

## Report of Test

**LLIA001878-003A**

### Roadway/Area Light Distribution Photometry Test Report

Catalog Number: L6 16S 5 X G2S 6 X XX 3 X X X

Pole/arm mounted, gray painted cast aluminum housing and driver compartment cover, one circuit board, one clear plastic lens with optic below each LED, clear glass enclosure.

16 white LEDs.

Osram OT100W/UNV/1250C/2DIM/P6 LED driver set at 1200mA, Littlefuse LSP10277SBX3472 suppressor.

Client states LED string current at 600mA



Prepared For:

LED Roadway Lighting

84 Chain Lake Drive

Suite 403

Halifax, Nova Scotia B3S 1A2, Canada

#### Performance Summary

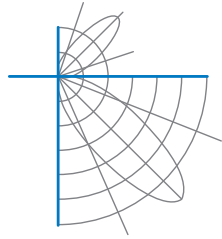
Input Voltage	120.0 Vac	Luminous Flux	8170.4 Lumens
Input Current	0.5549 A	Total Efficacy	124.1 Lm/W
Input Power	65.83 W		
Frequency	60.00 Hz	Roadway Throw	Short
Power Factor	0.988	Roadway Type	Type II
Current THD	2.8 %	IES BUG Rating	B2 - U0 - G2

This test report was issued by LightLab International Allentown, LLC without alterations or erasures.

