

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: P1058075

Luminaire Tested: S122RDRP-S675D927-X4F0-XX-UDD-WVL-S

Issue Date: 8/7/2025

Test Information

Test Method: LM-79-2024
Report Number: P1058075
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2406-143-58)
Test Lab: INNOVATION CENTER
Issue Date: 8/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S122RDRP-S675D927-X4F0-XX-UDD-WVL-S
Description: DEFINE 2 SILVER REGRESSED DIRECT RECESSED HOUSING WITH WHITE STRAIGHT BLADE
LOUVER WITH DIFFUSER
CORE LIGHT ENGINE
Light Source: 2700K CCT, 90 CRI LEDS
Ballast/Driver: -

Summary

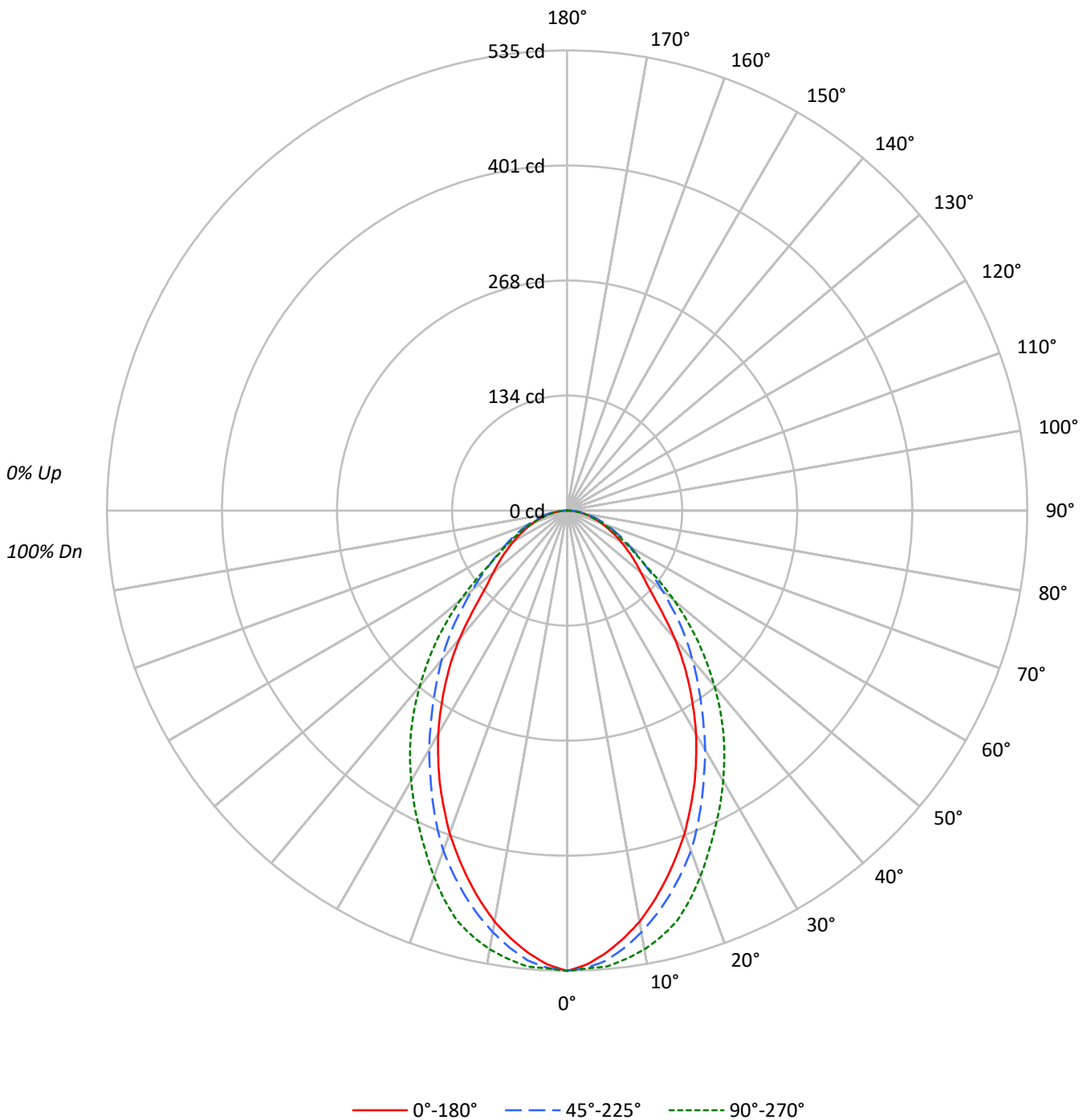
Lumens per Lamp: N/A
Luminaire Lumens: 871.3 lumens
Efficiency: N/A
Efficacy: 33.8 lumens/watt
Spacing Criteria (0/90/45): 0.91 / 1.05 / 1.05
Luminous Opening: Rectangular (W 0.15' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 25.8
Input Voltage (V): 120
Input Current (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	0
RCR																		
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100
1	110	106	103	99	108	104	101	98	100	97	95	96	94	92	93	91	89	87
2	102	95	89	84	100	93	88	83	90	85	81	87	83	79	84	80	78	76
3	94	85	78	73	92	84	77	72	81	75	71	78	73	69	76	72	68	66
4	88	77	69	63	85	76	69	63	73	67	62	71	66	61	69	64	61	59
5	81	70	62	56	79	69	61	56	67	60	55	65	59	55	63	58	54	52
6	76	64	56	50	74	63	56	50	61	55	50	60	54	49	58	53	49	47
7	71	59	51	45	69	58	51	45	57	50	45	55	49	45	54	49	44	43
8	67	54	47	41	65	54	46	41	52	46	41	51	45	41	50	45	41	39
9	63	50	43	38	61	50	43	38	49	42	38	48	42	37	47	41	37	36
10	59	47	40	35	58	46	39	35	45	39	35	45	39	34	44	38	34	33

