

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: P644677

Luminaire Tested: OMN4DIP-SR4F0-125D100U930-CLBOOB-1DUDD-WW

Issue Date: 2/16/2023



Test Information

Test Method: LM-79-2019
Report Number: P644677
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2203-563-26, G2-2206-689-20)
Test Lab: INNOVATION CENTER
Issue Date: 2/16/2023
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: OMN4DIP-SR4F0-125D100U930-CLBOOB-1DUDD-WW
Description: NEO-RAY CIRQUE SUSPENDED LED LUMINAIRE
DOWNLIGHT - BATWING LENS - 1250 LUMENS PER FOOT
UPLIGHT - BATWING OPTIC - 1000 LUMENS PER FOOT
Light Source: 3000K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

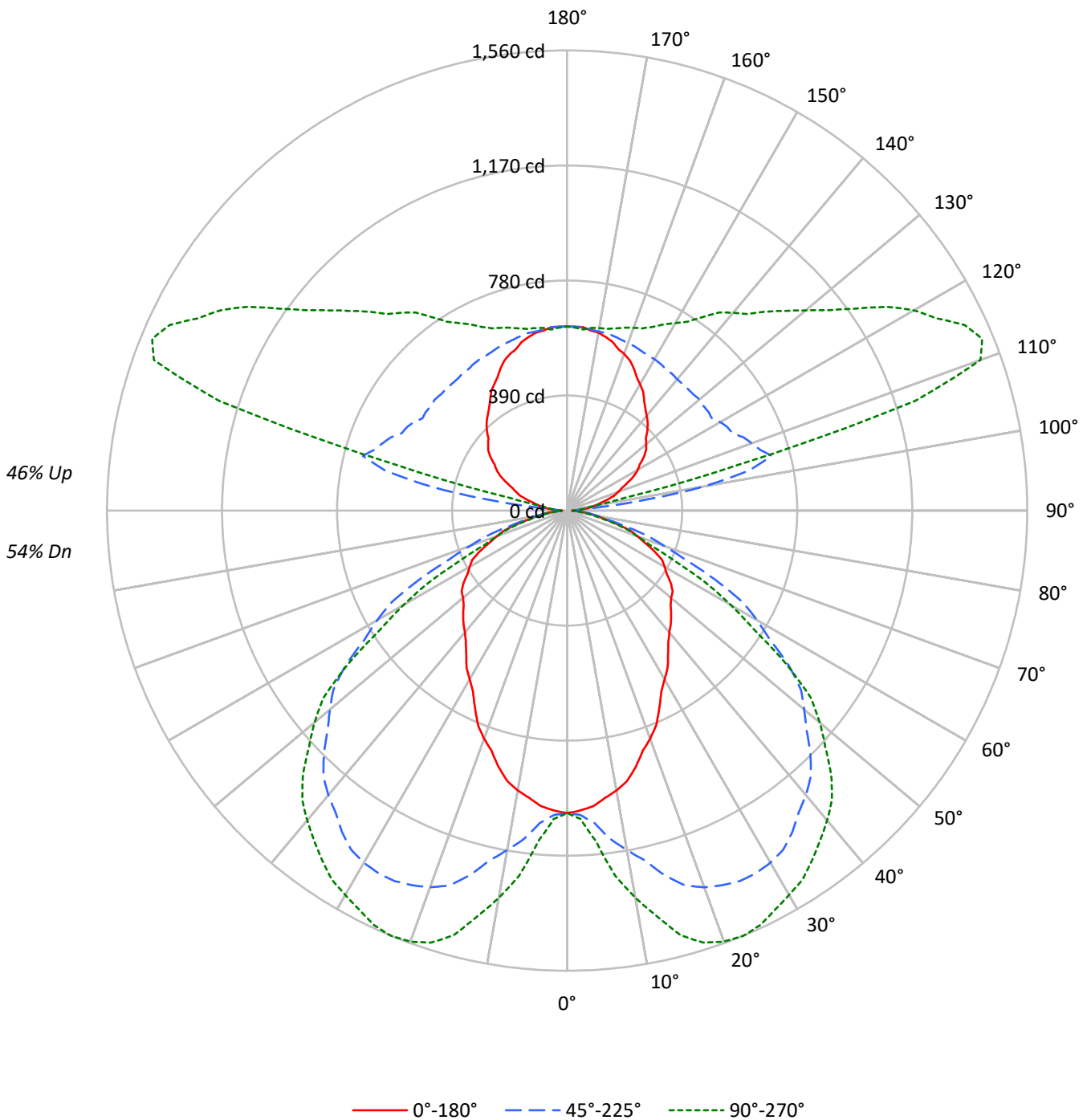
Lumens per Lamp: N/A
Luminaire Lumens: 7319.0 lumens
Efficiency: N/A
Efficacy: 106.1 lumens/watt
Spacing Criteria (0/90/45): 0.99 / 1.87 / 1.75
Luminous Opening: Rectangular (W 0.17' x L: 4' x H: 0')
CIE Type: General Diffuse