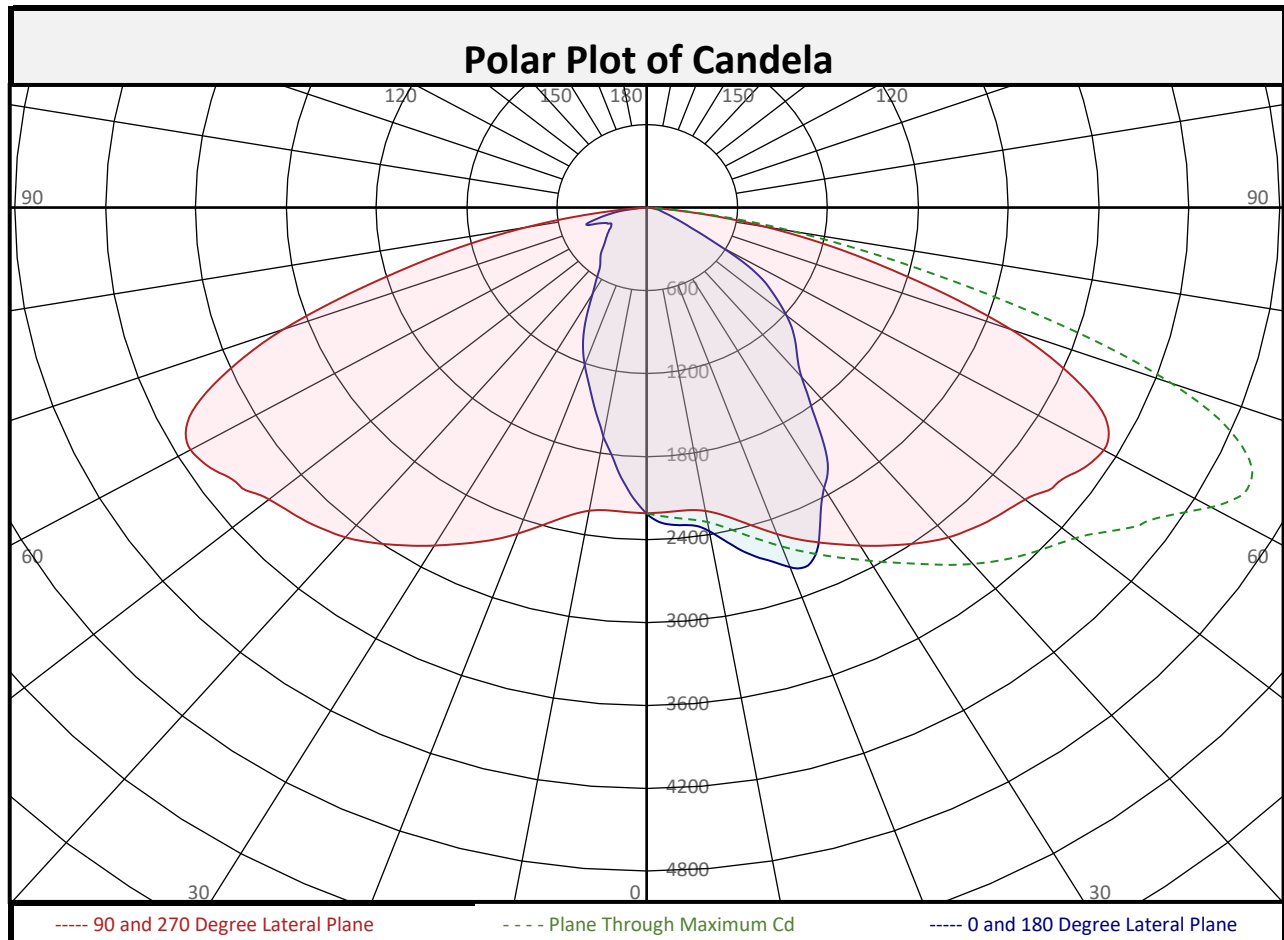
Test date: 09/01/2022

Report date: 09/01/2022

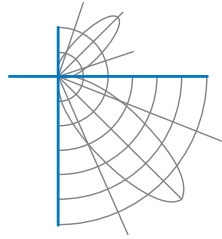
Signed: \_\_\_\_\_



## Report of Test LLIA001878-003A

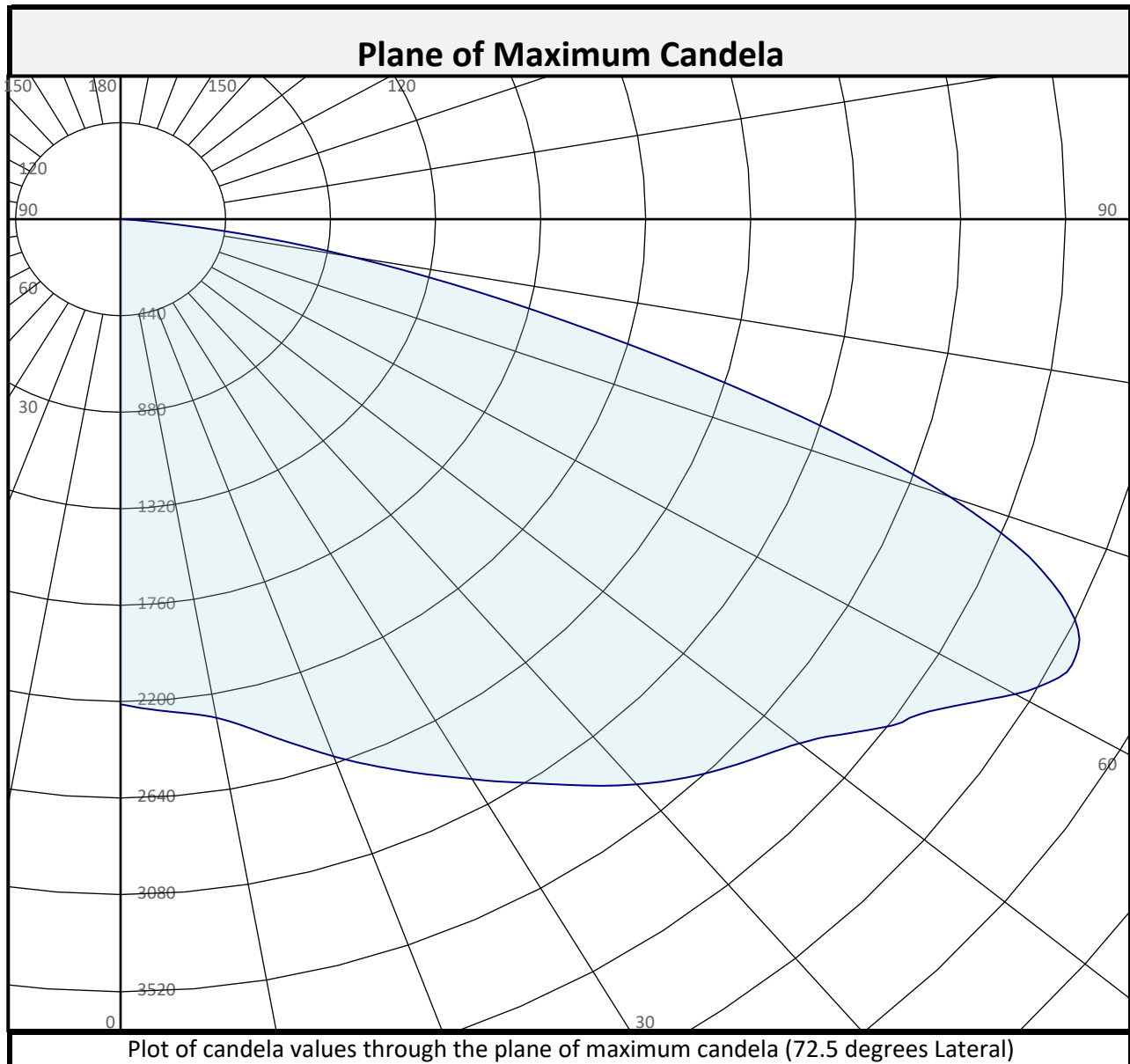


Zonal Flux Summary										
Zone (Deg Vert)	Flux (Lumens)	Percent of Total		Zone (Deg Vert)	Flux (Lumens)	Percent of Total		Zone (Deg Vert)	Flux (Lumens)	Percent of Total
0-10	204.8	2.5%		90-100	0.0	0.0%		0-20	805.2	9.9%
10-20	600.5	7.3%		100-110	0.0	0.0%		0-30	1812	22.2%
20-30	1007	12.3%		110-120	0.0	0.0%		0-40	3107	38.0%
30-40	1295	15.8%		120-130	0.0	0.0%		0-60	6137	75.1%
40-50	1463	17.9%		130-140	0.0	0.0%		0-80	8095	99.1%
50-60	1567	19.2%		140-150	0.0	0.0%		10-90	7966	97.5%
60-70	1353	16.6%		150-160	0.0	0.0%		20-50	3765	46.1%
70-80	604.8	7.4%		160-170	0.0	0.0%		40-90	5063	62.0%
80-90	75.3	0.9%		170-180	0.0	0.0%		60-90	2033	24.9%
0-90	8170	100.0%		90-180	0.0	0.0%		0-180	8170	100.0%

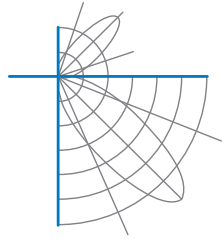


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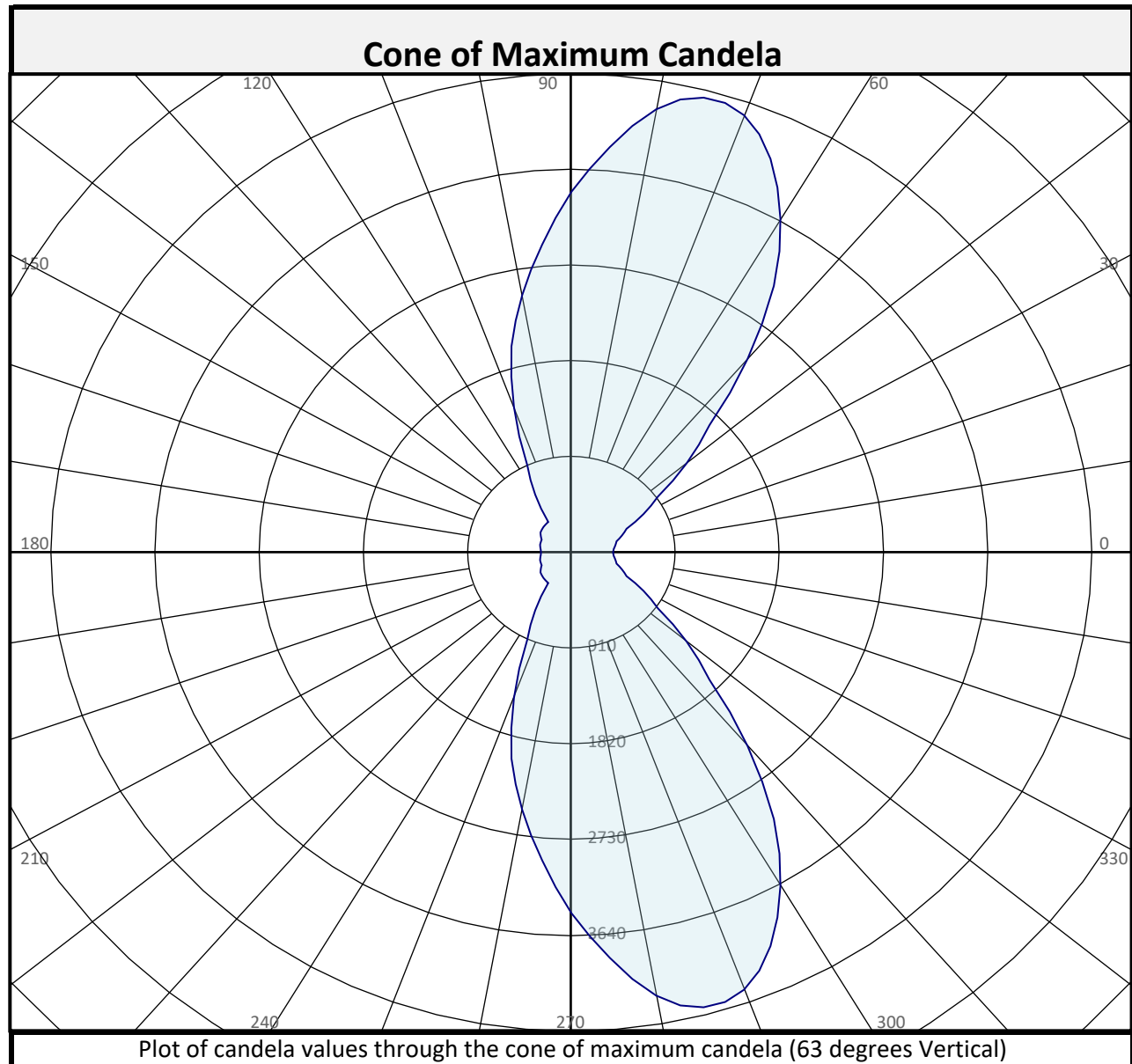


Street and House Side Flux Summary						
	Downward		Upward		Total	
	Lumens	% of Total	Lumens	% of Total	Lumens	% of Total
Street Side	5491.5	67.2%	0.0	0.0%	5491.5	67.2%
House Side	2678.9	32.8%	0.0	0.0%	2678.9	32.8%
Total	8170.4	100.0%	0.0	0.0%	8170.4	100.0%

