

Signify Classified - Internal
Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269



Scaled data based on original data using
LM-79-2019 Approved Method: Electrical and Photometric Measurements of Solid-
State Lighting Products

Test Report Prepared for
Cooper Lighting Solutions

Brand: NEO-RAY

Report Number: P645015

Luminaire Tested: OMN4DIP-SR4F0-50D75U935-FLLOOB-1DUDD-WW

Issue Date: 2/16/2023



Test Information

Test Method: LM-79-2019
Report Number: P645015
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2203-563-26, G2-2206-689-19)
Test Lab: INNOVATION CENTER
Issue Date: 2/16/2023
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: OMN4DIP-SR4F0-50D75U935-FLLOOB-1DUDD-WW
Description: NEO-RAY CIRQUE SUSPENDED LED LUMINAIRE
DOWNLIGHT - FLAT FROSTED LENS - 500 LUMENS PER FOOT
UPLIGHT - BATWING OPTIC - 750 LUMENS PER FOOT
Light Source: 3500K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

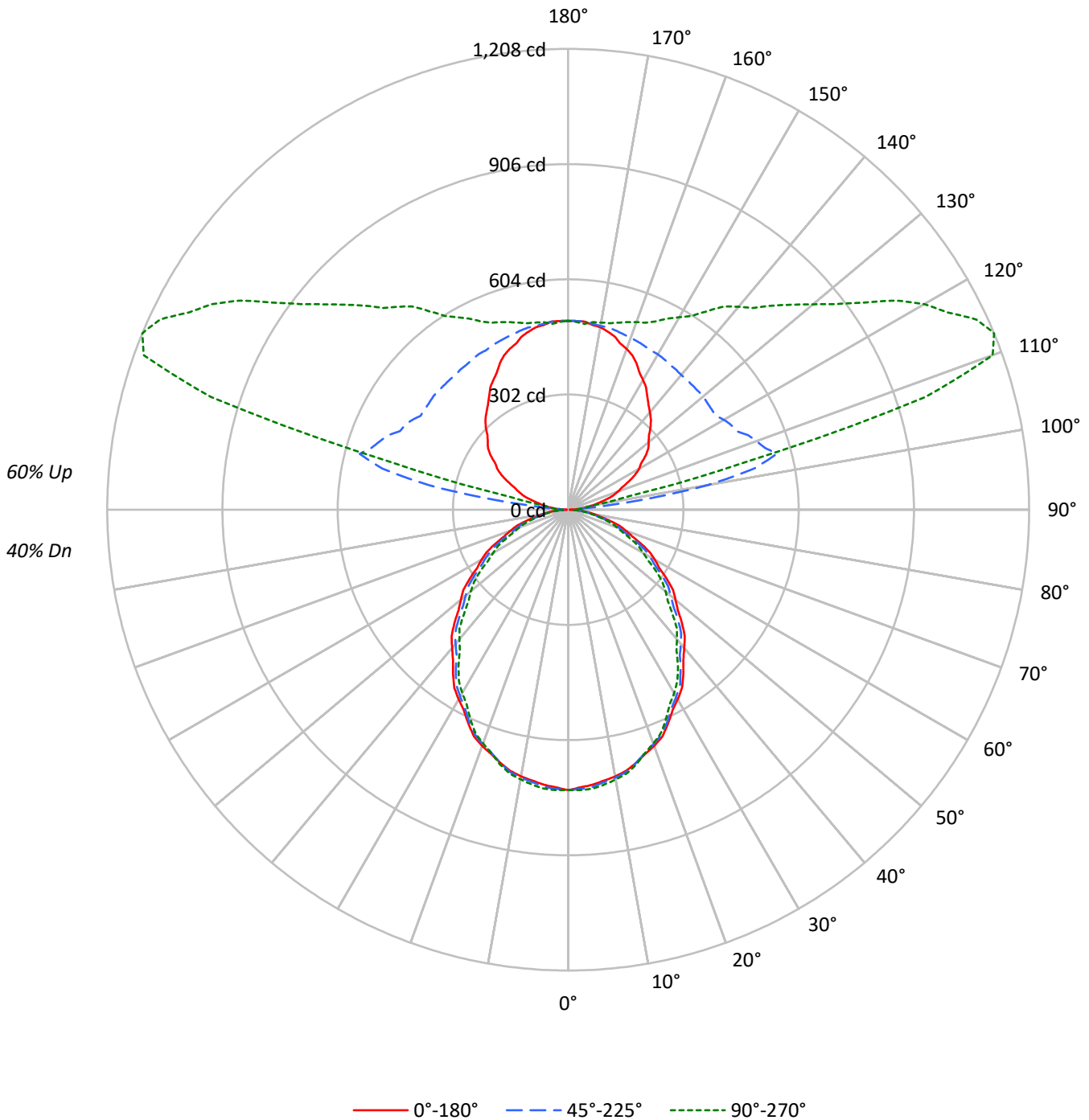
Summary

Lumens per Lamp: N/A
Luminaire Lumens: 4453.4 lumens
Efficiency: N/A
Efficacy: 126.9 lumens/watt
Spacing Criteria (0/90/45): 1.17 / 1.13 / 1.26
Luminous Opening: Rectangular (W 0.17' x L: 4' x H: 0')
CIE Type: General Diffuse

Input Watts (W): 35.1
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT

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Luminous Intensity Polar Plot





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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20									20									20									20										
