

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: P1059242

Luminaire Tested: S123RDR-S340D950-X4F0-XX-UDD-SVL-S

Issue Date: 8/7/2025

**Test Information**

Test Method: LM-79-2019  
Report Number: P1059242  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2406-143-68)  
Test Lab: INNOVATION CENTER  
Issue Date: 8/7/2025  
Manufacturer: COOPER LIGHTING SOLUTIONS  
Product Line: NEO-RAY  
Catalog Number: S123RDR-S340D950-X4F0-XX-UDD-SVL-S  
Description: DEFINE 3 SILVER REGRESSED DIRECT RECESSED HOUSING WITH SILVER STRAIGHT BLADE LOUVER WITH DIFFUSER  
CORE LIGHT ENGINE  
Light Source: 5000K CCT, 90 CRI LEDS  
Ballast/Driver: -

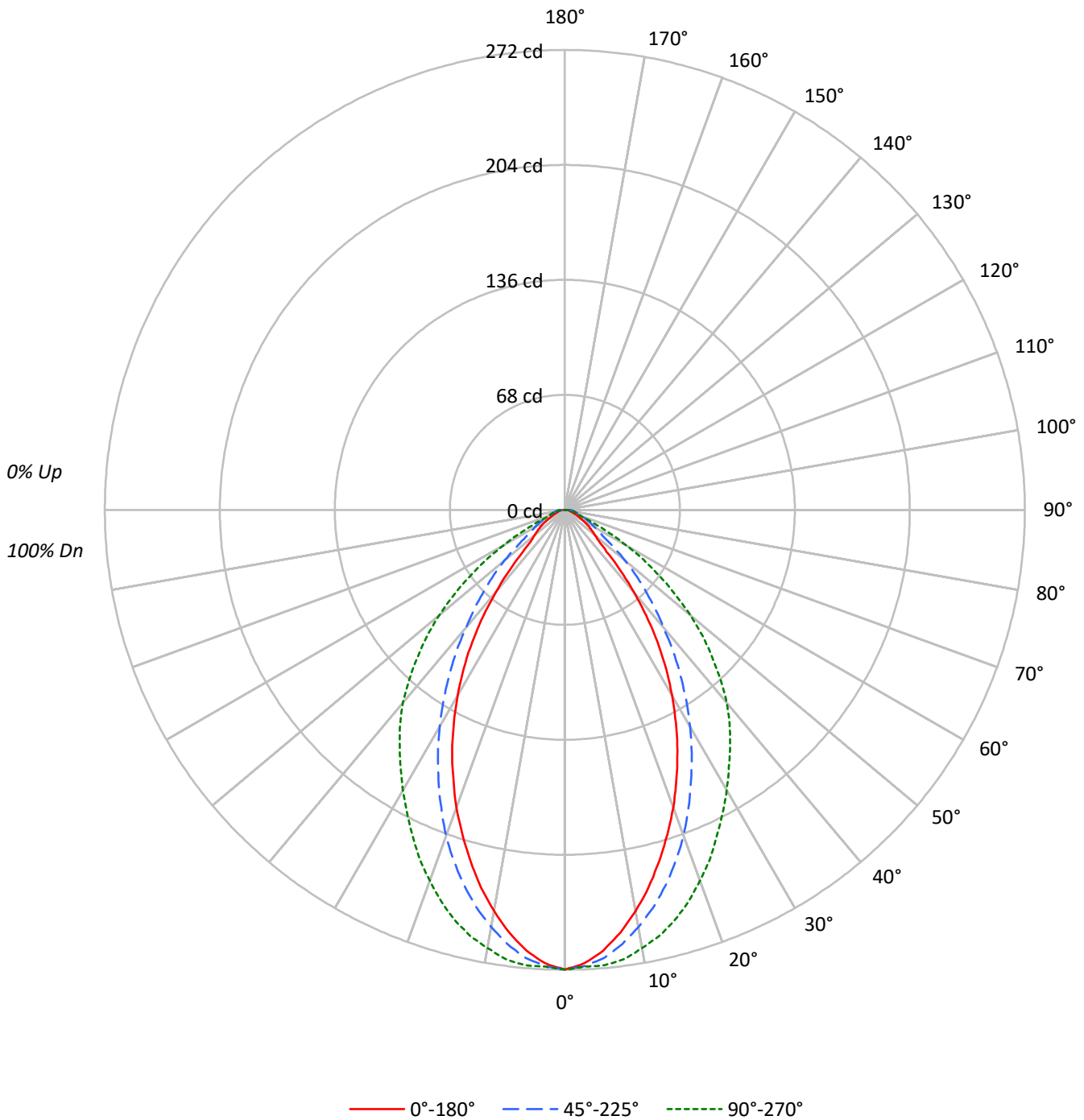
**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 364.2 lumens  
Efficiency: N/A  
Efficacy: 29.1 lumens/watt  
Spacing Criteria (0/90/45): 0.83 / 1.07 / 0.98  
Luminous Opening: Rectangular (W 0.23' 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	105	102	109	106	103	100	101	99	97	98	96	94	94	93	91	89
2	104	98	92	88	102	96	91	87	92	88	85	89	86	83	86	84	81	79
3	97	89	82	77	95	87	81	77	84	79	75	82	78	74	79	76	73	71
4	91	81	74	69	88	80	73	68	77	72	67	75	70	66	73	69	66	64
5	85	74	67	61	83	73	66	61	71	65	61	69	64	60	68	63	59	58
6	79	68	61	56	78	67	60	55	66	60	55	64	59	54	63	58	54	52
7	74	63	56	51	73	62	55	50	61	55	50	60	54	50	58	53	49	48
8	70	58	51	46	69	58	51	46	57	50	46	56	50	46	54	49	45	44
9	66	54	47	43	65	54	47	43	53	47	42	52	46	42	51	46	42	40
10	62	51	44	39	61	50	44	39	50	43	39	49	43	39	48	43	39	37