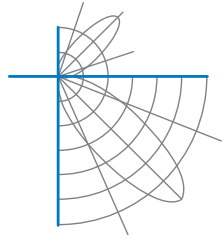


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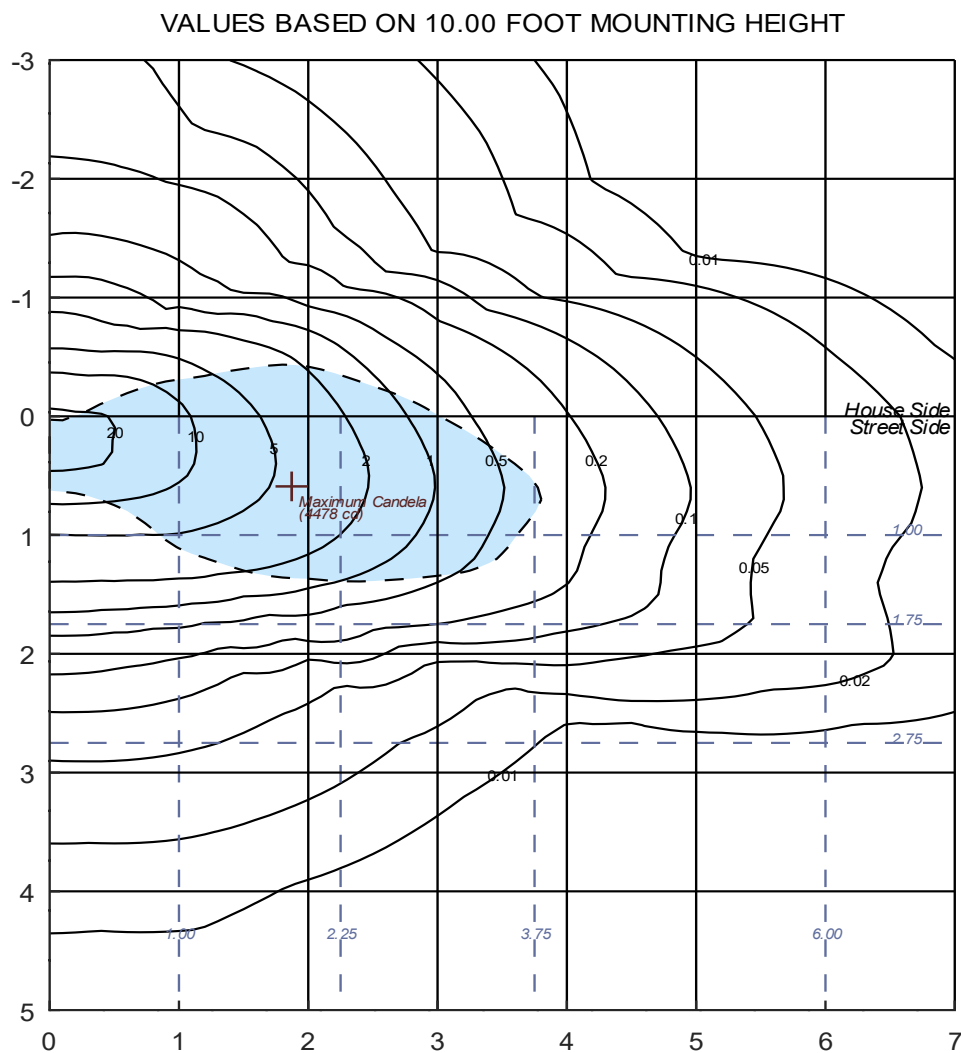
Street and House Side Flux Summary						
	Downward		Upward		Total	
	Lumens	% of Total	Lumens	% of Total	Lumens	% of Total
Street Side	5491.5	67.2%	0.0	0.0%	5491.5	67.2%
House Side	2678.9	32.8%	0.0	0.0%	2678.9	32.8%
Total	8170.4	100.0%	0.0	0.0%	8170.4	100.0%



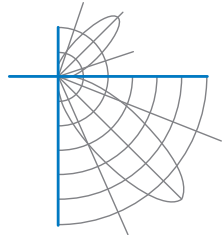
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### LLIA001878-003A

#### Iso-Illuminance Plot

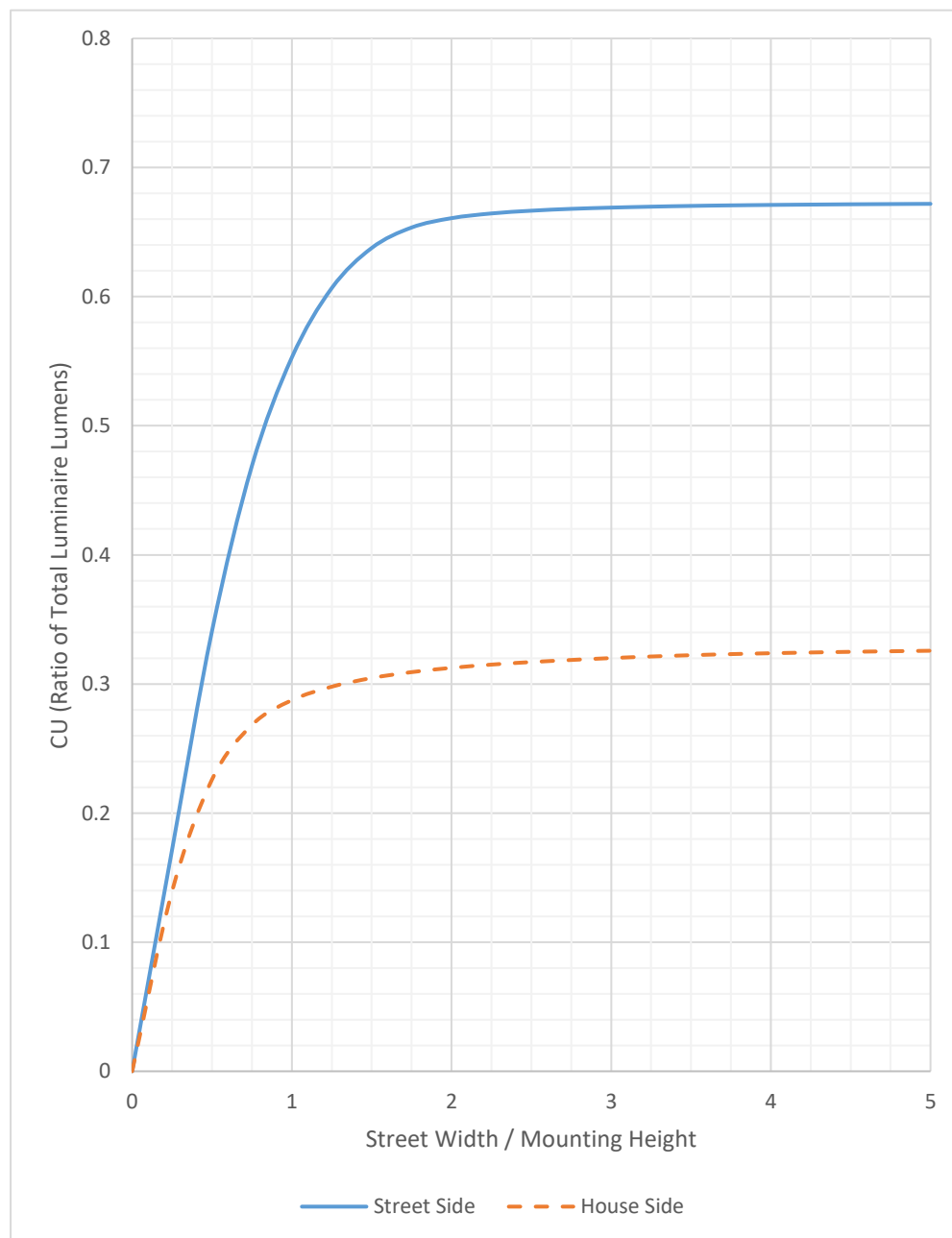


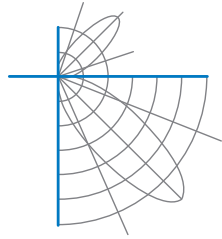
The isofootcandle values shown in the plot above are based on a mounting height of  $h = 10.0$  feet. Grid values show multiples of mounting height. The isoilluminance contour lines are expressed in units of footcandles. The values expressed are based on the direct light from a single unit without the contribution of room reflections.



