

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: P1061434

Luminaire Tested: S125RDRP-S1090D830-X4F0-XX-UDD-BVL-B

Issue Date: 8/7/2025

Test Information

Test Method: LM-79-2024
Report Number: P1061434
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2406-143-48)
Test Lab: INNOVATION CENTER
Issue Date: 8/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S125RDRP-S1090D830-X4F0-XX-UDD-BVL-B
Description: DEFINE 5 BLACK REGRESSED DIRECT RECESSED HOUSING WITH BLACK STRAIGHT BLADE
LOUVER WITH DIFFUSER
CORE LIGHT ENGINE
Light Source: 3000K CCT, 80 CRI LEDS
Ballast/Driver: -

Summary

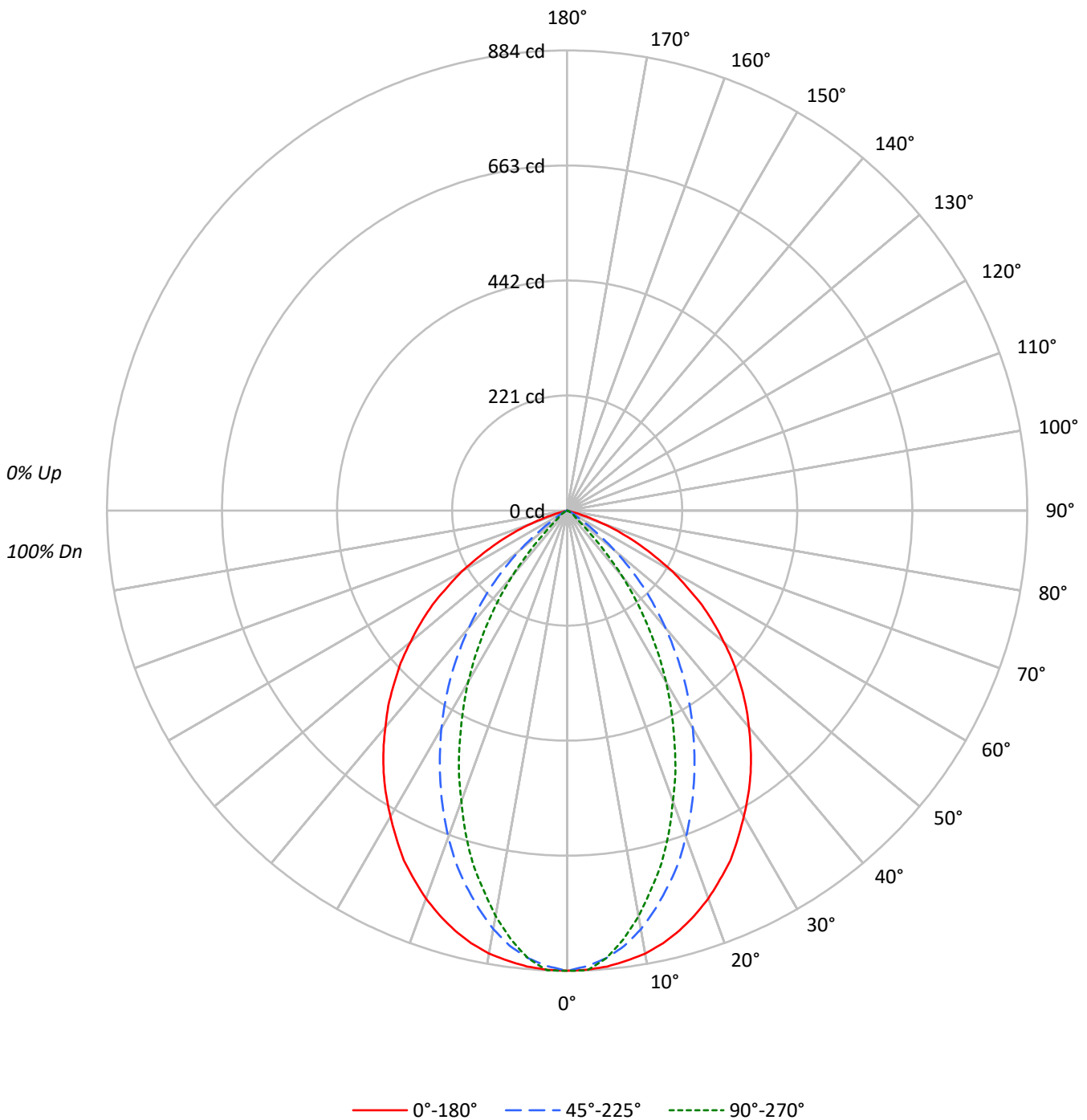
Lumens per Lamp: N/A
Luminaire Lumens: 1142.0 lumens
Efficiency: N/A
Efficacy: 32.6 lumens/watt
Spacing Criteria (0/90/45): 1.15 / 0.81 / 0.97
Luminous Opening: Rectangular (W 0.39' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 35
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	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	112	109	106	103	110	107	104	102	103	101	99	99	97	96	95	94	93	91					91			
2	105	99	94	90	103	97	93	89	94	90	87	91	88	85	88	86	83	82					82			
3	98	90	84	80	96	89	83	79	86	82	78	84	80	76	81	78	75	73					73			
4	92	83	76	71	90	82	75	70	79	74	70	77	72	69	75	71	68	66					66			
5	86	76	69	64	84	75	68	63	73	67	63	71	66	62	70	65	62	60					60			
6	81	70	63	58	79	69	62	57	67	61	57	66	61	57	65	60	56	54					54			
7	76	65	58	53	74	64	57	52	63	56	52	61	56	52	60	55	51	50					50			
8	71	60	53	48	70	59	53	48	58	52	48	57	52	48	56	51	47	46					46			
9	67	56	49	44	66	55	49	44	54	48	44	53	48	44	52	47	44	42					42			
10	64	52	46	41	62	52	45	41	51	45	41	50	45	41	49	44	41	39					39			