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	9874	9874	9874
5°	9565	9725	9854
10°	9095	9327	9706
15°	8486	8828	9435
20°	7839	8265	8892
25°	7130	7541	8285
30°	6388	6833	7728
35°	5564	6105	7136
40°	4695	5463	6417
45°	3729	4822	5613
50°	3209	4145	4659
55°	2924	3548	3574
60°	2665	3152	3037
65°	2441	2847	2681
70°	2261	2638	2390
75°	2103	2488	2103
80°	1977	2391	1902
85°	1969	2456	1651

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°
 Vertical Angle: 45°
 Luminance: 5613 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	49.4	5.7
10°-20°	130.6	15.0
20°-30°	171.8	19.7
30°-40°	172.8	19.8
40°-50°	140.0	16.1
50°-60°	96.5	11.1
60°-70°	63.1	7.2
70°-80°	35.2	4.0
80°-90°	11.9	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°	351.8	40.4
0°-40°	524.6	60.2
0°-60°	761.1	87.4
0°-90°	871.3	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	871.3	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	535	535	535	535	535	
5°	516	526	525	527	532	48
15°	444	455	462	479	494	124
25°	350	360	370	387	407	160
35°	247	259	271	295	317	154
45°	143	159	185	201	215	113
55°	91	101	110	113	111	81
65°	56	67	65	62	61	56
75°	30	36	35	31	30	32
85°	9	12	12	10	8	10
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	535.1	535.1	535.1	535.1	535.1
2.5°	528.1	537.4	532.0	532.0	532.7
5°	516.4	526.5	525.0	527.3	532.0
7.5°	501.7	512.6	512.6	519.5	525.8
10°	485.4	496.2	497.8	508.7	518.0
12.5°	465.2	476.1	480.7	494.7	507.1
15°	444.2	455.1	462.1	479.2	493.9
17.5°	421.7	432.6	441.9	459.7	474.5
20°	399.2	409.3	420.9	436.4	452.8
22.5°	374.3	385.2	396.1	410.8	429.5
25°	350.2	359.6	370.4	386.7	406.9
27.5°	324.6	334.7	344.8	364.2	385.2
30°	299.8	309.9	320.7	340.9	362.7
32.5°	273.4	284.2	295.1	317.6	340.1
35°	247.0	258.6	271.0	295.1	316.8
37.5°	221.3	233.8	248.5	273.4	292.0
40°	194.9	208.1	226.8	248.5	266.4
42.5°	167.0	183.3	205.8	224.4	240.7
45°	142.9	159.2	184.8	201.1	215.1
47.5°	125.0	138.2	163.1	177.1	188.7
50°	111.8	121.9	144.4	154.5	162.3
52.5°	101.0	111.1	126.6	133.6	135.9
55°	90.9	101.0	110.3	112.6	111.1
57.5°	80.8	91.6	97.1	94.7	94.7
60°	72.2	83.9	85.4	82.3	82.3
62.5°	63.7	75.3	75.3	71.4	71.4
65°	55.9	66.8	65.2	62.1	61.4
67.5°	48.9	59.0	56.7	53.6	52.8
70°	41.9	51.3	48.9	45.0	44.3
72.5°	35.7	44.3	41.2	38.1	36.5
75°	29.5	36.5	34.9	31.1	29.5
77.5°	24.1	29.5	28.0	24.9	23.3
80°	18.6	23.3	22.5	19.4	17.9
82.5°	14.0	17.9	17.1	14.8	12.4
85°	9.3	12.4	11.6	10.1	7.8
87.5°	4.7	8.5	7.8	7.0	3.9
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	14.68	16.12	15.05	16.44	16.75	15.04	16.48	15.41	16.80	17.11
	3H	16.23	17.52	16.61	17.85	18.21	16.39	17.68	16.77	18.01	18.37
	4H	16.80	18.01	17.20	18.36	18.74	16.87	18.08	17.27	18.43	18.81
	6H	17.23	18.34	17.64	18.71	19.11	17.23	18.34	17.64	18.71	19.10
	8H	17.38	18.44	17.81	18.83	19.24	17.34	18.40	17.77	18.79	19.20
	12H	17.50	18.51	17.93	18.90	19.33	17.42	18.43	17.85	18.82	19.25
4H	2H	15.27	16.48	15.67	16.83	17.21	15.56	16.76	15.96	17.11	17.49
	3H	17.09	18.09	17.50	18.49	18.90	17.13	18.13	17.54	18.53	18.93
	4H	17.84	18.74	18.27	19.16	19.60	17.74	18.64	18.17	19.05	19.49
	6H	18.43	19.21	18.88	19.65	20.11	18.22	19.00	18.68	19.45	19.91
	8H	18.64	19.37	19.10	19.81	20.28	18.38	19.11	18.85	19.56	20.03
	12H	18.80	19.46	19.29	19.94	20.41	18.50	19.16	18.99	19.64	20.11
8H	4H	18.12	18.86	18.59	19.30	19.77	18.04	18.77	18.50	19.21	19.68
	6H	18.88	19.48	19.38	19.98	20.46	18.66	19.26	19.15	19.75	20.23
	8H	19.20	19.75	19.72	20.26	20.75	18.91	19.45	19.42	19.96	20.45
	12H	19.49	19.97	20.00	20.46	21.03	19.12	19.60	19.63	20.09	20.66
12H	4H	18.14	18.80	18.63	19.28	19.75	18.07	18.72	18.56	19.20	19.68
	6H	18.94	19.48	19.46	19.99	20.48	18.73	19.28	19.25	19.79	20.28
	8H	19.34	19.82	19.85	20.31	20.88	19.05	19.53	19.56	20.02	20.59