.jpg; FP-01-NADIR-0032-0065.jpg; FP-01-NADIR-0033-0066.jpg; FP-01-NADIR-0034-0067.jpg; FP-01-NADIR-0035-0068.jpg; FP-01-NADIR-0036-0069.jpg; FP-01-NADIR-0037-0070.jpg;
Flight 9 (Group0)	FP-01-NADIR-0038-0071.jpg; FP-01-NADIR-0039-0072.jpg; FP-01-NADIR-0040-0073.jpg; FP-01-NADIR-0041-0074.jpg; FP-01-NADIR-0042-0075.jpg; FP-01-NADIR-0043-0076.jpg;

Bad Flight Overlap Info

Index	Photo Info	Overlap
0	Index = 13,FP-01-NADIR-0014-0047.jpg - Index = 14,FP-01-NADIR-0023-0056.jpg	27.0661%

Average Overlap Infos

Type	Overlap
Avg Flight Overlap	84.5428%
Avg Side Overlap	85.5768%