RC	80									70									50									30									10	0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	50	30	10	50	30	10	0														
RCR																																						
0	105	105	105	105	95	95	95	95	78	78	78	62	62	62	47	47	47	40																				
1	96	91	88	84	87	83	80	77	68	66	64	54	53	51	42	41	40	34																				
2	87	80	74	69	79	73	68	63	60	56	53	48	45	43	37	35	34	28																				
3	79	70	63	57	72	64	58	53	53	48	45	42	39	37	33	30	29	24																				
4	73	62	54	49	66	57	50	45	47	42	38	38	34	31	29	27	25	21																				
5	67	55	47	42	61	51	44	39	42	37	33	34	30	27	26	24	22	18																				
6	61	50	42	36	56	46	39	34	38	33	29	31	27	24	24	21	19	16																				
7	57	45	37	32	52	41	34	29	34	29	25	28	24	21	22	19	17	14																				
8	53	41	33	28	48	37	31	26	31	26	22	25	22	19	20	17	15	13																				
9	49	37	30	25	45	34	28	23	29	24	20	23	20	17	19	16	14	12																				
10	46	34	27	22	42	31	25	21	26	21	18	22	18	15	17	14	13	11																				

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	11867	11867	11867
5°	11734	11815	11896
10°	11640	11690	11772
15°	11483	11483	11550
20°	11323	11237	11203
25°	11027	10938	10796
30°	10701	10552	10347
35°	10368	10111	9875
40°	9969	9674	9337
45°	9636	9270	8814
50°	9218	8817	8364
55°	8867	8417	7910
60°	8460	8008	7330
65°	8023	7450	6877
70°	7600	6892	6420
75°	7112	6301	5989
80°	6509	5765	5486
85°	6113	5372	5002

