

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: P1058071

Luminaire Tested: S122RDRP-S675D927-X4F0-XX-UDD-SVL-B

Issue Date: 8/7/2025

Test Information

Test Method: LM-79-2024
Report Number: P1058071
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2406-143-20)
Test Lab: INNOVATION CENTER
Issue Date: 8/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S122RDRP-S675D927-X4F0-XX-UDD-SVL-B
Description: DEFINE 2 BLACK REGRESSED DIRECT RECESSED HOUSING WITH SILVER STRAIGHT BLADE
LOUVER WITH DIFFUSER
CORE LIGHT ENGINE
Light Source: 2700K CCT, 90 CRI LEDS
Ballast/Driver: -

Summary

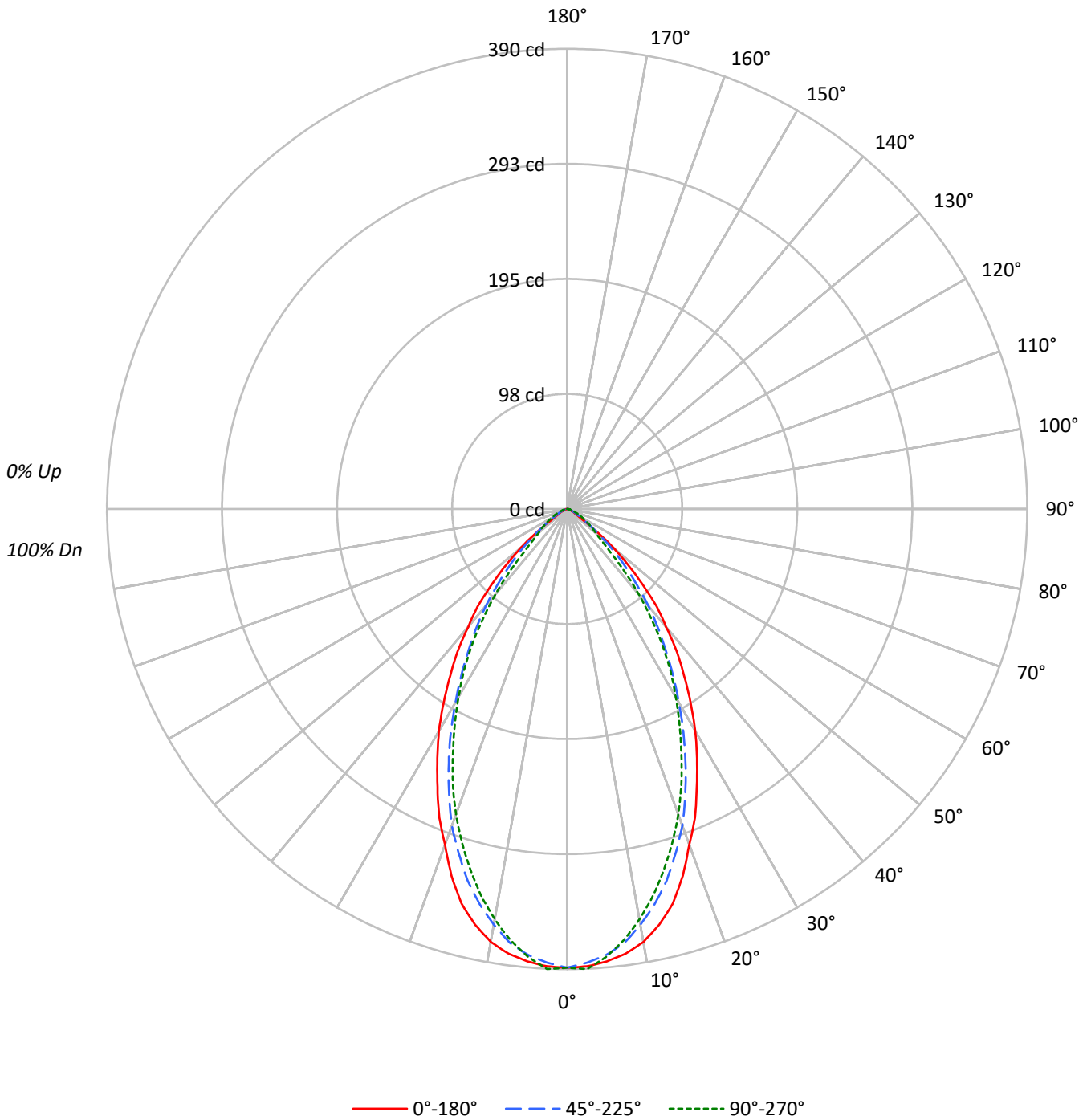
Lumens per Lamp: N/A
Luminaire Lumens: 418.1 lumens
Efficiency: N/A
Efficacy: 16.2 lumens/watt
Spacing Criteria (0/90/45): 0.93 / 0.85 / 0.91
Luminous Opening: Rectangular (W 0.15' x L: 4' x H: 0')
CIE Type: Direct

