

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: P1061618

Luminaire Tested: S125RDRP-S375D840-X4F0-XX-UDD-SVL-S

Issue Date: 8/7/2025

**Test Information**

Test Method: LM-79-2024  
Report Number: P1061618  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2406-143-86)  
Test Lab: INNOVATION CENTER  
Issue Date: 8/7/2025  
Manufacturer: COOPER LIGHTING SOLUTIONS  
Product Line: NEO-RAY  
Catalog Number: S125RDRP-S375D840-X4F0-XX-UDD-SVL-S  
Description: DEFINE 5 SILVER REGRESSED DIRECT RECESSED HOUSING WITH SILVER STRAIGHT BLADE  
LOUVER WITH DIFFUSER  
CORE LIGHT ENGINE  
Light Source: 4000K CCT, 80 CRI LEDS  
Ballast/Driver: -

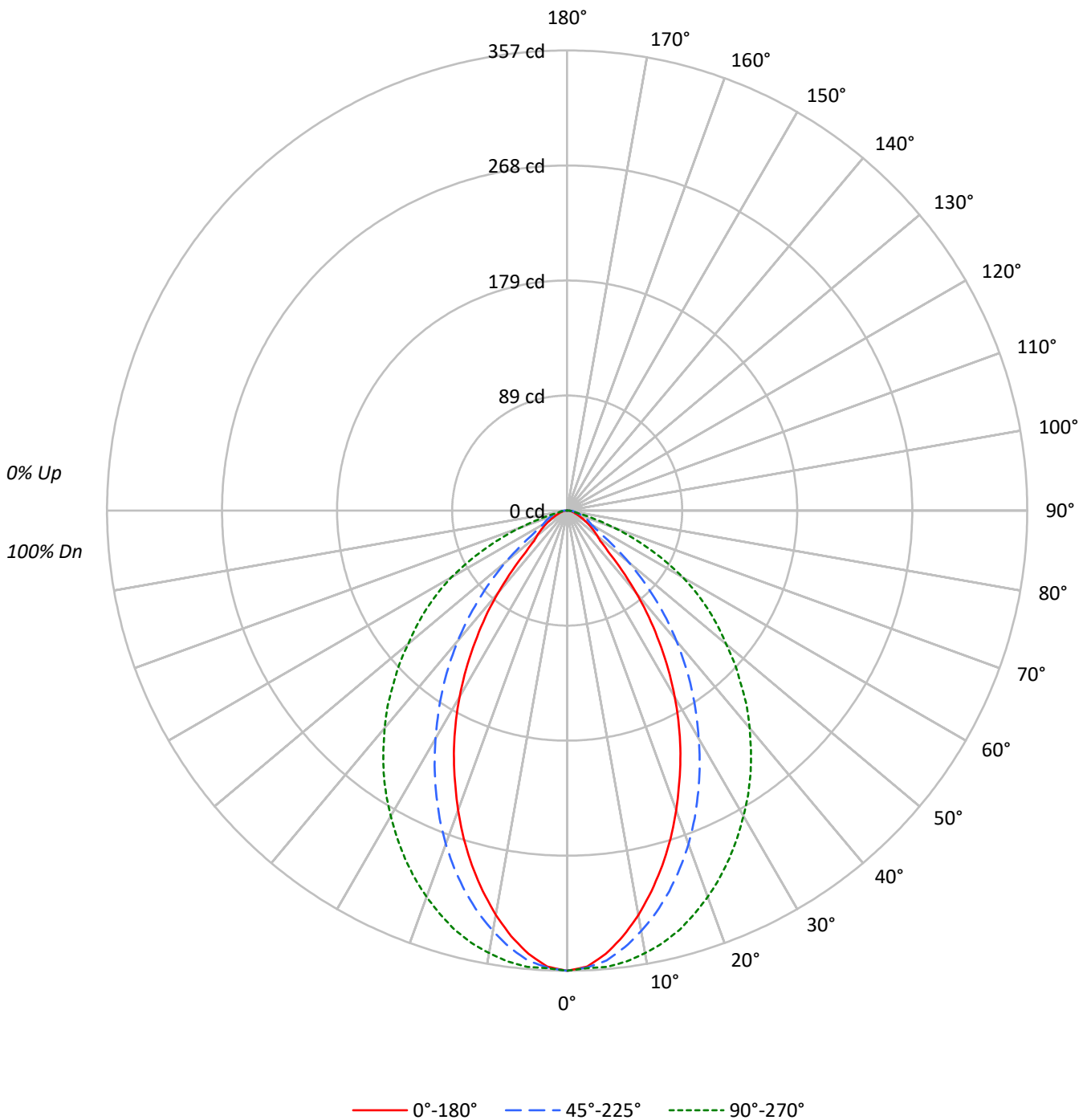
**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 515.5 lumens  
Efficiency: N/A  
Efficacy: 41.2 lumens/watt  
Spacing Criteria (0/90/45): 0.83 / 1.15 / 1.02  
Luminous Opening: Rectangular (W 0.39' x L: 4' x H: 0')  
CIE Type: Direct  
  
