

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: P1057838

Luminaire Tested: S122RDRP-S1005D930-X4F0-XX-UDD-SVL-S

Issue Date: 8/7/2025

**Test Information**

Test Method: LM-79-2024  
Report Number: P1057838  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2406-143-59)  
Test Lab: INNOVATION CENTER  
Issue Date: 8/7/2025  
Manufacturer: COOPER LIGHTING SOLUTIONS  
Product Line: NEO-RAY  
Catalog Number: S122RDRP-S1005D930-X4F0-XX-UDD-SVL-S  
Description: DEFINE 2 SILVER REGRESSED DIRECT RECESSED HOUSING WITH SILVER STRAIGHT BLADE  
LOUVER WITH DIFFUSER  
CORE LIGHT ENGINE  
Light Source: 3000K CCT, 90 CRI LEDS  
Ballast/Driver: -

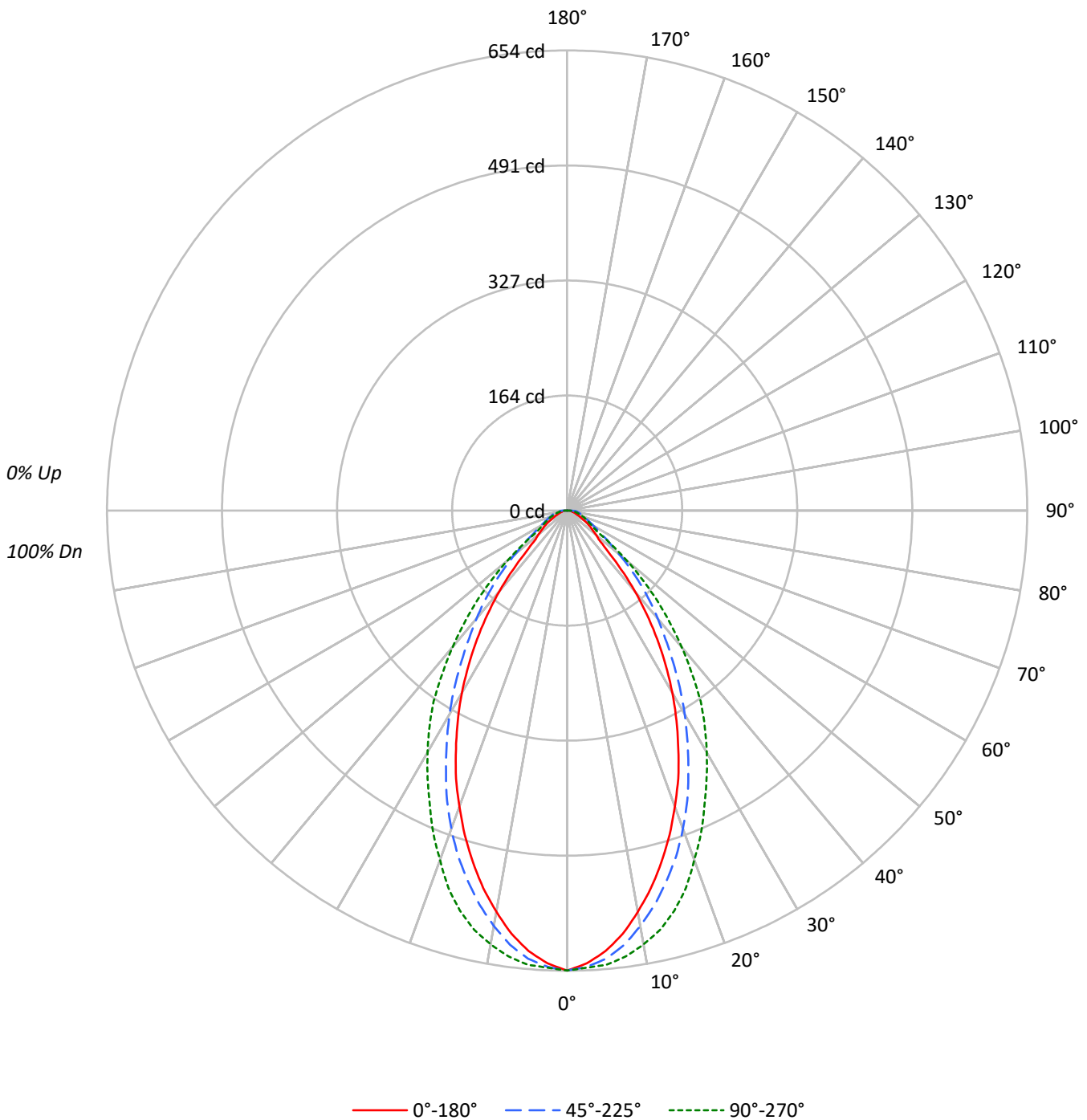
**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 788.6 lumens  
Efficiency: N/A  
Efficacy: 18.9 lumens/watt  
Spacing Criteria (0/90/45): 0.82 / 0.97 / 0.94  
Luminous Opening: Rectangular (W 0.15' x L: 4' x H: 0')  
CIE Type: Direct  
  
