

Scaled data based on original data using  
LM-79-2019 Approved Method: Electrical and Photometric Measurements of Solid-  
State Lighting Products

Test Report Prepared for  
Cooper Lighting Solutions

Brand: NEO-RAY

Report Number: P1059052

Luminaire Tested: S123RDR-S1000D930-X4F0-XX-UDD-SVL-B

Issue Date: 8/7/2025

**Test Information**

Test Method: LM-79-2019  
Report Number: P1059052  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2406-143-29)  
Test Lab: INNOVATION CENTER  
Issue Date: 8/7/2025  
Manufacturer: COOPER LIGHTING SOLUTIONS  
Product Line: NEO-RAY  
Catalog Number: S123RDR-S1000D930-X4F0-XX-UDD-SVL-B  
Description: DEFINE 3 BLACK REGRESSED DIRECT RECESSED HOUSING WITH SILVER STRAIGHT BLADE LOUVER WITH DIFFUSER  
CORE LIGHT ENGINE  
Light Source: 3000K CCT, 90 CRI LEDS  
Ballast/Driver: -

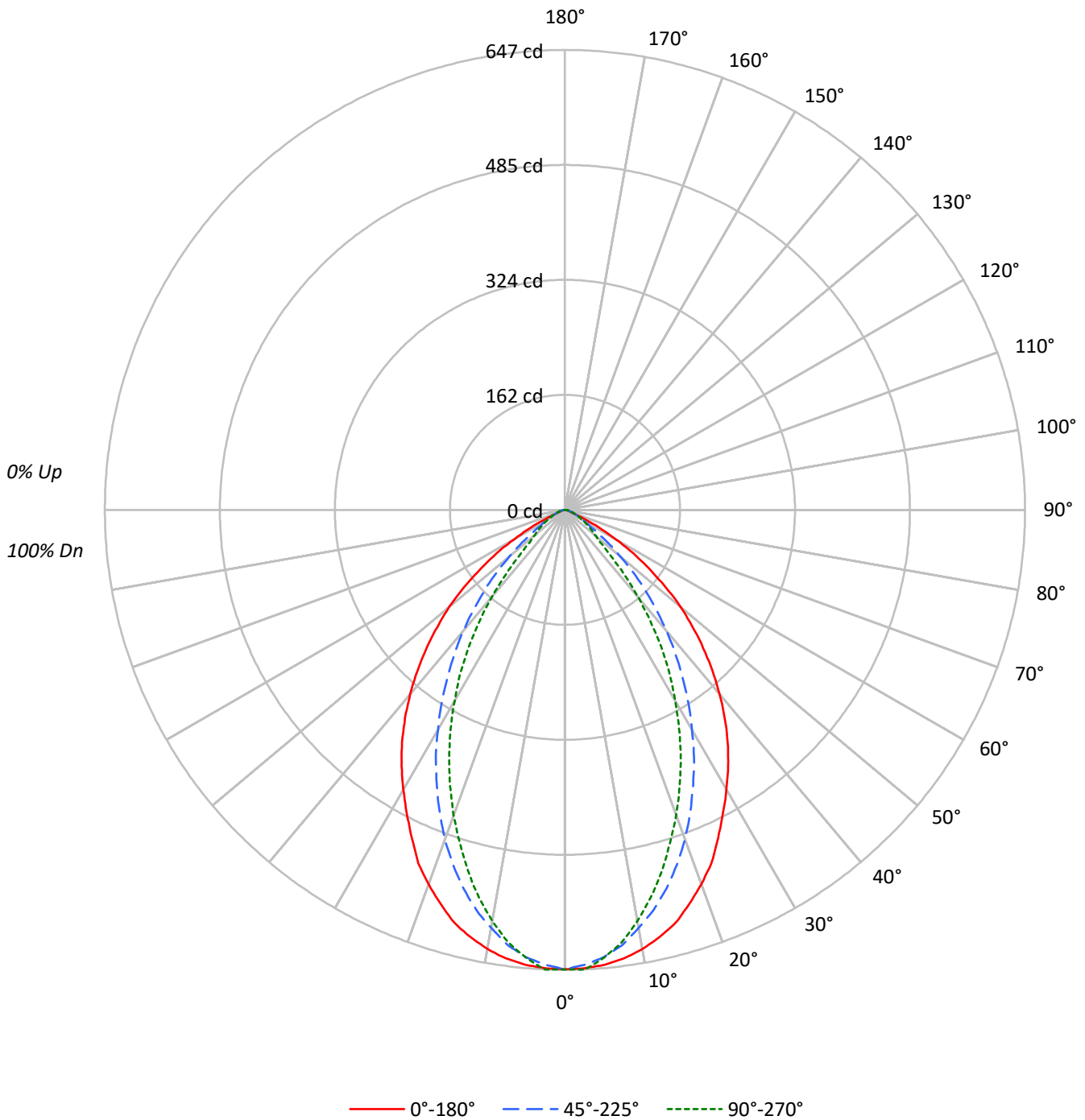
**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 834.5 lumens  
Efficiency: N/A  
Efficacy: 23.8 lumens/watt  
Spacing Criteria (0/90/45): 1.08 / 0.85 / 0.98  
Luminous Opening: Rectangular (W 0.23' x L: 4' x H: 0')  
CIE Type: Direct  
  