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	50	30	10	0	
RCR																						
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100				100
1	113	110	107	104	110	107	105	103	103	101	99	100	98	96	96	95	94	92				92
2	106	101	96	92	104	99	95	91	96	92	89	93	90	87	90	87	85	84				84
3	100	93	87	82	98	91	86	82	88	84	80	86	82	79	84	80	78	76				76
4	94	85	79	74	92	84	78	74	82	77	73	80	76	72	78	74	71	70				70
5	88	79	72	68	87	78	72	67	76	71	67	74	70	66	73	69	65	64				64
6	83	73	67	62	82	72	66	62	71	65	61	69	64	61	68	64	60	59				59
7	79	68	62	57	77	68	61	57	66	60	56	65	60	56	64	59	56	54				54
8	74	64	57	53	73	63	57	52	62	56	52	61	56	52	60	55	52	50				50
9	70	60	53	49	69	59	53	49	58	52	48	57	52	48	56	52	48	47				47
10	67	56	50	45	66	56	49	45	55	49	45	54	49	45	53	48	45	44				44

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	7174	7174	7174
5°	7129	7029	7057
10°	6980	6702	6616
15°	6612	6226	6048
20°	5942	5608	5410
25°	5294	4836	4660
30°	4630	4033	3918
35°	3897	3269	3165
40°	3141	2580	2281
45°	2349	1863	1357
50°	1470	1203	890
55°	499	650	724
60°	288	402	572
65°	205	271	441
70°	167	210	334
75°	114	164	278
80°	85	170	244
85°	0	0	169