Input Watts (W): 41.8  
Input Voltage (V): 120  
Input Current (A<sub>in</sub>): 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	108	105	102	109	106	103	100	101	99	97	98	96	94	94	93	91	89
2	104	98	93	88	102	96	91	87	93	89	85	90	86	83	87	84	82	80
3	97	89	83	78	95	88	82	77	85	80	76	82	78	75	80	77	74	72
4	91	82	75	70	89	81	74	69	78	73	68	76	71	68	74	70	67	65
5	86	75	68	63	84	74	68	63	72	66	62	71	65	61	69	64	61	59
6	80	70	62	57	79	69	62	57	67	61	57	66	60	56	64	59	56	54
7	76	65	57	52	74	64	57	52	62	56	52	61	56	52	60	55	51	50
8	71	60	53	48	70	59	53	48	58	52	48	57	52	48	56	51	47	46
9	67	56	49	45	66	56	49	44	55	49	44	54	48	44	53	48	44	42
10	64	53	46	41	63	52	46	41	51	45	41	50	45	41	50	45	41	39

**AVERAGE LUMINANCE (cd/sqm):**

	0°	45°	90°
0°	12062	12062	12062
5°	11640	11840	11997
10°	10847	11231	11728
15°	9884	10413	11244
20°	8785	9449	10374
25°	7613	8299	9404
30°	6373	7119	8455
35°	5026	5895	7445
40°	3604	4822	6101
45°	2109	3807	4721
50°	1524	2770	3186
55°	1280	1979	1670
60°	1022	1602	1425
65°	843	1423	1319
70°	718	1365	1235
75°	684	1462	1205
80°	765	1796	1286
85°	1270	2816	1778