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 9636 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	69.1	1.6
10°-20°	194.0	4.4
20°-30°	282.1	6.3
30°-40°	320.9	7.2
40°-50°	312.9	7.0
50°-60°	267.1	6.0
60°-70°	194.1	4.4
70°-80°	109.8	2.5
80°-90°	34.9	0.8
90°-100°	65.1	1.5
100°-110°	436.1	9.8
110°-120°	590.3	13.3
120°-130°	480.1	10.8
130°-140°	385.6	8.7
140°-150°	303.9	6.8
150°-160°	222.2	5.0
160°-170°	138.0	3.1
170°-180°	47.1	1.1
0°-30°	545.3	12.2
0°-40°	866.2	19.4
0°-60°	1446.2	32.5
0°-90°	1784.9	40.1
90°-120°	1091.6	24.5
90°-150°	2261.2	50.8
90°-180°	2669.0	59.9
0°-180°	4453.4	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	735	735	735	735	735	
5°	724	735	729	728	734	69
15°	687	696	687	686	691	194
25°	619	625	614	603	606	285
35°	526	528	513	501	501	328
45°	422	420	406	392	386	325
55°	315	314	299	285	281	281
65°	210	208	195	183	180	208
75°	114	110	101	97	96	121
85°	33	29	29	28	27	35
90°	4	8	12	14	14	5
95°	33	50	28	31	36	34
105°	102	151	566	721	476	107
115°	174	210	487	1010	1180	173
125°	248	282	459	800	947	220
135°	305	339	461	659	757	235
145°	361	392	464	574	635	227
155°	424	439	473	521	545	194
165°	470	476	486	498	508	132
175°	495	498	495	492	489	47
180°	495	495	495	495	495	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	735.0	735.0	735.0	735.0	735.0
2.5°	728.6	738.0	732.6	732.7	735.8
5°	724.0	734.8	729.0	728.1	734.0
7.5°	716.4	727.0	720.2	719.2	726.8
10°	710.0	719.8	713.0	711.2	718.0
12.5°	701.2	711.0	704.2	701.6	708.4
15°	687.0	695.8	687.0	686.1	691.0
17.5°	671.0	678.6	668.4	665.1	668.8
20°	659.0	665.8	654.0	649.1	652.0
22.5°	643.8	650.6	638.0	630.7	634.4
25°	619.0	624.9	614.0	603.1	606.0
27.5°	592.4	596.9	586.0	574.8	575.8
30°	574.0	576.9	566.0	554.0	555.0
32.5°	554.8	557.0	545.2	532.4	532.6
35°	526.0	528.0	513.0	501.0	501.0
37.5°	495.4	496.6	480.6	467.6	466.2
40°	473.0	475.0	459.0	445.9	443.0
42.5°	452.2	452.6	438.2	425.1	421.4
45°	422.0	420.0	406.0	391.9	386.0
47.5°	389.4	389.4	373.4	359.3	353.8
50°	367.0	367.0	351.0	336.9	333.0
52.5°	346.2	345.4	330.2	316.1	310.6
55°	315.0	314.0	299.0	284.9	281.0
57.5°	282.0	282.0	268.0	252.9	248.6
60°	262.0	262.0	248.0	232.9	227.0
62.5°	240.4	239.6	225.6	212.1	208.6
65°	210.0	208.0	195.0	182.9	180.0
67.5°	181.0	179.0	165.2	155.6	153.6
70°	161.0	159.0	146.0	138.0	136.0
72.5°	141.8	139.1	127.6	121.2	119.2
75°	114.0	110.1	101.0	97.0	96.0
77.5°	87.6	81.0	77.2	74.4	73.4
80°	70.0	64.1	62.0	60.0	59.0
82.5°	54.8	48.9	48.4	47.2	46.2
85°	33.0	29.1	29.0	28.0	27.0
87.5°	14.4	12.9	13.6	14.1	14.1
90°	4.0	8.0	12.2	14.3	14.3
92.5°	14.7	15.6	18.1	23.5	25.2
95°	32.9	50.3	27.9	31.1	36.3
97.5°	51.2	92.7	185.9	55.8	47.7
100°	66.2	115.0	369.4	109.2	72.6
102.5°	80.3	131.6	499.0	286.4	156.5
105°	101.5	151.3	565.6	721.0	476.4
107.5°	123.7	161.0	540.1	1048.8	981.5
110°	137.9	173.5	525.1	1102.0	1183.2



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	152.8	188.4	510.2	1070.9	1208.1
115°	174.3	209.8	486.8	1009.6	1180.1
117.5°	197.3	232.2	481.1	944.3	1119.7
120°	214.7	247.3	471.2	894.7	1077.4
122.5°	226.4	262.1	458.7	852.0	1020.1
125°	248.0	281.5	458.7	800.5	946.6
127.5°	265.0	299.9	459.3	740.6	884.9
130°	275.0	311.5	461.8	700.6	837.6
132.5°	286.7	323.2	461.0	682.6	795.3
135°	305.2	338.6	460.8	659.2	756.7
137.5°	320.7	356.6	460.8	633.4	716.8
140°	333.2	366.7	460.8	618.3	694.4
142.5°	345.6	376.7	463.3	600.7	672.0
145°	361.2	391.6	464.0	574.3	635.2
147.5°	379.9	406.7	467.7	555.3	602.2
150°	392.3	416.7	470.2	542.7	582.3
152.5°	404.8	426.7	470.2	532.6	564.8
155°	423.5	438.7	473.3	520.6	544.9
157.5°	438.4	453.0	477.0	512.9	530.6
160°	448.4	460.6	479.5	507.9	523.1
162.5°	455.9	468.0	482.0	505.3	515.6
165°	470.2	476.3	485.8	498.4	507.5
167.5°	478.3	483.8	488.9	495.2	500.7
170°	485.8	488.8	488.9	495.2	498.2
172.5°	488.2	493.7	491.4	492.7	495.7
175°	495.1	498.1	495.1	491.9	488.9
177.5°	495.1	497.5	495.1	495.0	492.6
180°	495.1	495.1	495.1	495.1	495.1

(END OF REPORT)