Input Watts (W): 12.5  
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	111	108	104	101	109	106	103	100	101	99	97	98	96	94	94	93	91	89
2	104	97	92	87	101	95	91	86	92	88	84	89	86	83	86	83	81	79
3	96	88	81	76	94	87	80	76	84	79	74	81	77	73	79	75	72	70
4	90	80	73	67	88	79	72	67	76	71	66	74	69	65	72	68	64	63
5	84	73	66	60	82	72	65	60	70	64	59	68	63	59	67	62	58	56
6	78	67	60	54	77	66	59	54	65	58	53	63	57	53	62	57	53	51
7	73	62	54	49	72	61	54	49	60	53	49	58	53	48	57	52	48	46
8	69	57	50	45	68	57	50	45	55	49	44	54	48	44	53	48	44	42
9	65	53	46	41	64	53	46	41	52	45	41	51	45	41	50	44	41	39
10	61	50	43	38	60	49	42	38	48	42	38	47	42	38	47	41	38	36

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

	0°	45°	90°
0°	2458	2458	2458
5°	2386	2421	2456
10°	2227	2316	2437
15°	2032	2180	2400
20°	1812	2017	2337
25°	1580	1828	2262
30°	1327	1623	2175
35°	1046	1413	2086
40°	750	1187	1979
45°	441	932	1856
50°	327	672	1723
55°	275	407	1601
60°	222	297	1429
65°	173	283	1145
70°	145	264	775
75°	136	237	338
80°	135	234	218
85°	166	300	237