Input Watts (W): 35  
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	112	109	106	103	110	107	104	102	103	100	98	99	97	95	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	71	79	74	70	77	73	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	58	68	62	57	66	61	57	65	60	56	55
7	76	65	58	53	74	64	57	53	63	57	52	61	56	52	60	55	52	50
8	71	60	53	48	70	60	53	48	58	52	48	57	52	48	56	51	48	46
9	67	56	49	45	66	56	49	44	55	49	44	54	48	44	53	48	44	42
10	64	52	46	41	63	52	46	41	51	45	41	50	45	41	49	44	41	39

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

	0°	45°	90°
0°	7590	7590	7590
5°	7572	7442	7454
10°	7481	7123	7004
15°	7311	6703	6398
20°	7003	6164	5714
25°	6599	5523	4991
30°	6160	4843	4206
35°	5724	4131	3386
40°	5184	3404	2454
45°	4570	2642	1480
50°	3875	1847	1005
55°	2950	1106	839
60°	1928	705	658
65°	806	528	528
70°	275	378	412
75°	227	272	318
80°	135	203	270
85°	135	135	269

**MAXIMUM LUMINANCE 45°-90°:**

Horizontal Angle: 0°  
 Vertical Angle: 45°  
 Luminance: 4570 cd/sqm



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	59.7	7.2
10°-20°	156.2	18.7
20°-30°	200.4	24.0
30°-40°	188.0	22.5
40°-50°	131.2	15.7
50°-60°	67.8	8.1
60°-70°	23.2	2.8
70°-80°	6.6	0.8
80°-90°	1.4	0.2
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°	416.3	49.9
0°-40°	604.3	72.4
0°-60°	803.3	96.3
0°-90°	834.5	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	834.5	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	646	646	646	646	646	
5°	642	641	631	634	632	61
15°	601	586	551	533	526	169
25°	509	477	426	397	385	234
35°	399	350	288	251	236	249
45°	275	225	159	110	89	212
55°	144	108	54	42	41	130
65°	29	25	19	18	19	34
75°	5	5	6	7	7	5
85°	1	1	1	1	2	1
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	646.4	646.4	646.4	646.4	646.4
2.5°	645.4	646.4	640.4	646.4	647.4
5°	642.4	641.4	631.4	634.4	632.4
7.5°	636.4	633.4	617.4	613.4	613.4
10°	627.4	621.4	597.4	590.4	587.4
12.5°	615.4	607.4	576.4	563.4	558.4
15°	601.4	586.4	551.4	533.3	526.3
17.5°	581.4	561.4	523.3	502.3	491.3
20°	560.4	535.3	493.3	468.3	457.3
22.5°	538.3	508.3	460.3	433.3	421.3
25°	509.3	477.3	426.3	397.3	385.2
27.5°	481.3	447.3	393.3	360.2	348.2
30°	454.3	414.3	357.2	325.2	310.2
32.5°	427.3	382.2	323.2	288.2	274.2
35°	399.3	350.2	288.2	251.2	236.2
37.5°	369.2	319.2	255.2	215.1	197.1
40°	338.2	286.2	222.1	177.1	160.1
42.5°	307.2	256.2	189.1	143.1	123.1
45°	275.2	225.1	159.1	110.1	89.1
47.5°	243.2	194.1	130.1	80.1	67.0
50°	212.1	165.1	101.1	59.0	55.0
52.5°	178.1	137.1	76.0	49.0	48.0
55°	144.1	108.1	54.0	42.0	41.0
57.5°	114.1	84.1	39.0	35.0	34.0
60°	82.1	60.0	30.0	29.0	28.0
62.5°	54.0	41.0	24.0	23.0	23.0
65°	29.0	25.0	19.0	18.0	19.0
67.5°	12.0	14.0	14.0	15.0	15.0
70°	8.0	9.0	11.0	12.0	12.0
72.5°	6.0	7.0	8.0	9.0	9.0
75°	5.0	5.0	6.0	7.0	7.0
77.5°	3.0	4.0	4.0	5.0	6.0
80°	2.0	3.0	3.0	4.0	4.0
82.5°	1.0	2.0	2.0	3.0	3.0
85°	1.0	1.0	1.0	1.0	2.0
87.5°	0.0	0.0	0.0	0.0	1.0
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)