

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: P1061722

Luminaire Tested: S125RDRP-S610D930-X4F0-XX-UDD-BVL-B

Issue Date: 8/7/2025

**Test Information**

Test Method: LM-79-2024  
Report Number: P1061722  
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-S610D930-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, 90 CRI LEDS  
Ballast/Driver: -

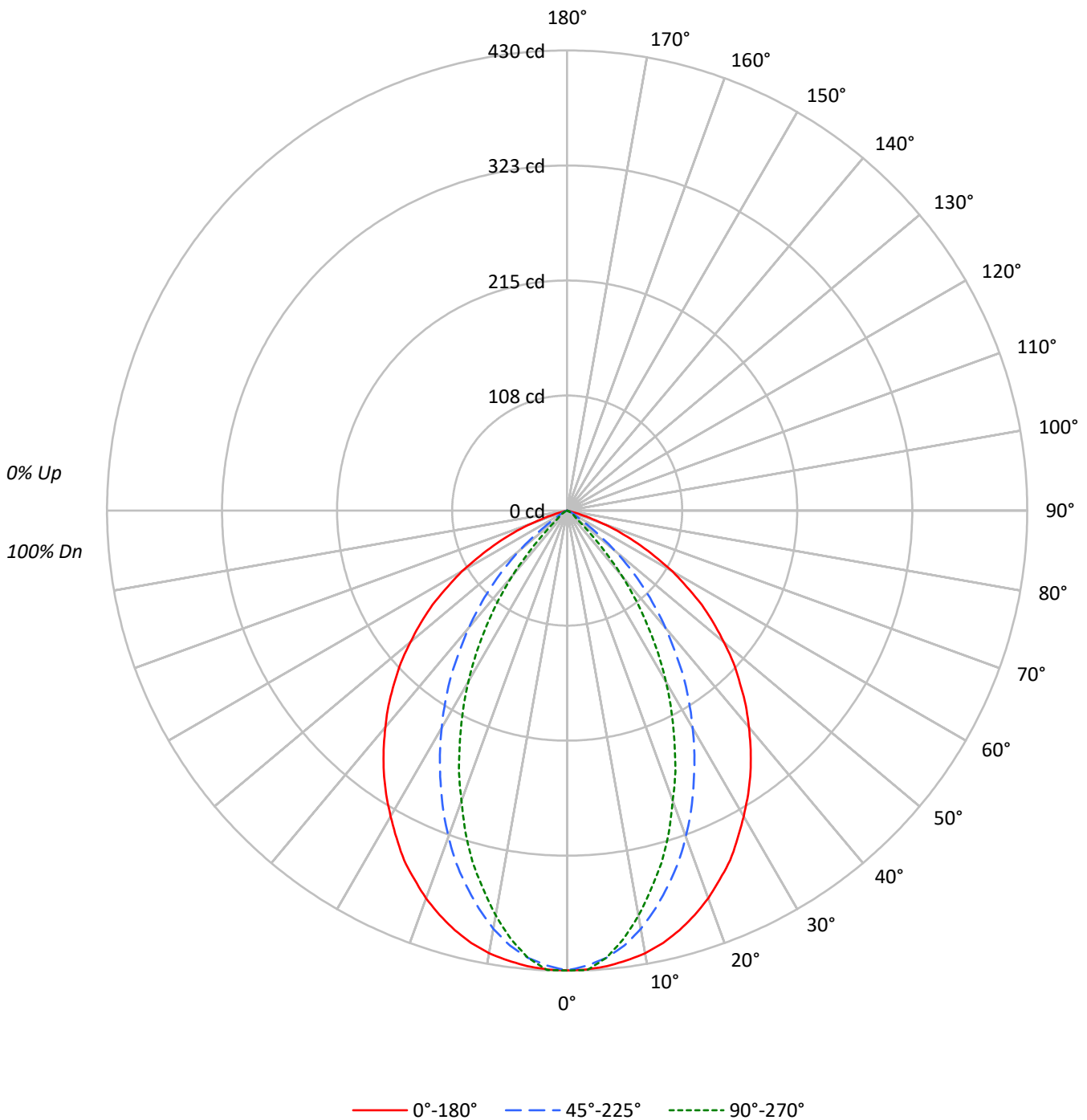
**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 555.1 lumens  
Efficiency: N/A  
Efficacy: 28.3 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): 19.6  
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	112	109	106	103	110	107	104	102	103	101	99	99	97	96	95	94	93	91
2	105	99	94	90	103	97	93	89	94	90	87	91	88	85	88	86	83	82
3	98	90	84	80	96	89	83	79	86	82	78	84	80	76	81	78	75	73
4	92	83	76	71	90	82	75	70	79	74	70	77	72	69	75	71	68	66
5	86	76	69	64	84	75	68	63	73	67	63	71	66	62	70	65	62	60
6	81	70	63	58	79	69	62	57	67	61	57	66	61	57	65	60	56	54
7	76	65	58	53	74	64	57	52	63	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	44	66	55	49	44	54	48	44	53	48	44	52	47	44	42
10	64	52	46	41	62	52	45	41	51	45	41	50	45	41	49	44	41	39