## Report of Test LLIA001878-003A

### Coefficients of Utilization Plot

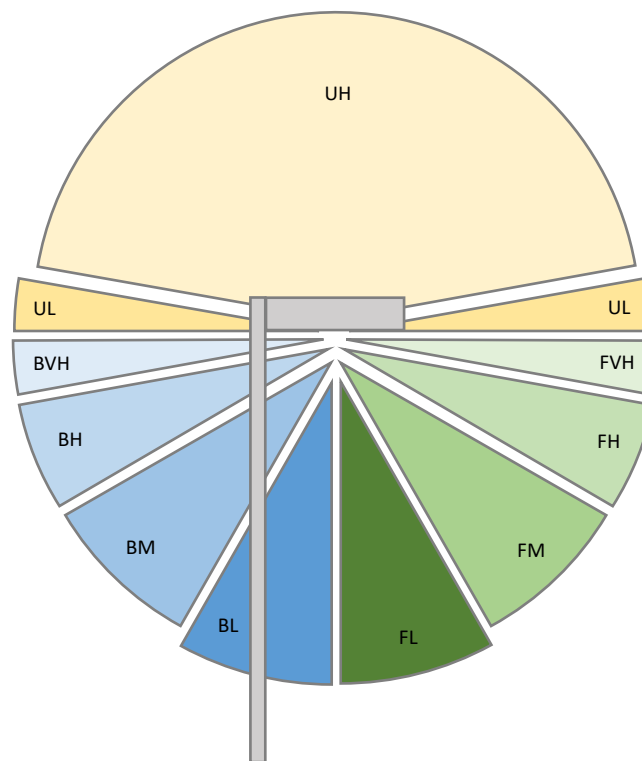




## Report of Test

### LLIA001878-003A

#### LCS Tables and Bug Classification



#### Back Light

BL - Back Low (0°-30°)	705.1 Lm
BM - Back Mid (30°-60°)	1357.6 Lm
BH - Back High (60°-80°)	585.3 Lm
BVH - Back Very High (80°-90°)	30.8 Lm

#### Forward Light

FL - Forward Low (0°-30°)	1107.0 Lm
FM - Forward Mid (30°-60°)	2967.5 Lm
FH - Forward High (60°-80°)	1372.6 Lm
FVH - Forward Very High (80°-90°)	44.5 Lm

#### Uplight

UL - Upward Low (90°-100°)	0.0 Lm
UH - Upward High (100°-180°)	0.0 Lm

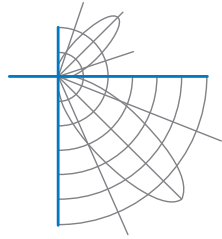
BUG Ratings: B2 - U0 - G2

[illegible]

*Australasia & S.E. Asia*

LightLab International	Ph : +61 7 3283 7862
50 Redcliffe Gardens Drive	Fx : +61 7 3283 8751
Clontarf - Queensland, 4019, Australia	<a href="http://www.lightlabint.com">www.lightlabint.com</a>



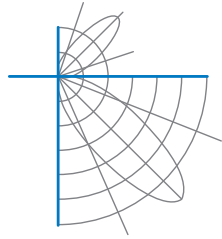


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**Luminous Intensity (Candela) Table**

		Lateral (C-Plane) Angles														
		0	5	15	25	35	45	55	57.5	60	62.5	65	67.5	70	72.5	75
Vertical (Gamma) Angles - Data was acquired in 0.5° increments, 2.5° increments shown.	0	2212	2212	2212	2212	2212	2212	2212	2212	2212	2212	2212	2212	2212	2212	2212
	2.5	2280	2283	2282	2279	2273	2266	2255	2254	2252	2249	2244	2240	2237	2233	2229
	5	2303	2307	2306	2304	2300	2294	2284	2283	2280	2276	2270	2264	2259	2253	2244
	7.5	2316	2319	2317	2313	2311	2308	2301	2301	2300	2295	2291	2286	2282	2275	2265
	10	2372	2369	2357	2339	2327	2321	2323	2325	2325	2324	2321	2318	2314	2308	2301
	12.5	2477	2470	2451	2420	2386	2359	2358	2362	2365	2369	2370	2370	2371	2365	2360
	15	2585	2574	2554	2520	2481	2443	2417	2419	2423	2430	2433	2438	2440	2440	2436
	17.5	2671	2656	2643	2617	2586	2553	2514	2505	2503	2505	2509	2513	2518	2520	2521
	20	2763	2747	2729	2705	2688	2670	2626	2614	2604	2596	2593	2595	2600	2606	2608
	22.5	2799	2801	2804	2803	2791	2783	2740	2727	2715	2703	2692	2685	2685	2690	2694
	25	2695	2715	2763	2843	2894	2896	2859	2841	2824	2809	2793	2781	2774	2773	2777
	27.5	2500	2521	2598	2760	2936	2999	2972	2956	2937	2916	2896	2878	2864	2858	2859
	30	2350	2360	2423	2589	2874	3077	3083	3069	3052	3028	3005	2983	2962	2948	2943
	32.5	2239	2253	2315	2444	2740	3087	3180	3175	3162	3140	3112	3088	3065	3044	3032
	35	2027	2061	2171	2342	2605	3027	3259	3262	3262	3249	3222	3195	3167	3145	3129
	37.5	1786	1814	1947	2191	2504	2921	3306	3342	3352	3356	3341	3314	3285	3256	3233
	40	1600	1624	1763	2003	2392	2818	3315	3387	3430	3445	3447	3426	3398	3364	3334
	42.5	1483	1498	1615	1860	2250	2744	3283	3396	3472	3512	3522	3520	3496	3462	3426
	45	1400	1414	1519	1742	2130	2675	3238	3378	3489	3556	3586	3595	3582	3550	3508
	47.5	1315	1330	1437	1661	2040	2614	3203	3350	3484	3582	3638	3659	3659	3630	3589
	50	1210	1224	1331	1582	1960	2562	3187	3336	3481	3607	3690	3730	3738	3718	3680
	52.5	1092	1103	1203	1474	1889	2549	3208	3359	3510	3649	3760	3826	3851	3851	3828
	55	978	977	1059	1318	1784	2522	3243	3413	3577	3730	3870	3963	4000	4001	3966
	57.5	827	829	894	1130	1597	2395	3246	3434	3613	3773	3923	4047	4114	4135	4122
	60	591	601	677	901	1350	2157	3232	3455	3674	3874	4049	4204	4298	4331	4323
	62.5	397	403	443	593	1009	1799	3133	3417	3673	3913	4127	4301	4420	4473	4467
	65	281	282	292	360	575	1297	2785	3172	3503	3794	4038	4224	4359	4431	4438
	67.5	207	211	224	242	294	734	2139	2617	3034	3403	3708	3924	4085	4180	4201
	70	160	162	177	193	198	351	1328	1849	2317	2740	3113	3377	3563	3702	3765
	72.5	123	126	139	154	163	187	596	982	1445	1876	2310	2681	2872	2993	3072
	75	100	100	111	118	128	134	211	339	694	1041	1429	1861	2129	2209	2271
	77.5	87	87	96	85	94	101	118	135	249	513	743	1095	1443	1541	1503
	80	61	62	73	66	60	70	78	84	104	208	364	543	839	983	901
	82.5	35	36	44	45	36	41	46	49	55	84	147	231	369	509	472
	85	15	16	18	19	18	20	23	24	27	34	46	69	100	140	135
	87.5	6	6	6	6	6	7	8	8	8	9	10	10	11	12	12
	90	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

