



UL Verification Services Inc.
7036 Snowdrift Road
Allentown, PA 18106
610-774-1300

Photometric Indoor Test Report

Relevant Standards
IES LM-79-2008
ANSI C82.77-2002

Prepared For
Simkar Corporation
Andre Duljas
700 Ramona Ave
Philadelphia, PA 19120
United States

Catalog Number
CENLED 22 SSQ 4335
Project Number
10522345
Test Number
790233

Test Date

2014-10-20

Prepared By

Handwritten signature of Derek Smarr in black ink.

Derek Smarr, Technician

Approved By

Handwritten signature of Eric M. Gaudreau in black ink.

Eric Gaudreau, Engineering Project Handler

The results contained in this report pertain only to the tested sample.
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Luminaire Description: White housing, white reflectors, frosted plastic enclosed lens
Catalog Number: CENLED 22 SSQ 4335
Lamp: 128 white LEDs
Mounting: Recessed
Ballast/Driver: Eaglerise EWP054C1500 LED4P

Luminaire

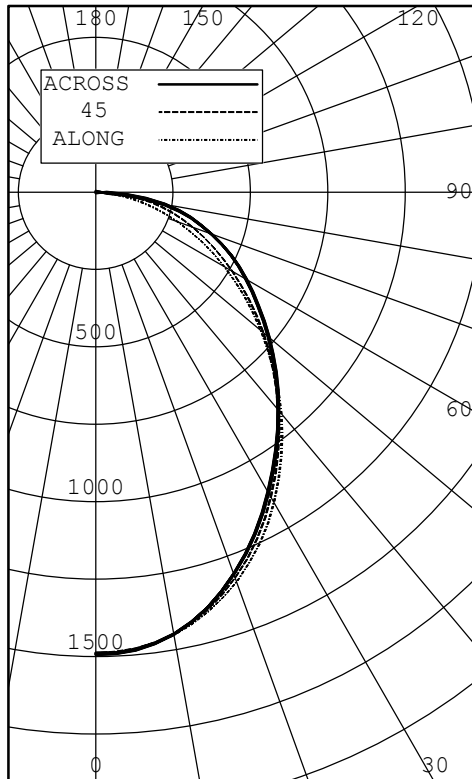


Test Conditions

Test Temperature:	24.8 °C
Voltage:	120.0 VAC
Current:	0.3603 A
Power:	43.11 W
Power Factor:	0.997
Frequency:	60 Hz
Current THD:	2.82 %



INTENSITY (CANDLEPOWER) SUMMARY OUTPUT LUMENS



ANGLE	ALONG 22.5	45	67.5	ACROSS	OUTPUT LUMENS	
0	1491	1491	1491	1491	1491	
5	1483	1483	1481	1480	1485	143
10	1453	1454	1451	1448	1451	
15	1403	1405	1397	1390	1390	392
20	1336	1336	1323	1310	1310	
25	1252	1251	1234	1219	1217	567
30	1154	1152	1133	1118	1116	
35	1043	1043	1026	1016	1016	642
40	932	929	917	916	918	
45	813	814	810	816	822	628
50	696	701	706	719	729	
55	586	593	604	626	641	545
60	479	490	508	542	560	
65	378	394	419	461	482	422
70	284	303	336	381	401	
75	196	217	257	299	318	272
80	117	140	178	216	228	
85	50	65	84	96	100	89
90	0	0	0	0	0	

ZONAL LUMENS AND PERCENTAGES

ZONE	LUMENS	% LUMINAIRE
0-30	1102	29.77
0-40	1744	47.13
0-60	2917	78.83
0-90	3700	100.00
40-90	1956	52.87
60-90	783	21.17
90-180	0	0.00
0-180	3700	100.00

EFFICACY (LUMENS PER WATT): 85.8

*** THIS IS AN ABSOLUTE TEST ***

LUMINOUS LENGTH: 21.750 INS
 WIDTH: 21.750 INS

LUMINANCE SUMMARY CD./SQ.M.

S/MH: 1.1
 SC (ALONG): 1.2, SC (ACROSS): 1.1

ANGLE	ALONG	45	ACROSS
45	3766	3768	3823
55	3349	3465	3675
65	2932	3257	3747
75	2477	3261	4046
85	1896	3175	3785

TESTED IN ACCORDANCE WITH IES PROCEDURES.



