

Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269



Scaled data based on original data using
LM-79-2024 Approved Method: Electrical and Photometric Measurements of Solid-
State Lighting Products

Test Report Prepared for
Cooper Lighting Solutions

Brand: NEO-RAY

Report Number: P1058038

Luminaire Tested: S122RDRP-S675D830-X4F0-XX-UDD-WVL-B

Issue Date: 8/7/2025

Test Information

Test Method: LM-79-2024
Report Number: P1058038
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2406-143-19)
Test Lab: INNOVATION CENTER
Issue Date: 8/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S122RDRP-S675D830-X4F0-XX-UDD-WVL-B
Description: DEFINE 2 BLACK REGRESSED DIRECT RECESSED HOUSING WITH WHITE STRAIGHT BLADE
LOUVER WITH DIFFUSER
CORE LIGHT ENGINE
Light Source: 3000K CCT, 80 CRI LEDS
Ballast/Driver: -

Summary

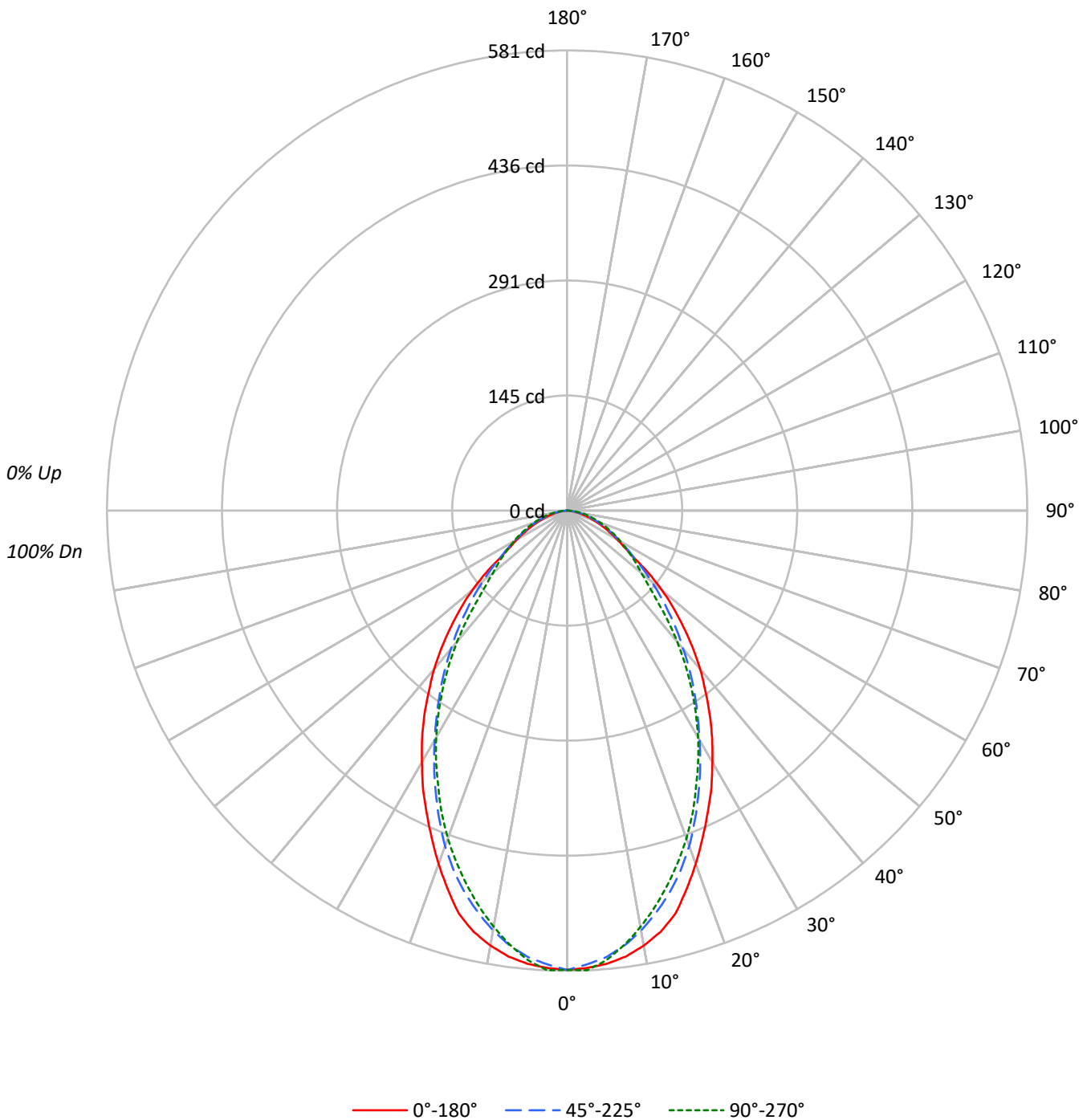
Lumens per Lamp: N/A
Luminaire Lumens: 880.6 lumens
Efficiency: N/A
Efficacy: 34.1 lumens/watt
Spacing Criteria (0/90/45): 1 / 0.92 / 1.02
Luminous Opening: Rectangular (W 0.15' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 25.8
Input Voltage (V): 120
Input Current (A_{in}): 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	0
RCR																		
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100
1	111	107	104	101	108	105	102	99	101	98	96	97	95	93	93	92	90	88
2	103	96	91	86	100	94	89	85	91	87	83	88	84	81	85	82	79	77
3	95	87	80	74	93	85	79	74	82	77	73	80	75	71	77	73	70	68
4	89	79	71	65	87	77	70	65	75	69	64	73	68	63	71	66	63	61
5	83	72	64	58	81	71	63	58	69	62	57	67	61	57	65	60	56	54
6	77	66	58	52	75	65	57	52	63	56	52	61	56	51	60	55	51	49
7	72	60	53	47	71	60	52	47	58	52	47	57	51	47	56	50	46	44
8	68	56	48	43	66	55	48	43	54	47	43	53	47	43	52	46	42	41
9	64	52	45	40	63	51	44	39	50	44	39	49	43	39	48	43	39	37
10	60	48	41	36	59	48	41	36	47	41	36	46	40	36	45	40	36	34