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

	0°	45°	90°
0°	2959	2959	2959
5°	2954	2899	2899
10°	2937	2774	2687
15°	2893	2590	2429
20°	2825	2376	2114
25°	2739	2127	1800
30°	2623	1866	1469
35°	2511	1591	1101
40°	2375	1284	714
45°	2225	972	309
50°	2046	619	116
55°	1844	272	82
60°	1562	117	55
65°	1183	73	28
70°	719	34	12
75°	152	16	16
80°	0	0	0
85°	0	0	0

**MAXIMUM LUMINANCE 45°-90°:**

Horizontal Angle: 0°  
 Vertical Angle: 45°  
 Luminance: 2225 cd/sqm



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	39.6	7.1
10°-20°	103.3	18.6
20°-30°	132.6	23.9
30°-40°	124.8	22.5
40°-50°	87.3	15.7
50°-60°	46.6	8.4
60°-70°	18.6	3.3
70°-80°	2.4	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°	275.4	49.6
0°-40°	400.2	72.1
0°-60°	534.1	96.2
0°-90°	555.1	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	555.1	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	430	430	430	430	430	
5°	427	426	420	421	420	41
15°	406	393	363	346	341	114
25°	360	329	280	249	237	165
35°	299	251	189	146	131	186
45°	228	171	100	48	32	176
55°	154	94	23	8	7	136
65°	73	29	4	2	2	72
75°	6	2	1	1	1	11
85°	0	0	0	0	0	0
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	429.7	429.7	429.7	429.7	429.7
2.5°	429.1	429.7	425.7	429.1	429.7
5°	427.4	426.3	419.5	420.6	419.5
7.5°	424.0	421.2	409.9	405.9	403.6
10°	420.1	413.8	396.8	388.3	384.3
12.5°	413.8	404.8	380.9	367.9	362.2
15°	405.9	392.9	363.4	346.4	340.7
17.5°	396.3	379.2	345.2	324.3	315.8
20°	385.5	362.8	324.3	299.3	288.5
22.5°	373.0	346.9	302.7	274.9	264.2
25°	360.5	328.8	280.0	249.4	237.0
27.5°	345.2	310.1	257.4	224.5	210.9
30°	329.9	291.4	234.7	199.0	184.8
32.5°	314.6	271.5	212.0	172.3	158.2
35°	298.7	251.1	189.3	146.3	131.0
37.5°	281.7	230.7	165.0	121.3	105.4
40°	264.2	210.9	142.9	96.9	79.4
42.5°	247.2	191.0	120.7	73.1	53.9
45°	228.5	171.2	99.8	48.2	31.7
47.5°	210.9	151.9	78.2	27.8	16.4
50°	191.0	132.1	57.8	14.7	10.8
52.5°	172.3	112.8	38.5	9.6	8.5
55°	153.6	94.1	22.7	7.9	6.8
57.5°	132.1	76.0	12.5	6.2	5.1
60°	113.4	59.5	8.5	4.5	4.0
62.5°	91.8	43.7	6.2	3.4	2.8
65°	72.6	28.9	4.5	2.3	1.7
67.5°	53.9	17.0	2.8	1.1	1.1
70°	35.7	9.1	1.7	0.6	0.6
72.5°	18.7	4.0	1.1	0.6	0.6
75°	5.7	1.7	0.6	0.6	0.6
77.5°	0.0	0.6	0.0	0.0	0.6
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	12.72	13.98	13.08	14.29	14.61	0.00	0.00	0.00	0.00	0.00
	3H	13.30	14.41	13.68	14.74	15.11	0.00	0.00	0.00	0.00	0.00
	4H	13.26	14.30	13.67	14.65	15.03	0.00	0.00	0.00	0.00	0.00
	6H	13.18	14.12	13.59	14.49	14.89	0.00	0.00	0.00	0.00	0.00
	8H	13.13	14.02	13.56	14.42	14.82	0.00	0.00	0.00	0.00	0.00
	12H	13.09	13.94	13.52	14.32	14.75	0.00	0.00	0.00	0.00	0.00
4H	2H	12.49	13.52	12.89	13.87	14.26	0.00	0.00	0.00	0.00	0.00
	3H	13.08	13.92	13.49	14.32	14.72	0.00	0.00	0.00	0.00	0.00
	4H	13.03	13.77	13.47	14.19	14.64	0.00	0.00	0.00	0.00	0.00
	6H	12.94	13.58	13.41	14.03	14.50	0.00	0.00	0.00	0.00	0.00
	8H	12.88	13.48	13.35	13.92	14.40	0.00	0.00	0.00	0.00	0.00
	12H	12.83	13.35	13.32	13.84	14.31	0.00	0.00	0.00	0.00	0.00
8H	4H	12.88	13.48	13.35	13.92	14.40	0.00	0.00	0.00	0.00	0.00
	6H	12.78	13.26	13.28	13.76	14.24	0.00	0.00	0.00	0.00	0.00
	8H	12.71	13.14	13.23	13.66	14.15	0.00	0.00	0.00	0.00	0.00
	12H	12.66	13.04	13.18	13.54	14.11	0.00	0.00	0.00	0.00	0.00
12H	4H	12.83	13.35	13.32	13.84	14.31	0.00	0.00	0.00	0.00	0.00
	6H	12.71	13.14	13.23	13.66	14.15	0.00	0.00	0.00	0.00	0.00
	8H	12.66	13.04	13.18	13.54	14.11	0.00	0.00	0.00	0.00	0.00