INTENSITY (CANDLEPOWER) DATA
 IN 2.5 DEGREE STEPS

ANGLE	PLANE						OUTPUT LUMENS
	ALONG	22.5	45	67.5	ACROSS	AVERAGE	
0.0	1491	1491	1491	1491	1491	1491	
2.5	1491	1491	1487	1486	1491	1489	
5.0	1483	1483	1481	1480	1485	1482	143
7.5	1470	1471	1469	1467	1471	1470	
10.0	1453	1454	1451	1448	1451	1451	
12.5	1430	1432	1427	1422	1423	1427	
15.0	1403	1405	1397	1390	1390	1397	392
17.5	1372	1373	1361	1352	1352	1362	
20.0	1336	1336	1323	1310	1310	1323	
22.5	1296	1298	1280	1267	1265	1281	
25.0	1252	1251	1234	1219	1217	1235	567
27.5	1205	1202	1185	1170	1166	1186	
30.0	1154	1152	1133	1118	1116	1135	
32.5	1099	1099	1080	1067	1066	1082	
35.0	1043	1043	1026	1016	1016	1029	642
37.5	988	987	972	966	967	976	
40.0	932	929	917	916	918	922	
42.5	873	872	863	866	870	868	
45.0	813	814	810	816	822	815	628
47.5	754	757	758	767	775	762	
50.0	696	701	706	719	729	710	
52.5	641	646	654	672	684	659	
55.0	586	593	604	626	641	609	545
57.5	532	540	556	583	600	561	
60.0	479	490	508	542	560	515	
62.5	428	441	463	501	521	470	
65.0	378	394	419	461	482	426	422
67.5	330	348	377	421	442	383	
70.0	284	303	336	381	401	341	
72.5	239	259	297	341	360	299	
75.0	196	217	257	299	318	258	272
77.5	155	178	218	258	277	217	
80.0	117	140	178	216	228	177	
82.5	83	103	136	159	165	131	
85.0	50	65	84	96	100	80	89
87.5	21	26	31	34	37	30	
90.0	0	0	0	0	0	0	



COEFFICIENTS OF UTILIZATION

ZONAL CAVITY METHOD

EFFECTIVE FLOOR CAVITY REFLECTANCE = .20

CC WALL	90				80				70				50				30				10				0	
	70	50	30	10	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	50	30	10	0	
RCR	0	1.221	.221	.221	.22	1.191	.191	.191	.19	1.161	.161	.161	.16	1.111	.111	.111	.11	1.061	.061	.061	.06	1.021	.021	.021	.02	1.00
	1	1.121	.071	.030	.99	1.091	.051	.010	.97	1.071	.030	.990	.96	0.980	.950	.93	0.940	.920	.90	0.910	.890	.87	0.85			
	2	1.030	.950	.880	.82	1.000	.930	.870	.81	0.980	.910	.850	.80	0.870	.830	.78	0.840	.800	.77	0.810	.780	.75	0.73			
	3	0.940	.840	.760	.69	0.920	.820	.750	.69	0.900	.810	.740	.68	0.780	.720	.67	0.750	.700	.66	0.730	.690	.65	0.63			
	4	0.870	.750	.670	.60	0.850	.740	.660	.60	0.830	.730	.660	.59	0.700	.640	.59	0.680	.620	.58	0.660	.610	.57	0.55			
	5	0.810	.680	.590	.52	0.790	.670	.580	.52	0.770	.660	.570	.52	0.630	.560	.51	0.610	.550	.51	0.600	.540	.50	0.48			
	6	0.750	.610	.520	.46	0.730	.600	.520	.46	0.710	.590	.510	.45	0.570	.500	.45	0.560	.490	.44	0.540	.480	.44	0.42			
	7	0.690	.550	.460	.41	0.670	.540	.460	.40	0.660	.530	.450	.40	0.520	.440	.39	0.500	.440	.39	0.490	.430	.39	0.37			
	8	0.640	.500	.420	.36	0.620	.490	.410	.35	0.610	.480	.410	.35	0.470	.400	.35	0.460	.400	.35	0.450	.390	.35	0.33			
	9	0.590	.460	.370	.31	0.580	.450	.370	.31	0.570	.440	.370	.31	0.430	.360	.31	0.420	.360	.31	0.410	.350	.31	0.29			
	10	0.550	.420	.330	.28	0.540	.410	.330	.28	0.530	.410	.330	.28	0.400	.330	.28	0.390	.320	.28	0.380	.320	.27	0.26			

THE ABOVE COEFFICIENTS HAVE BEEN CALCULATED BASED ON LUMINAIRE LUMENS
 BECAUSE IN AN ABSOLUTE TEST THE BARE LAMP LUMENS ARE UNKNOWN.
 LIGHTING DESIGN CALCULATIONS MADE USING THESE COEFFICIENTS SHOULD
 THEREFORE USE THE LUMINAIRE LUMENS IN THE CALCULATION FORMULA

LABORATORY RESULTS MAY NOT BE REPRESENTATIVE OF FIELD PERFORMANCE.
 BALLAST AND FIELD FACTORS HAVE NOT BEEN APPLIED.

TEST DISTANCE EXCEEDS FIVE TIMES THE GREATEST
 LUMINOUS OPENING OF LUMINAIRE.