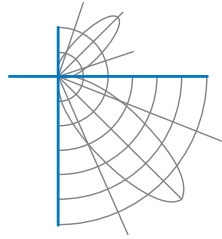


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**LLIA001878-003A**

**Luminous Intensity (Candela) Table**

		Lateral (C-Plane) Angles														
		77.5	80	82.5	85	90	95	105	115	125	135	145	155	165	175	180
Vertical (Gamma) Angles - Data was acquired in 0.5° increments, 2.5° increments shown.	0	2212	2212	2212	2212	2212	2212	2212	2212	2212	2212	2212	2212	2212	2212	2212
	2.5	2223	2220	2217	2213	2206	2201	2187	2169	2152	2138	2124	2115	2106	2101	2100
	5	2237	2231	2224	2216	2203	2192	2155	2117	2082	2045	2013	1991	1973	1963	1961
	7.5	2256	2246	2236	2225	2206	2185	2126	2063	1999	1945	1889	1847	1821	1807	1805
	10	2291	2280	2266	2251	2226	2193	2109	2010	1917	1830	1766	1727	1700	1684	1682
	12.5	2352	2340	2323	2305	2272	2228	2110	1973	1835	1738	1662	1600	1565	1547	1544
	15	2429	2418	2400	2381	2340	2286	2130	1942	1780	1646	1550	1488	1447	1425	1422
	17.5	2517	2508	2492	2470	2422	2357	2167	1932	1737	1567	1452	1381	1337	1315	1312
	20	2609	2603	2587	2564	2509	2431	2204	1937	1693	1499	1362	1286	1244	1221	1218
	22.5	2696	2690	2677	2652	2592	2503	2236	1947	1667	1440	1281	1199	1155	1124	1119
	25	2777	2773	2759	2736	2668	2570	2272	1942	1642	1388	1204	1108	1048	1010	1005
	27.5	2861	2854	2842	2818	2743	2635	2306	1946	1617	1337	1117	995	923	877	870
	30	2946	2942	2927	2899	2821	2702	2338	1949	1592	1281	1010	868	784	741	735
	32.5	3030	3024	3010	2979	2898	2769	2370	1947	1563	1207	892	739	674	644	640
	35	3120	3109	3091	3058	2973	2831	2391	1940	1528	1115	766	641	588	565	561
	37.5	3215	3199	3176	3140	3046	2892	2407	1929	1478	1008	659	559	525	516	514
	40	3308	3282	3253	3213	3112	2941	2416	1910	1408	877	564	502	491	487	485
	42.5	3389	3356	3323	3278	3160	2967	2408	1884	1321	738	495	471	461	459	458
	45	3464	3424	3385	3336	3205	2990	2386	1837	1208	605	459	444	432	422	420
	47.5	3540	3487	3438	3383	3239	2996	2347	1760	1055	505	436	424	404	388	386
	50	3625	3563	3499	3434	3280	3005	2310	1664	890	448	419	399	389	365	360
	52.5	3777	3709	3631	3547	3357	3040	2288	1559	753	419	403	384	372	344	338
	55	3904	3818	3718	3615	3395	3049	2283	1431	621	396	388	363	352	326	317
	57.5	4077	3994	3879	3751	3467	3063	2227	1258	514	379	365	339	323	311	299
	60	4269	4167	4024	3854	3501	3052	2177	1117	438	366	349	314	306	287	277
	62.5	4401	4272	4090	3877	3451	2967	2065	956	366	349	335	291	289	271	268
	65	4371	4219	4002	3752	3267	2759	1821	722	312	323	313	274	275	271	271
	67.5	4155	4005	3767	3492	2956	2434	1455	479	273	290	289	252	294	288	294
	70	3757	3626	3389	3112	2565	2071	1037	309	237	257	260	228	313	329	333
	72.5	3118	3042	2837	2582	2074	1651	654	212	204	217	221	203	339	414	420
	75	2362	2381	2238	2024	1603	1229	375	156	169	177	178	221	349	392	389
	77.5	1562	1660	1640	1491	1190	873	208	111	129	135	148	207	276	316	311
	80	862	926	1005	974	797	552	105	76	86	90	112	153	201	238	235
	82.5	380	368	432	467	418	246	57	49	49	54	65	91	123	151	148
	85	105	92	104	122	122	70	29	25	23	22	22	28	35	47	46
	87.5	12	12	12	12	12	11	10	8	5	2	1	0	0	0	0
	90	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

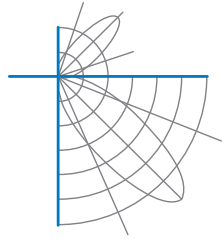


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Luminous Intensity (Candela) Table

		Lateral (C-Plane) Angles														
		0	5	15	25	35	45	55	57.5	60	62.5	65	67.5	70	72.5	75
Vertical (Gamma) Angles - Data was acquired in 0.5° increments, 2.5° increments shown.	90	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	92.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	95	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	97.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	100	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	102.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	105	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	107.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	110	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	112.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	115	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	117.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	120	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	122.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	125	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	127.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	130	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	132.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	135	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	137.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	140	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	142.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	145	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	147.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	150	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	152.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	155	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	157.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	160	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	162.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	165	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	167.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	170	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	172.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	175	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	177.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	180	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

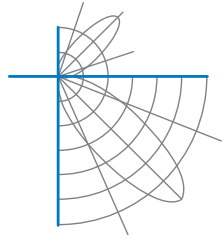


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Luminous Intensity (Candela) Table

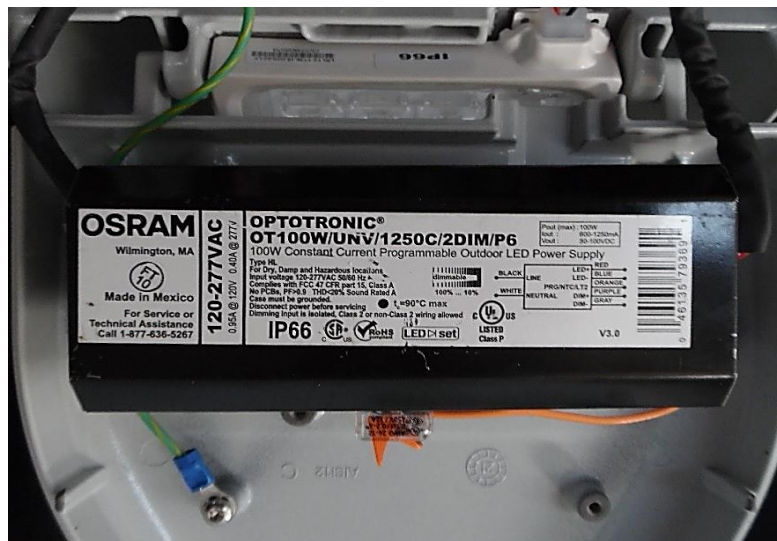
		Lateral (C-Plane) Angles														
		77.5	80	82.5	85	90	95	105	115	125	135	145	155	165	175	180
Vertical (Gamma) Angles - Data was acquired in 0.5° increments, 2.5° increments shown.	90	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	92.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	95	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	97.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	100	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	102.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	105	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	107.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	110	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	112.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	115	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	117.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	120	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	122.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	125	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	127.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	130	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	132.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	135	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	137.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	140	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	142.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	145	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	147.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	150	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	152.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	155	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	157.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	160	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	162.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	165	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	167.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	170	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	172.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	175	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	177.5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	180	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

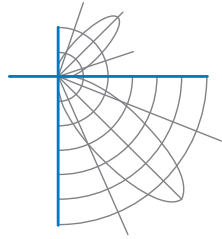


## Report of Test

### LLIA001878-003A

### Additional Pictures of Test Subject





## Report of Test

### LLIA001878-003A

Test Distance                      9.5 m  
Ambient Temperature            25.5 °C

#### Notes

The laboratory has not participated in the selection of samples to be tested. All testing is performed on the understanding that the significance of the report is limited to the extent that the test sample is representative of production units.

Tested in accordance with the applicable sections of publications: IES LM-79-19. Format of reports and angular increments based on IES LM-31-20 and LM-10-20.

The luminous intensity values, and other derived quantities, contained in this report are based on absolute data.

Prorating the performance of the sample for the use of other component combinations (such as lamp / LED / Ballast / driver), or for use in different environmental conditions than that tested, may produce erroneous results.