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

	0°	45°	90°
0°	3193	3193	3193
5°	3084	3135	3187
10°	2874	2987	3138
15°	2616	2795	3055
20°	2342	2565	2917
25°	2042	2289	2757
30°	1717	2008	2595
35°	1366	1702	2441
40°	973	1387	2282
45°	580	1114	2044
50°	427	848	1770
55°	358	577	1406
60°	289	474	989
65°	231	408	531
70°	192	354	326
75°	181	340	304
80°	189	379	298
85°	269	539	377

**MAXIMUM LUMINANCE 45°-90°:**

Horizontal Angle: 90°  
 Vertical Angle: 45°  
 Luminance: 2044 cd/sqm



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	25.0	6.9
10°-20°	64.9	17.8
20°-30°	82.8	22.7
30°-40°	77.9	21.4
40°-50°	56.0	15.4
50°-60°	32.1	8.8
60°-70°	14.7	4.0
70°-80°	7.4	2.0
80°-90°	3.6	1.0
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°	172.7	47.4
0°-40°	250.5	68.8
0°-60°	338.6	93.0
0°-90°	364.2	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	364.2	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	272	272	272	272	272	
5°	262	267	266	268	270	24
15°	215	223	230	242	251	60
25°	158	165	177	196	213	72
35°	95	102	119	146	170	59
45°	35	42	67	99	123	29
55°	18	18	28	52	69	16
65°	8	12	15	16	19	8
75°	4	8	8	7	7	4
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°	271.9	271.9	271.9	271.9	271.9
2.5°	268.4	272.3	270.0	270.0	270.4
5°	261.6	266.8	266.0	268.0	270.4
7.5°	252.1	257.7	259.2	264.0	268.0
10°	241.0	247.3	250.5	258.1	263.2
12.5°	228.7	235.8	241.0	250.5	258.1
15°	215.2	222.7	229.9	242.2	251.3
17.5°	201.3	208.8	218.0	232.2	243.0
20°	187.4	194.9	205.3	220.3	233.4
22.5°	172.3	179.8	191.0	208.0	223.9
25°	157.6	164.8	176.7	195.7	212.8
27.5°	142.1	149.3	162.4	183.0	202.1
30°	126.6	133.8	148.1	170.3	191.4
32.5°	111.2	117.9	133.4	158.0	180.6
35°	95.3	102.0	118.7	145.7	170.3
37.5°	79.0	85.8	105.2	134.6	160.0
40°	63.5	71.1	90.5	123.5	148.9
42.5°	48.4	56.4	78.6	111.6	136.2
45°	34.9	42.5	67.1	98.9	123.1
47.5°	26.6	30.6	56.8	86.2	110.4
50°	23.4	23.8	46.4	74.6	96.9
52.5°	20.2	20.6	36.1	63.5	82.6
55°	17.5	17.9	28.2	52.0	68.7
57.5°	14.7	15.5	23.0	41.3	55.2
60°	12.3	13.9	20.2	31.4	42.1
62.5°	9.9	12.7	17.5	23.0	30.2
65°	8.3	11.5	14.7	16.3	19.1
67.5°	6.7	10.7	12.3	11.5	11.5
70°	5.6	9.5	10.3	9.5	9.5
72.5°	4.8	9.1	8.7	7.9	7.9
75°	4.0	7.9	7.5	6.7	6.7
77.5°	3.6	6.7	6.4	6.0	5.6
80°	2.8	5.6	5.6	5.2	4.4
82.5°	2.4	4.8	4.8	4.4	3.6
85°	2.0	4.0	4.0	3.6	2.8
87.5°	1.6	3.6	3.6	3.2	2.0
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)