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	6087	6087	6087
5°	6077	5965	5965
10°	6042	5708	5528
15°	5952	5328	4996
20°	5810	4888	4349
25°	5635	4377	3704
30°	5396	3838	3023
35°	5166	3274	2264
40°	4885	2642	1468
45°	4576	1999	636
50°	4210	1275	238
55°	3793	559	168
60°	3211	241	113
65°	2432	152	57
70°	1480	70	24
75°	311	32	32
80°	0	0	0
85°	0	0	0

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 4576 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	81.5	7.1
10°-20°	212.4	18.6
20°-30°	272.7	23.9
30°-40°	256.8	22.5
40°-50°	179.5	15.7
50°-60°	95.9	8.4
60°-70°	38.2	3.3
70°-80°	5.0	0.4
80°-90°	0.0	0.0
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°	566.7	49.6
0°-40°	823.4	72.1
0°-60°	1098.8	96.2
0°-90°	1142.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1142.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	884	884	884	884	884	
5°	879	877	863	865	863	83
15°	835	808	748	713	701	235
25°	742	676	576	513	488	340
35°	615	517	390	301	269	384
45°	470	352	205	99	65	363
55°	316	194	47	16	14	280
65°	149	60	9	5	4	148
75°	12	4	1	1	1	23
85°	0	0	0	0	0	0
90°	0	0	0	0	0	0



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	884.0	884.0	884.0	884.0	884.0
2.5°	882.8	884.0	875.8	882.8	884.0
5°	879.3	877.0	863.0	865.3	863.0
7.5°	872.3	866.5	843.2	835.0	830.3
10°	864.2	851.3	816.4	798.9	790.7
12.5°	851.3	832.7	783.7	756.9	745.2
15°	835.0	808.2	747.5	712.6	700.9
17.5°	815.2	780.2	710.2	667.1	649.6
20°	793.0	746.4	667.1	615.8	593.6
22.5°	767.4	713.7	622.8	565.6	543.5
25°	741.7	676.4	576.1	513.1	487.5
27.5°	710.2	637.9	529.5	461.8	433.8
30°	678.7	599.4	482.8	409.3	380.2
32.5°	647.3	558.6	436.2	354.5	325.4
35°	614.6	516.6	389.5	300.9	269.4
37.5°	579.6	474.7	339.4	249.6	216.9
40°	543.5	433.8	293.9	199.4	163.3
42.5°	508.5	393.0	248.4	150.4	110.8
45°	470.0	352.2	205.3	99.1	65.3
47.5°	433.8	312.5	160.9	57.1	33.8
50°	393.0	271.7	119.0	30.3	22.2
52.5°	354.5	232.1	79.3	19.8	17.5
55°	316.0	193.6	46.6	16.3	14.0
57.5°	271.7	156.3	25.7	12.8	10.5
60°	233.2	122.5	17.5	9.3	8.2
62.5°	188.9	89.8	12.8	7.0	5.8
65°	149.3	59.5	9.3	4.7	3.5
67.5°	110.8	35.0	5.8	2.3	2.3
70°	73.5	18.7	3.5	1.2	1.2
72.5°	38.5	8.2	2.3	1.2	1.2
75°	11.7	3.5	1.2	1.2	1.2
77.5°	0.0	1.2	0.0	0.0	1.2
80°	0.0	0.0	0.0	0.0	0.0
82.5°	0.0	0.0	0.0	0.0	0.0
85°	0.0	0.0	0.0	0.0	0.0
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	15.22	16.48	15.58	16.80	17.11	0.00	0.00	0.00	0.00	0.00
	3H	15.80	16.92	16.18	17.25	17.61	0.00	0.00	0.00	0.00	0.00
	4H	15.77	16.80	16.17	17.15	17.54	0.00	0.00	0.00	0.00	0.00
	6H	15.68	16.63	16.10	17.00	17.39	0.00	0.00	0.00	0.00	0.00
	8H	15.64	16.53	16.07	16.92	17.33	0.00	0.00	0.00	0.00	0.00
	12H	15.59	16.44	16.02	16.83	17.26	0.00	0.00	0.00	0.00	0.00
4H	2H	14.99	16.02	15.40	16.38	16.76	0.00	0.00	0.00	0.00	0.00
	3H	15.58	16.42	16.00	16.83	17.23	0.00	0.00	0.00	0.00	0.00
	4H	15.53	16.28	15.97	16.70	17.14	0.00	0.00	0.00	0.00	0.00
	6H	15.45	16.08	15.91	16.53	17.00	0.00	0.00	0.00	0.00	0.00
	8H	15.39	15.98	15.86	16.43	16.90	0.00	0.00	0.00	0.00	0.00
	12H	15.34	15.86	15.82	16.34	16.82	0.00	0.00	0.00	0.00	0.00
8H	4H	15.39	15.98	15.86	16.43	16.90	0.00	0.00	0.00	0.00	0.00
	6H	15.28	15.76	15.78	16.26	16.74	0.00	0.00	0.00	0.00	0.00
	8H	15.21	15.65	15.74	16.16	16.66	0.00	0.00	0.00	0.00	0.00
	12H	15.17	15.55	15.68	16.04	16.62	0.00	0.00	0.00	0.00	0.00
12H	4H	15.34	15.86	15.82	16.34	16.82	0.00	0.00	0.00	0.00	0.00
	6H	15.21	15.65	15.74	16.16	16.66	0.00	0.00	0.00	0.00	0.00
	8H	15.17	15.55	15.68	16.04	16.62	0.00	0.00	0.00	0.00	0.00