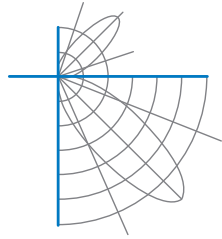
This report is free of erasures and corrections.

Photometric intensity values are reported using the IES C-Type spherical coordinate system as defined in IES LM-75-19.

This report may contain data that are not covered by the NVLAP accreditation. Quantities marked with ‡ are not covered.

This report must not be used by the customer to claim product certification, approval or endorsement by NVLAP, NIST, or any agency of the Federal Government.

The device under test emits no detectable uplight, as defined by ANSI/IES LM-31-20. For the purpose of this report, certain non-zero uplight readings, attributable to instrument artifacts, have been assigned a zero value.



## Report of Test

**LLIA001878-003B**

Integrating Sphere Report

Catalog Number: L6 16S 5 X G2S 6 X XX 3 X X X

Pole/arm mounted, gray painted cast aluminum housing and driver compartment cover, one circuit board, one clear plastic lens with optic below each LED, clear glass enclosure.

16 white LEDs.

Osram OT100W/UNV/1250C/2DIM/P6 LED driver set at 1200mA, Littlefuse LSP10277SBX3472 suppressor.

Client states LED string current at 600mA



### Performance Summary

Voltage	120.0 Vac
Current	0.5524 A
Power	65.70 W
Frequency	59.99 Hz
Power Factor	0.991
Current THD	2.7 %
Total Luminous Flux	8208.9 lm
Efficacy	124.9 lm/W
Chromaticity (x,y)	(0.4362, 0.4049)
(u',v')	(0.2497, 0.5216)
Duv	0.0004
CCT	3019 K
CRI (Ra)	71
R9	-44
TM-30: Rf	71
TM-30: Rg	94
TM-30: Rcs,h1	-18

Prepared For:

LED Roadway Lighting

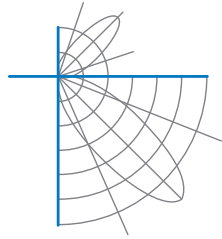
84 Chain Lake Drive

Suite 403

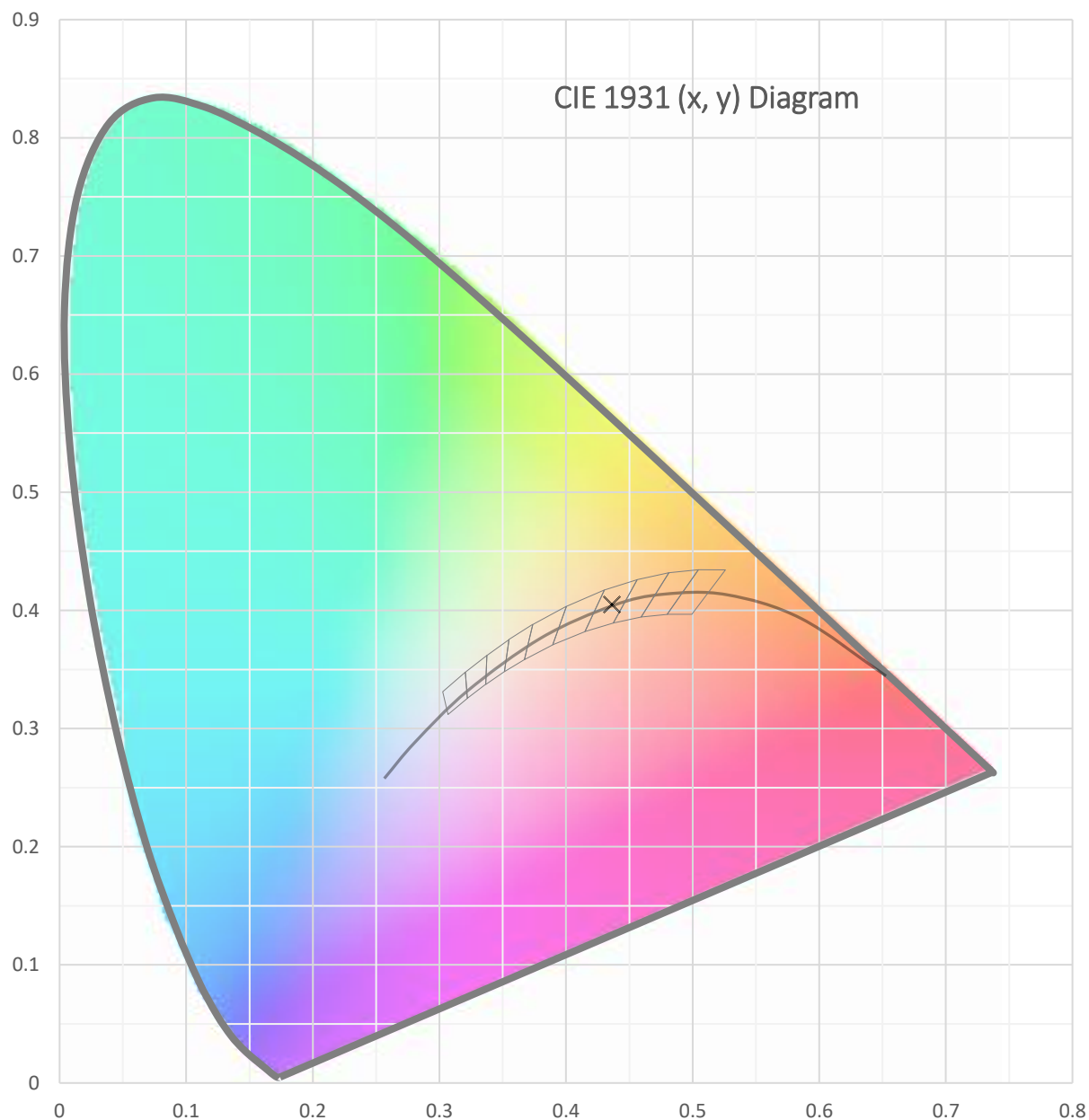
Halifax, Nova Scotia B3S 1A2, Canada

Test date: 09/01/2022

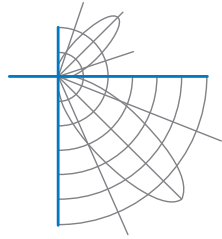
Report date: 09/01/2022



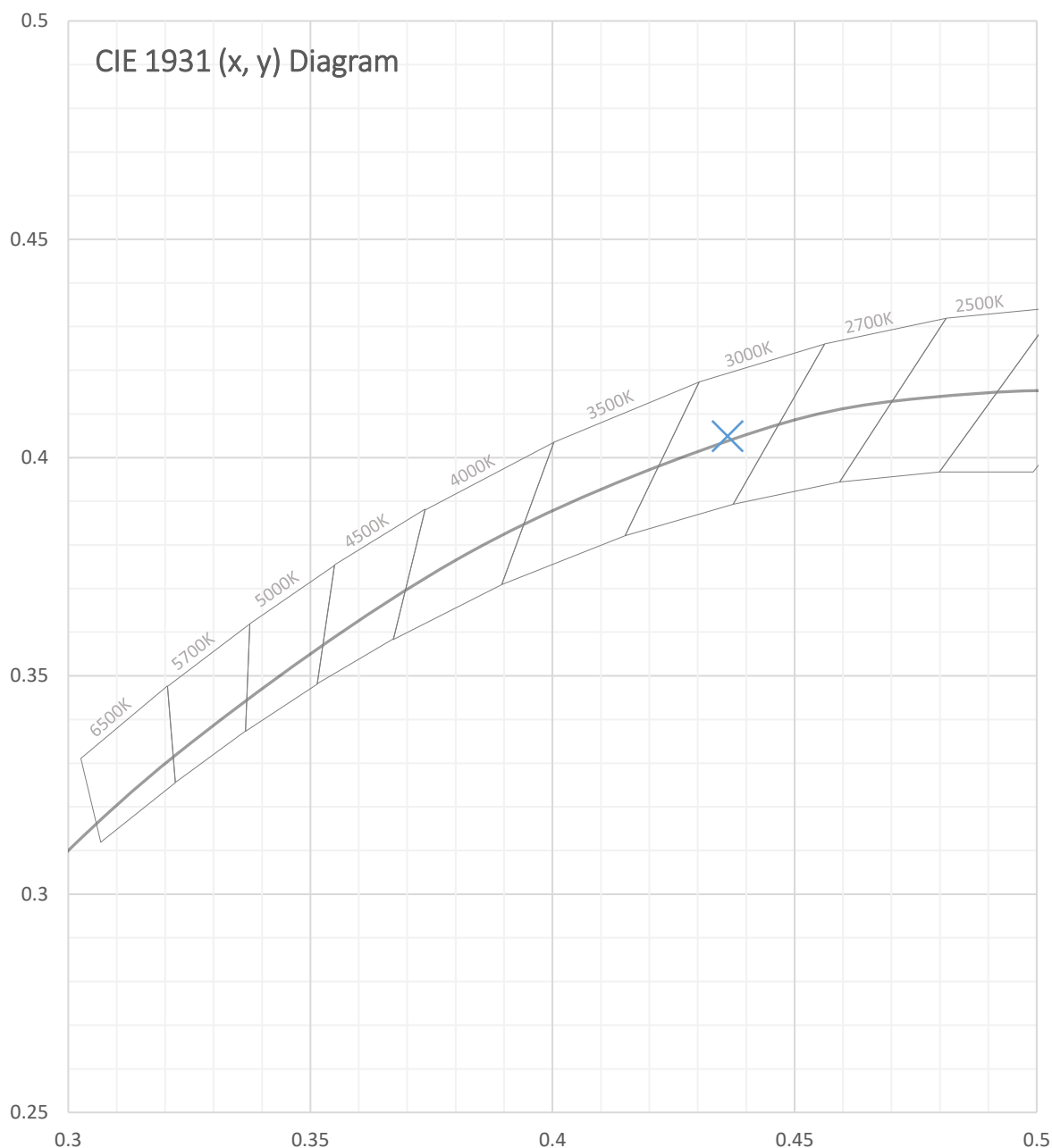
Test Report Number: LLIA001878-003B

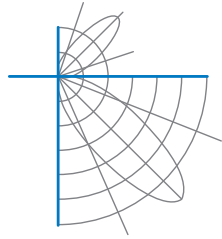






Test Report Number: LLIA001878-003B



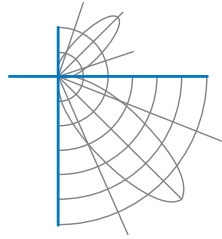


**Test Report Number: LLIA001878-003B**

Total Radiant Flux	23.16 W
Total Luminous Flux	8208.9 Lm
Chromaticity CIE 1931 (x, y)	(0.4362, 0.4049)
Chromaticity CIE 1976 (u', v')	(0.2497, 0.5216)
Correlated Color Temperature (CCT)	3019 K
Color Rendering Index (Ra)	71
R1	66
R2	81
R3	95
R4	67
R5	66
R6	75
R7	76
R8	39
R9	-44
R10	59
R11	62
R12	54
R13	69
R14	97
TM-30: Rf	71
TM-30: Rg	94
TM-30: Rcs,h1	-18
Distance from Planckian Locus (Duv)	0.0004
Scotopic/Photopic Ratio $\frac{V(\lambda)_{sc}}{V(\lambda)_{ph}}$	1.216

**Electrical Data**

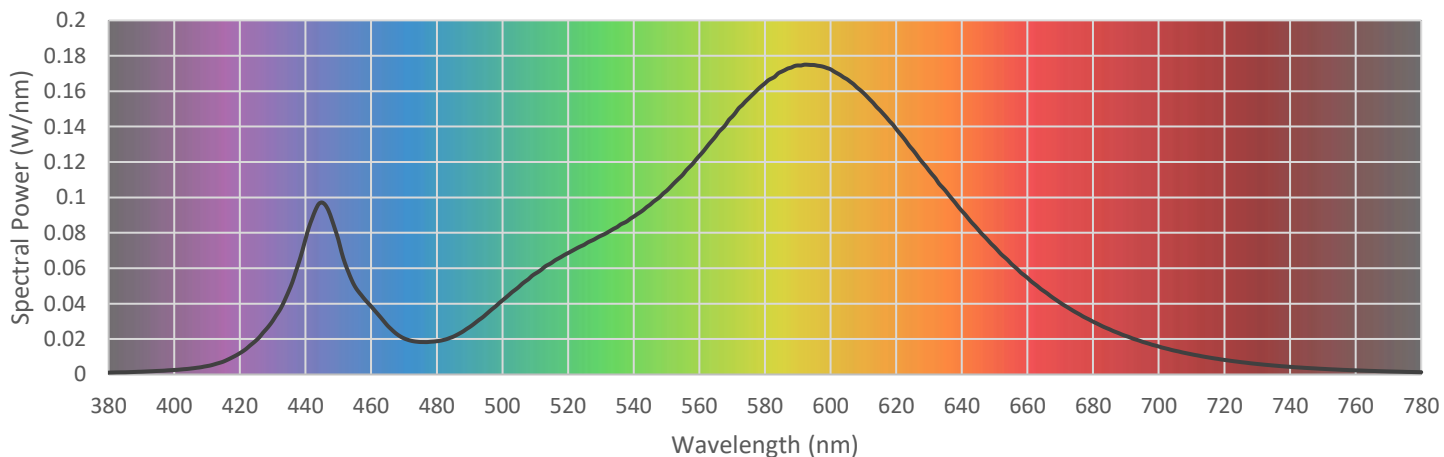
Voltage	120.0 Vac
Current	0.5524 A
Power	65.70 W
Frequency	59.99 Hz
Power Factor	0.991
Current THD	2.7 %

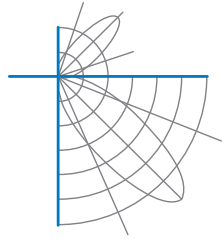


Test Report Number: LLIA001878-003B

Summary Spectral Power Distribution (wavelength - nm, spectral power - W/nm)

380	0.001064	480	0.018788	580	0.164438	680	0.029795
385	0.001232	485	0.021338	585	0.170970	685	0.025522
390	0.001555	490	0.026780	590	0.174537	690	0.021751
395	0.001996	495	0.033924	595	0.174778	695	0.018473
400	0.002536	500	0.041839	600	0.172380	700	0.015814
405	0.003334	505	0.049464	605	0.166766	705	0.013382
410	0.004734	510	0.056928	610	0.159028	710	0.011391
415	0.007302	515	0.063059	615	0.149340	715	0.009674
420	0.012057	520	0.068593	620	0.138625	720	0.008223
425	0.019329	525	0.073341	625	0.127007	725	0.006989
430	0.030298	530	0.078338	630	0.115163	730	0.005933
435	0.047601	535	0.083304	635	0.103848	735	0.005050
440	0.076566	540	0.089141	640	0.092388	740	0.004316
445	0.097117	545	0.095890	645	0.081787	745	0.003679
450	0.076157	550	0.103684	650	0.071966	750	0.003156
455	0.049868	555	0.112868	655	0.062605	755	0.002713
460	0.038421	560	0.123493	660	0.054571	760	0.002337
465	0.027550	565	0.134577	665	0.047096	765	0.001997
470	0.020382	570	0.145597	670	0.040490	770	0.001718
475	0.018332	575	0.155848	675	0.034828	775	0.001476
						780	0.001284