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	10701	10701	10701
5°	10638	10484	10553
10°	10450	10086	10000
15°	10071	9542	9349
20°	9320	8848	8648
25°	8553	7989	7839
30°	7811	7121	7044
35°	7071	6303	6156
40°	6294	5494	5205
45°	5423	4723	4167
50°	4478	3976	3499
55°	3236	3298	3150
60°	2690	2827	2864
65°	2297	2458	2620
70°	1894	2190	2390
75°	1583	1847	2174
80°	1180	1477	1966
85°	381	783	1757

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 5423 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	53.6	6.1
10°-20°	141.2	16.0
20°-30°	182.7	20.7
30°-40°	179.2	20.3
40°-50°	141.1	16.0
50°-60°	92.5	10.5
60°-70°	56.3	6.4
70°-80°	28.1	3.2
80°-90°	6.1	0.7
90°-100°	0.0	0.0
100°-110°	0.0	0.0
110°-120°	0.0	0.0
120°-130°	0.0	0.0
130°-140°	0.0	0.0
140°-150°	0.0	0.0
150°-160°	0.0	0.0
160°-170°	0.0	0.0
170°-180°	0.0	0.0
0°-30°	377.4	42.9
0°-40°	556.6	63.2
0°-60°	790.1	89.7
0°-90°	880.6	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	880.6	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	580	580	580	580	580	
5°	574	574	566	570	570	54
15°	527	520	500	493	489	147
25°	420	406	392	391	385	193
35°	314	296	280	279	273	196
45°	208	195	181	168	160	160
55°	101	106	102	99	98	96
65°	53	54	56	59	60	52
75°	22	23	26	30	30	24
85°	2	3	4	6	8	4
90°	0	0	0	0	0	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	579.9	579.9	579.9	579.9	579.9
2.5°	578.0	578.9	573.4	578.9	580.8
5°	574.3	574.3	566.0	569.7	569.7
7.5°	567.9	566.9	554.0	554.0	553.1
10°	557.7	554.0	538.3	535.5	533.7
12.5°	544.8	538.3	519.8	515.2	512.5
15°	527.2	519.8	499.5	493.1	489.4
17.5°	501.4	494.0	476.4	469.1	465.4
20°	474.6	463.5	450.6	444.1	440.4
22.5°	446.9	434.0	422.0	417.3	413.7
25°	420.1	406.3	392.4	390.6	385.0
27.5°	394.3	377.6	363.8	362.9	358.3
30°	366.6	349.0	334.2	335.2	330.6
32.5°	340.7	324.1	306.5	307.5	301.9
35°	313.9	296.4	279.8	278.8	273.3
37.5°	286.2	269.6	253.9	250.2	244.7
40°	261.3	244.7	228.1	221.6	216.1
42.5°	234.5	219.8	205.0	194.8	187.4
45°	207.8	194.8	181.0	168.0	159.7
47.5°	181.9	171.7	159.7	144.0	138.5
50°	156.0	148.7	138.5	124.7	121.9