**MAXIMUM LUMINANCE 45°-90°:**

Horizontal Angle: 90°  
 Vertical Angle: 45°  
 Luminance: 4721 cd/sqm



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	59.9	7.6
10°-20°	153.4	19.5
20°-30°	188.6	23.9
30°-40°	166.7	21.1
40°-50°	106.4	13.5
50°-60°	51.9	6.6
60°-70°	30.9	3.9
70°-80°	19.7	2.5
80°-90°	10.9	1.4
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°	401.9	51.0
0°-40°	568.7	72.1
0°-60°	727.0	92.2
0°-90°	788.6	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	788.6	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	654	654	654	654	654	
5°	628	642	639	642	648	58
15°	517	532	545	569	589	144
25°	374	387	408	433	462	171
35°	223	235	262	298	330	139
45°	81	104	146	164	181	68
55°	40	53	62	58	52	36
65°	19	36	33	30	30	19
75°	10	22	20	18	17	11
85°	6	12	13	12	8	6
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	653.7	653.7	653.7	653.7	653.7
2.5°	644.0	656.1	648.9	648.9	650.1
5°	628.4	641.6	639.2	641.6	647.7
7.5°	606.6	619.9	622.3	632.0	639.2
10°	578.9	592.2	599.4	615.1	625.9
12.5°	550.0	563.2	574.1	594.6	610.3
15°	517.4	531.9	545.1	569.3	588.6
17.5°	483.6	498.1	515.0	539.1	562.0
20°	447.4	460.7	481.2	504.1	528.3
22.5°	412.5	424.5	446.2	467.9	496.9
25°	373.9	387.1	407.6	433.0	461.9
27.5°	336.5	349.8	370.3	399.2	429.4
30°	299.1	311.2	334.1	364.2	396.8
32.5°	260.5	272.6	297.9	330.5	364.2
35°	223.1	235.2	261.7	297.9	330.5
37.5°	185.7	199.0	229.1	262.9	290.7
40°	149.6	165.2	200.2	229.1	253.3
42.5°	113.4	135.1	172.5	196.6	215.9
45°	80.8	103.7	145.9	164.0	180.9
47.5°	61.5	79.6	120.6	133.9	144.7
50°	53.1	65.1	96.5	106.1	111.0
52.5°	45.8	57.9	77.2	80.8	78.4
55°	39.8	53.1	61.5	57.9	51.9
57.5°	33.8	49.4	50.7	43.4	44.6
60°	27.7	44.6	43.4	37.4	38.6
62.5°	22.9	41.0	37.4	33.8	33.8
65°	19.3	36.2	32.6	30.2	30.2
67.5°	15.7	32.6	28.9	26.5	26.5
70°	13.3	28.9	25.3	22.9	22.9
72.5°	12.1	25.3	22.9	20.5	20.5
75°	9.6	21.7	20.5	18.1	16.9
77.5°	8.4	18.1	18.1	16.9	14.5
80°	7.2	15.7	16.9	14.5	12.1
82.5°	7.2	14.5	14.5	13.3	9.6
85°	6.0	12.1	13.3	12.1	8.4
87.5°	3.6	10.9	10.9	9.6	6.0
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	10.67	11.95	11.04	12.27	12.58	10.20	11.48	10.57	11.79	12.11
	3H	11.85	12.99	12.23	13.32	13.69	11.76	12.90	12.14	13.23	13.60
	4H	12.28	13.34	12.69	13.69	14.08	12.45	13.51	12.85	13.86	14.24
	6H	12.63	13.60	13.04	13.97	14.37	13.10	14.08	13.51	14.45	14.84
	8H	12.82	13.75	13.25	14.14	14.54	13.39	14.31	13.82	14.70	15.11
	12H	13.04	13.92	13.47	14.31	14.74	13.70	14.59	14.13	14.97	15.40
4H	2H	11.18	12.24	11.58	12.59	12.98	10.80	11.87	11.21	12.22	12.60
	3H	12.82	13.70	13.24	14.10	14.51	12.60	13.48	13.01	13.88	14.28
	4H	13.59	14.37	14.02	14.79	15.24	13.44	14.23	13.88	14.65	15.09
	6H	14.19	14.87	14.65	15.32	15.78	14.30	14.98	14.77	15.43	15.90
	8H	14.49	15.12	14.96	15.57	16.04	14.69	15.33	15.16	15.78	16.25
	12H	14.80	15.36	15.29	15.85	16.32	15.13	15.69	15.61	16.17	16.65
8H	4H	14.01	14.64	14.48	15.09	15.56	13.90	14.54	14.37	14.99	15.46
	6H	14.96	15.48	15.46	15.97	16.46	15.02	15.54	15.52	16.03	16.51
	8H	15.50	15.97	16.03	16.49	16.98	15.59	16.06	16.12	16.58	17.07
	12H	16.07	16.48	16.58	16.98	17.55	16.26	16.68	16.78	17.17	17.74
12H	4H	14.08	14.64	14.56	15.12	15.60	13.99	14.55	14.47	15.03	15.51
	6H	15.14	15.61	15.66	16.12	16.62	15.20	15.67	15.72	16.19	16.68
	8H	15.83	16.25	16.35	16.74	17.32	15.91	16.33	16.43	16.82	17.39