**MAXIMUM LUMINANCE 45°-90°:**

Horizontal Angle: 90°  
 Vertical Angle: 45°  
 Luminance: 1856 cd/sqm



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	32.9	6.4
10°-20°	86.4	16.8
20°-30°	112.9	21.9
30°-40°	109.9	21.3
40°-50°	82.2	15.9
50°-60°	51.0	9.9
60°-70°	26.8	5.2
70°-80°	9.7	1.9
80°-90°	3.7	0.7
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°	232.3	45.1
0°-40°	342.2	66.4
0°-60°	475.3	92.2
0°-90°	515.5	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	515.5	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	357	357	357	357	357	
5°	345	350	350	352	355	32
15°	285	294	306	324	337	80
25°	208	218	241	273	298	95
35°	124	138	168	213	248	77
45°	45	59	96	150	191	38
55°	23	24	34	88	133	21
65°	11	11	17	37	70	11
75°	5	6	9	10	13	6
85°	2	4	4	4	3	2
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	357.0	357.0	357.0	357.0	357.0
2.5°	354.1	357.0	354.9	354.9	355.3
5°	345.2	349.8	350.3	352.4	355.3
7.5°	332.9	338.4	341.8	348.1	352.8
10°	318.5	324.9	331.2	341.8	348.6
12.5°	302.4	310.0	319.3	333.7	343.5
15°	285.0	293.5	305.8	324.4	336.7
17.5°	266.8	275.7	291.0	313.4	328.2
20°	247.3	257.1	275.3	300.7	318.9
22.5°	227.4	238.5	258.4	287.2	308.8
25°	208.0	218.5	240.6	273.2	297.7
27.5°	187.6	198.6	222.8	258.8	285.9
30°	166.9	178.7	204.1	244.0	273.6
32.5°	146.1	158.4	185.9	228.7	261.3
35°	124.5	138.1	168.1	213.0	248.2
37.5°	104.2	118.6	149.9	196.9	234.2
40°	83.4	98.3	132.1	181.3	220.2
42.5°	63.1	78.4	113.9	165.2	206.3
45°	45.3	59.3	95.7	149.5	190.6
47.5°	34.7	42.8	78.8	133.4	176.6
50°	30.5	33.0	62.7	117.7	160.9
52.5°	26.7	28.4	46.6	102.5	147.4
55°	22.9	24.1	33.9	88.1	133.4
57.5°	19.5	20.8	25.8	75.0	119.0
60°	16.1	17.4	21.6	61.8	103.8
62.5°	13.6	14.0	19.5	49.6	86.8
65°	10.6	11.4	17.4	37.3	70.3
67.5°	8.9	9.3	15.2	26.7	54.2
70°	7.2	7.6	13.1	18.6	38.5
72.5°	6.4	6.4	11.0	13.6	24.6
75°	5.1	5.9	8.9	9.7	12.7
77.5°	4.2	5.9	7.6	7.2	6.8
80°	3.4	5.5	5.9	5.9	5.5
82.5°	3.0	4.7	5.1	4.7	4.2
85°	2.1	3.8	3.8	3.8	3.0
87.5°	1.7	3.4	3.0	3.0	2.1
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	2.93	4.28	3.29	4.59	4.90	12.62	13.97	12.98	14.28	14.60
	3H	3.76	4.96	4.14	5.29	5.65	13.53	14.73	13.91	15.06	15.42
	4H	4.12	5.24	4.52	5.59	5.97	13.63	14.74	14.03	15.09	15.48
	6H	4.49	5.52	4.90	5.89	6.28	13.61	14.64	14.03	15.01	15.40
	8H	4.67	5.65	5.10	6.04	6.44	13.60	14.57	14.03	14.96	15.37
	12H	4.84	5.77	5.27	6.15	6.58	13.59	14.52	14.02	14.90	15.33
4H	2H	3.75	4.87	4.16	5.22	5.60	12.47	13.59	12.87	13.94	14.32
	3H	4.81	5.72	5.22	6.12	6.53	13.46	14.37	13.87	14.77	15.18
	4H	5.26	6.08	5.69	6.50	6.94	13.58	14.40	14.02	14.82	15.26
	6H	5.81	6.52	6.28	6.97	7.43	13.62	14.32	14.08	14.77	15.23
	8H	6.08	6.74	6.55	7.18	7.65	13.62	14.28	14.09	14.72	15.19
	12H	6.32	6.90	6.81	7.39	7.86	13.63	14.21	14.11	14.69	15.17
8H	4H	5.81	6.47	6.28	6.92	7.39	13.51	14.17	13.98	14.62	15.09
	6H	6.59	7.13	7.09	7.62	8.10	13.57	14.11	14.07	14.60	15.09
	8H	7.01	7.49	7.53	8.01	8.50	13.60	14.08	14.12	14.60	15.09
	12H	7.43	7.85	7.94	8.35	8.92	13.65	14.08	14.17	14.57	15.15
12H	4H	5.87	6.46	6.36	6.94	7.41	13.48	14.06	13.96	14.54	15.01
	6H	6.73	7.21	7.25	7.73	8.22	13.53	14.02	14.06	14.53	15.03
	8H	7.26	7.69	7.78	8.19	8.76	13.60	14.03	14.11	14.52	15.09