52.5°	129.3	126.5	120.0	110.8	109.9
55°	100.6	106.2	102.5	98.8	97.9
57.5°	84.9	85.9	88.6	87.7	87.7
60°	72.9	72.9	76.6	77.6	77.6
62.5°	61.9	62.8	66.5	68.3	68.3
65°	52.6	53.6	56.3	59.1	60.0
67.5°	43.4	45.2	48.0	50.8	51.7
70°	35.1	36.9	40.6	43.4	44.3
72.5°	28.6	29.5	33.2	36.0	36.9
75°	22.2	23.1	25.9	29.5	30.5
77.5°	15.7	17.5	20.3	23.1	24.9
80°	11.1	12.0	13.9	17.5	18.5
82.5°	6.5	7.4	9.2	12.0	12.9
85°	1.8	2.8	3.7	6.5	8.3
87.5°	0.0	0.0	0.0	1.8	3.7
90°	0.0	0.0	0.0	0.0	0.0



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CIE UGR TABLE:

Reflectances:											
Ceiling		0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3
Wall		0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3
Reference plane		0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2
Room dimensions		Viewed crosswise					Viewed endwise				
X=2H	Y=2H	14.36	15.76	14.72	16.07	16.38	14.54	15.93	14.90	16.25	16.56
	3H	15.49	16.73	15.87	17.06	17.43	16.00	17.24	16.37	17.57	17.93
	4H	15.84	17.00	16.24	17.35	17.74	16.54	17.70	16.94	18.05	18.43
	6H	16.03	17.10	16.44	17.47	17.86	16.95	18.02	17.36	18.39	18.78
	8H	16.05	17.07	16.48	17.46	17.86	17.08	18.09	17.51	18.48	18.89
	12H	16.04	17.01	16.47	17.39	17.82	17.16	18.13	17.59	18.52	18.95
4H	2H	14.82	15.98	15.22	16.33	16.71	14.96	16.13	15.36	16.48	16.86
	3H	16.15	17.11	16.57	17.51	17.92	16.63	17.59	17.05	17.99	18.40
	4H	16.60	17.46	17.03	17.87	18.32	17.30	18.16	17.73	18.58	19.02
	6H	16.87	17.61	17.33	18.06	18.52	17.83	18.58	18.29	19.02	19.49
	8H	16.91	17.61	17.38	18.05	18.52	18.00	18.70	18.47	19.14	19.61
	12H	16.91	17.52	17.39	18.01	18.48	18.12	18.74	18.61	19.22	19.69
8H	4H	16.81	17.51	17.28	17.95	18.42	17.45	18.14	17.91	18.59	19.06
	6H	17.16	17.73	17.66	18.22	18.70	18.08	18.65	18.58	19.14	19.62
	8H	17.24	17.75	17.76	18.26	18.75	18.31	18.82	18.83	19.34	19.83
	12H	17.25	17.70	17.77	18.20	18.77	18.50	18.95	19.01	19.44	20.01
12H	4H	16.82	17.44	17.31	17.92	18.39	17.43	18.05	17.92	18.53	19.00
	6H	17.18	17.69	17.70	18.21	18.70	18.07	18.58	18.59	19.10	19.59
	8H	17.30	17.75	17.81	18.24	18.81	18.35	18.80	18.86	19.29	19.86