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 2349 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	35.8	8.6
10°-20°	91.7	21.9
20°-30°	110.4	26.4
30°-40°	94.4	22.6
40°-50°	55.3	13.2
50°-60°	20.0	4.8
60°-70°	7.1	1.7
70°-80°	2.8	0.7
80°-90°	0.5	0.1
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°	238.0	56.9
0°-40°	332.4	79.5
0°-60°	407.7	97.5
0°-90°	418.1	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	418.1	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	389	389	389	389	389	
5°	385	386	380	381	381	36
15°	346	341	326	320	317	96
25°	260	249	238	234	229	119
35°	173	160	145	144	140	108
45°	90	81	71	60	52	69
55°	16	22	20	21	22	19
65°	5	5	6	8	10	5
75°	2	2	2	3	4	2
85°	0	0	0	1	1	0
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	388.8	388.8	388.8	388.8	388.8
2.5°	388.0	388.8	384.9	388.8	390.3
5°	384.9	385.7	379.5	381.0	381.0
7.5°	380.2	379.5	370.9	369.4	368.6
10°	372.5	370.1	357.7	355.4	353.1
12.5°	360.8	356.2	343.0	339.1	336.0
15°	346.1	340.7	325.9	319.7	316.6
17.5°	325.9	319.7	305.7	299.5	296.4
20°	302.6	296.4	285.6	278.6	275.5
22.5°	283.2	273.1	261.5	256.8	253.0
25°	260.0	249.1	237.5	233.6	228.9
27.5°	238.2	225.0	213.4	210.3	206.4
30°	217.3	203.3	189.3	189.3	183.9
32.5°	194.8	181.6	166.8	166.1	163.0
35°	173.0	159.9	145.1	143.6	140.5
37.5°	152.9	139.7	125.7	121.1	117.2
40°	130.4	118.7	107.1	99.3	94.7
42.5°	112.5	99.3	87.7	78.4	72.2
45°	90.0	80.7	71.4	59.8	52.0
47.5°	69.8	63.6	55.9	42.7	38.8
50°	51.2	48.1	41.9	31.8	31.0
52.5°	32.6	34.1	30.3	24.8	27.2
55°	15.5	21.7	20.2	21.0	22.5
57.5°	10.1	10.9	14.7	17.1	18.6
60°	7.8	7.8	10.9	14.0	15.5
62.5°	6.2	6.2	8.5	11.6	12.4
65°	4.7	5.4	6.2	8.5	10.1
67.5°	3.9	3.9	4.7	7.0	7.8
70°	3.1	3.1	3.9	5.4	6.2
72.5°	2.3	2.3	3.1	4.7	4.7
75°	1.6	2.3	2.3	3.1	3.9
77.5°	1.6	1.6	1.6	2.3	3.1
80°	0.8	0.8	1.6	1.6	2.3
82.5°	0.8	0.8	0.8	0.8	1.6
85°	0.0	0.0	0.0	0.8	0.8
87.5°	0.0	0.0	0.0	0.0	0.0
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	2.75	3.91	3.12	4.23	4.54	6.13	7.30	6.50	7.61	7.92
	3H	3.27	4.29	3.65	4.62	4.99	6.86	7.88	7.24	8.22	8.58
	4H	3.40	4.35	3.81	4.70	5.09	7.08	8.03	7.49	8.38	8.77
	6H	3.49	4.35	3.90	4.73	5.12	7.23	8.10	7.65	8.47	8.86
	8H	3.50	4.31	3.93	4.70	5.11	7.26	8.08	7.70	8.47	8.88
	12H	3.46	4.24	3.90	4.63	5.06	7.27	8.05	7.70	8.43	8.86
4H	2H	3.05	4.00	3.46	4.35	4.74	6.10	7.05	6.50	7.40	7.79
	3H	3.71	4.48	4.13	4.89	5.29	6.97	7.74	7.39	8.15	8.55
	4H	3.95	4.63	4.39	5.05	5.50	7.26	7.94	7.69	8.36	8.81
	6H	4.08	4.67	4.55	5.12	5.59	7.48	8.07	7.95	8.51	8.99
	8H	4.10	4.65	4.57	5.10	5.57	7.53	8.08	8.00	8.52	9.00
	12H	4.07	4.55	4.56	5.03	5.51	7.55	8.03	8.04	8.52	8.99
8H	4H	4.06	4.60	4.53	5.05	5.53	7.19	7.73	7.66	8.18	8.66
	6H	4.24	4.68	4.75	5.18	5.67	7.45	7.89	7.96	8.39	8.87
	8H	4.29	4.69	4.82	5.21	5.70	7.52	7.91	8.04	8.43	8.93
	12H	4.27	4.62	4.79	5.11	5.69	7.58	7.93	8.10	8.43	9.00
12H	4H	4.05	4.52	4.53	5.01	5.49	7.14	7.62	7.63	8.10	8.58
	6H	4.24	4.64	4.77	5.16	5.65	7.40	7.80	7.93	8.32	8.81
	8H	4.32	4.67	4.84	5.17	5.74	7.49	7.84	8.01	8.34	8.91