Input Watts (W): 69
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					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	0	
RCR																						
0	108	108	108	108	100	100	100	100	85	85	85	72	72	72	60	60	60	54				
1	99	94	91	87	91	88	84	81	75	73	70	64	62	60	53	52	51	46				
2	90	82	76	71	83	77	71	67	66	62	58	56	53	50	47	44	43	38				
3	82	72	65	59	76	67	61	56	58	53	49	49	45	42	41	38	36	32				
4	75	64	56	50	69	60	52	47	51	46	41	44	39	36	37	33	31	27				
5	69	57	49	42	63	53	46	40	46	40	36	39	35	31	33	29	27	24				
6	63	51	43	37	58	47	40	35	41	35	31	35	31	27	30	26	23	20				
7	58	46	38	32	54	43	35	30	37	31	27	32	27	24	27	23	21	18				
8	54	41	34	28	50	39	32	27	34	28	24	29	24	21	25	21	18	16				
9	50	38	30	25	46	35	28	24	31	25	21	27	22	19	23	19	16	14				
10	47	35	27	22	43	32	26	21	28	23	19	24	20	17	21	17	15	13				

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	16556	16556	16556
5°	16310	17238	18243
10°	15795	19157	21854
15°	15027	21406	24913
20°	14136	23356	26715
25°	13169	24683	27613
30°	12314	25696	28053
35°	11751	26227	28531
40°	11358	26538	28901
45°	11380	26626	28914
50°	11560	26354	28092
55°	12082	25844	25509
60°	12319	24025	20715
65°	12481	21047	15213
70°	11934	16546	11821
75°	10711	12346	9969
80°	9093	9754	7978
85°	8837	7947	6632