Test Report Number: LLIA001878-003B

### IES TM-30 Details

Source: LLIA001878-003B

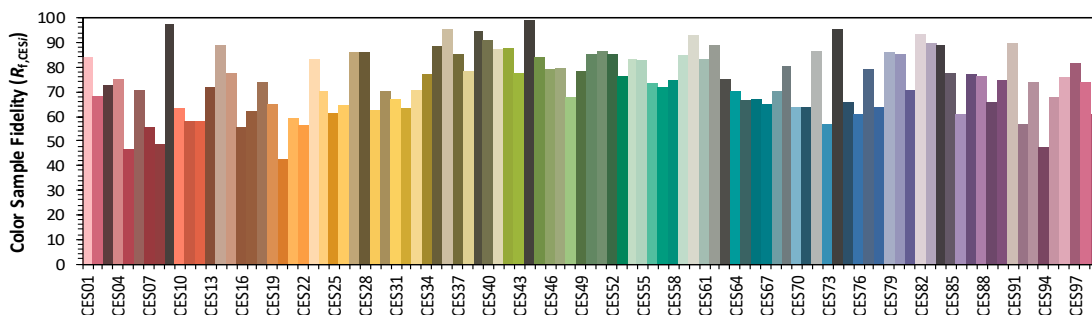
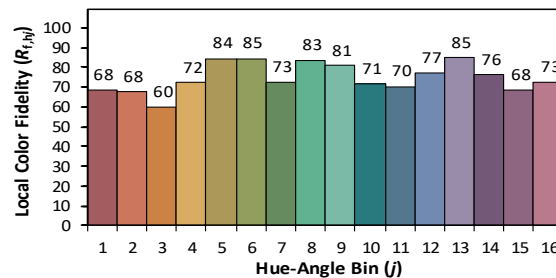
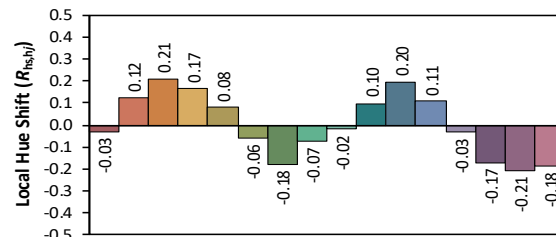
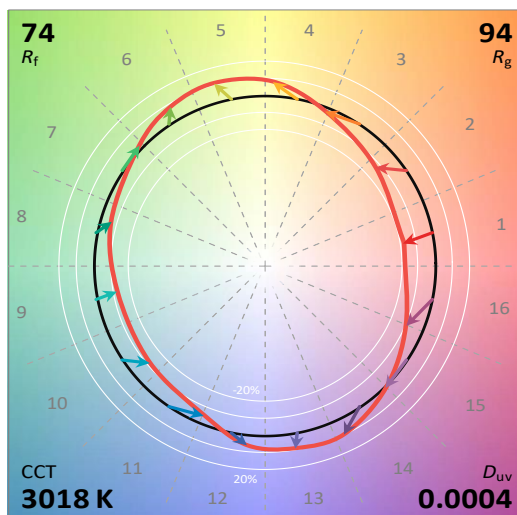
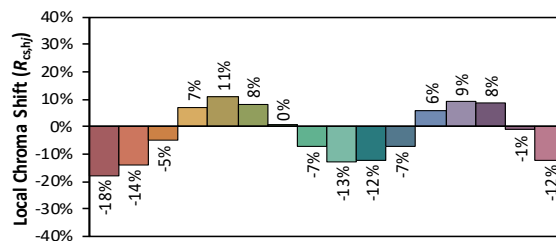
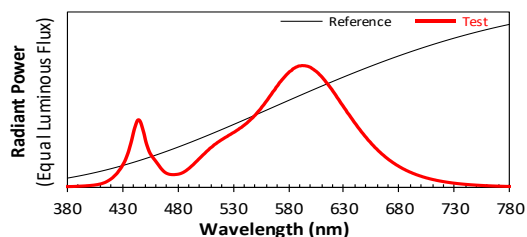
Manufacturer:

LED Roadway Lighting

Date: 9/1/2022

Model:

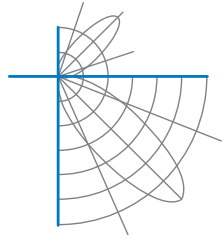
L6 16S 5 X G2S 6 X XX 3 X X X



Notes:

x 0.4362  
y 0.4048  
u' 0.2498  
v' 0.5216

CIE 13.3-1995  
(CRI)  
R<sub>a</sub> 71  
R<sub>9</sub> -44



## Test Report Number: LLIA001878-003B

**Test Equipment Configuration:** LightLab International Allentown 2m Integrating Sphere  
Measurements acquired using a Labsphere CDS 2600 spectroradiometer  
Testing was performed using  $4\pi$  geometry

**Test Temperature:** 25.4 °C

**Test Procedure:** Tested in accordance with the applicable sections of:  
LM-79-19, LM-78-20, LM-58-20, ANSI\_ANSLG C78.377-2017, TM-30-20

**Significance:** The laboratory has not participated in the selection of samples to be tested.  
All testing is performed on the understanding that the significance of the report is limited to the extent that the test sample is representative of production units.

**Notes:** The measurements and other derived quantities contained in this report are based on the absolute data as measured.

Prorating the performance of the sample for the use of other component combinations (such as lamp / LED / Ballast / driver), or for use in different environmental conditions than that tested, may produce erroneous results.

This report is free of erasures and corrections

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Sphere Report Template V2-18

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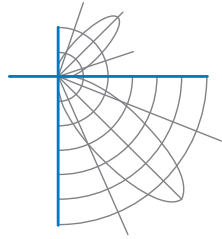
**North America (issuing laboratory)**

LightLab International Allentown, LLC  
905 Harrison Street, Suite 135  
Allentown, PA 18103 USA  
Ph: +1 484-273-0705  
Fx: +1 484-209-5779  
www.lightlaballentown.com

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**Australasia & S.E. Asia**

LightLab International  
50 Redcliffe Gardens Drive  
Clontarf - Queensland, 4019, Australia  
Ph : +61 7 3283 7862  
Fx : +61 7 3283 8751  
www.lightlabint.com



## Report of Test

**LLIA001878-003C**

### Electrical Test Report

Catalog Number: L6 16S 5 X G2S 6 X XX 3 X X X

Pole/arm mounted, gray painted cast aluminum housing and driver compartment cover, one circuit board, one clear plastic lens with optic below each LED, clear glass enclosure.

16 white LEDs.

Osram OT100W/UNV/1250C/2DIM/P6 LED driver set at 1200mA, Littlefuse LSP10277SBX3472 suppressor.

Client states LED string current at 600mA



### Performance Summary

Voltage	277.0 Vac
Current	0.2508 A
Power	65.23 W
Frequency	60.00 Hz
Power Factor	0.939
Current THD	5.1 %

Ambient Temperature: 25.1 °C

Prepared For:

LED Roadway Lighting

84 Chain Lake Drive

Suite 403

Halifax, Nova Scotia B3S 1A2, Canada

Tested in accordance with the applicable sections of IES LM-79-19. The laboratory has not participated in the selection of samples to be tested. All testing is performed on the understanding that the significance of the report is limited to the extent that the test sample is representative of production units. Prorating the performance of the sample for the use of other component combinations (such as lamp / LED / Ballast / driver), or for use in different environmental conditions than that tested, may produce erroneous results. This report is free of erasures and corrections. This report must not be used by the client to claim product certification, approval, or endorsement by NVLAP, NIST, or any agency of the U.S. Government.

Test date: 09/01/2022

Report date: 09/01/2022

Electrical Report Template V1-4

#### *North America (issuing laboratory)*

LightLab International Allentown, LLC  
905 Harrison Street, Suite 135  
Allentown, PA 18103 USA  
Ph: +1 484-273-0705  
Fx: +1 484-209-5779  
www.lightlaballentown.com

#### *Australasia & S.E. Asia*

LightLab International  
50 Redcliffe Gardens Drive  
Clontarf - Queensland, 4019, Australia  
Ph : +61 7 3283 7862  
Fx : +61 7 3283 8751  
www.lightlabint.com