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°

Vertical Angle: 45°

Luminance: 28914 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	105.2	1.4
10°-20°	349.5	4.8
20°-30°	580.6	7.9
30°-40°	732.4	10.0
40°-50°	783.0	10.7
50°-60°	691.1	9.4
60°-70°	443.5	6.1
70°-80°	196.7	2.7
80°-90°	52.4	0.7
90°-100°	90.1	1.2
100°-110°	555.2	7.6
110°-120°	748.7	10.2
120°-130°	608.2	8.3
130°-140°	486.2	6.6
140°-150°	383.0	5.2
150°-160°	280.1	3.8
160°-170°	173.9	2.4
170°-180°	59.3	0.8
0°-30°	1035.2	14.1
0°-40°	1767.7	24.2
0°-60°	3241.7	44.3
0°-90°	3934.3	53.8
90°-120°	1394.0	19.0
90°-150°	2871.5	39.2
90°-180°	3385.0	46.2
0°-180°	7319.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1025	1025	1025	1025	1025	
5°	1006	1037	1064	1100	1126	95
15°	899	1037	1281	1434	1490	252
25°	739	1003	1386	1515	1550	340
35°	596	916	1331	1417	1448	374
45°	498	783	1166	1238	1266	385
55°	429	616	918	922	906	381
65°	327	413	551	447	398	320
75°	172	190	198	169	160	183
85°	48	41	43	38	36	50
90°	17	20	22	26	21	13
95°	58	75	43	43	48	55
105°	138	201	717	910	600	147
115°	228	272	619	1275	1487	227
125°	317	359	584	1011	1193	282
135°	385	427	581	831	954	297
145°	455	494	585	724	800	286
155°	534	553	596	656	687	245
165°	593	600	612	628	640	166
175°	624	628	624	620	616	59
180°	624	624	624	624	624	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1025.4	1025.4	1025.4	1025.4	1025.4
2.5°	1017.8	1032.7	1033.0	1038.9	1046.4
5°	1006.3	1036.6	1063.6	1099.9	1125.6
7.5°	982.5	1036.6	1122.7	1207.1	1249.1
10°	963.4	1038.0	1168.5	1281.7	1333.0
12.5°	938.6	1037.5	1214.3	1350.6	1409.3
15°	899.0	1036.6	1280.6	1434.4	1490.4
17.5°	853.2	1032.3	1332.5	1486.8	1535.7
20°	822.7	1027.9	1359.3	1505.8	1554.8
22.5°	788.4	1017.8	1374.5	1515.3	1560.5
25°	739.2	1002.7	1385.5	1515.0	1550.0
27.5°	691.1	981.1	1386.0	1495.9	1525.7
30°	660.5	963.7	1378.3	1476.7	1504.7
32.5°	633.8	944.4	1363.1	1453.9	1483.7
35°	596.2	915.6	1330.6	1417.2	1447.5
37.5°	563.7	882.7	1289.6	1373.9	1409.3
40°	538.9	856.0	1259.1	1343.2	1371.2
42.5°	519.9	827.6	1222.8	1305.0	1329.2
45°	498.4	782.9	1166.1	1238.3	1266.3
47.5°	475.5	736.6	1100.8	1168.9	1187.1
50°	460.2	702.7	1049.2	1111.4	1118.4
52.5°	450.7	667.1	999.6	1038.8	1040.2
55°	429.2	615.8	918.1	922.5	906.2
57.5°	400.6	555.9	814.6	791.3	752.1
60°	381.5	514.4	744.0	697.4	641.5
62.5°	362.5	474.9	669.6	594.2	528.9
65°	326.7	413.0	550.9	447.2	398.2
67.5°	285.2	344.9	432.6	334.5	301.9
70°	252.8	299.4	350.5	273.7	250.4
72.5°	222.2	254.0	283.8	226.3	214.1
75°	171.7	190.3	197.9	169.1	159.8
77.5°	126.4	127.3	137.4	119.1	114.5
80°	97.8	93.1	104.9	90.5	85.8
82.5°	74.9	68.3	76.3	65.8	63.0
85°	47.7	40.7	42.9	38.1	35.8
87.5°	28.1	23.3	23.5	22.3	19.5
90°	16.7	20.5	22.2	26.0	21.3
92.5°	31.8	30.1	29.7	34.8	33.2
95°	57.6	75.2	43.3	42.6	47.9
97.5°	79.1	128.1	239.8	72.8	61.2
100°	96.0	154.3	470.2	141.0	92.6
102.5°	113.0	176.1	633.5	362.5	197.5
105°	138.3	201.2	717.4	909.7	600.4
107.5°	166.1	211.0	685.3	1322.9	1236.9
110°	183.0	226.8	666.4	1389.9	1491.2



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	201.9	245.6	647.6	1350.7	1522.6
115°	227.8	271.5	619.3	1274.7	1487.3
117.5°	256.3	299.7	612.3	1192.5	1411.2
120°	276.4	318.6	599.7	1129.9	1357.8
122.5°	292.1	335.5	582.1	1076.1	1285.6
125°	317.2	359.4	584.0	1011.1	1193.0
127.5°	337.5	382.4	582.4	935.3	1115.3
130°	350.1	396.1	585.6	883.0	1055.6
132.5°	362.0	408.0	581.7	860.3	1002.2
135°	384.6	426.8	580.8	830.8	953.6
137.5°	404.2	449.5	580.8	798.2	903.4
140°	419.9	462.1	580.8	779.2	875.1
142.5°	435.6	474.7	583.9	757.1	846.8
145°	455.2	493.6	584.7	723.8	800.5
147.5°	478.8	512.5	589.4	699.9	758.9
150°	494.5	525.1	592.6	683.9	733.8
152.5°	510.1	537.8	592.6	671.2	711.9
155°	533.7	552.9	596.5	656.0	686.7
157.5°	552.5	570.9	601.2	646.4	668.7
160°	565.1	580.4	604.3	640.1	659.3
162.5°	574.5	589.9	607.5	636.8	649.9
165°	592.6	600.2	612.2	628.1	639.6
167.5°	602.8	609.7	616.1	624.1	631.0
170°	612.2	616.0	616.1	624.0	627.9
172.5°	615.3	622.2	619.2	620.9	624.7
175°	624.0	627.8	624.0	619.9	616.1
177.5°	624.0	627.0	624.0	623.9	620.8
180°	624.0	624.0	624.0	624.0	624.0

(END OF REPORT)