

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: P1059050

Luminaire Tested: S123RDR-S1000D930-X4F0-XX-UDD-BVL-S

Issue Date: 8/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1059050
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2406-143-69)
Test Lab: INNOVATION CENTER
Issue Date: 8/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S123RDR-S1000D930-X4F0-XX-UDD-BVL-S
Description: DEFINE 3 SILVER REGRESSED DIRECT RECESSED HOUSING WITH BLACK STRAIGHT BLADE LOUVER WITH DIFFUSER
CORE LIGHT ENGINE
Light Source: 3000K CCT, 90 CRI LEDS
Ballast/Driver: -

Summary

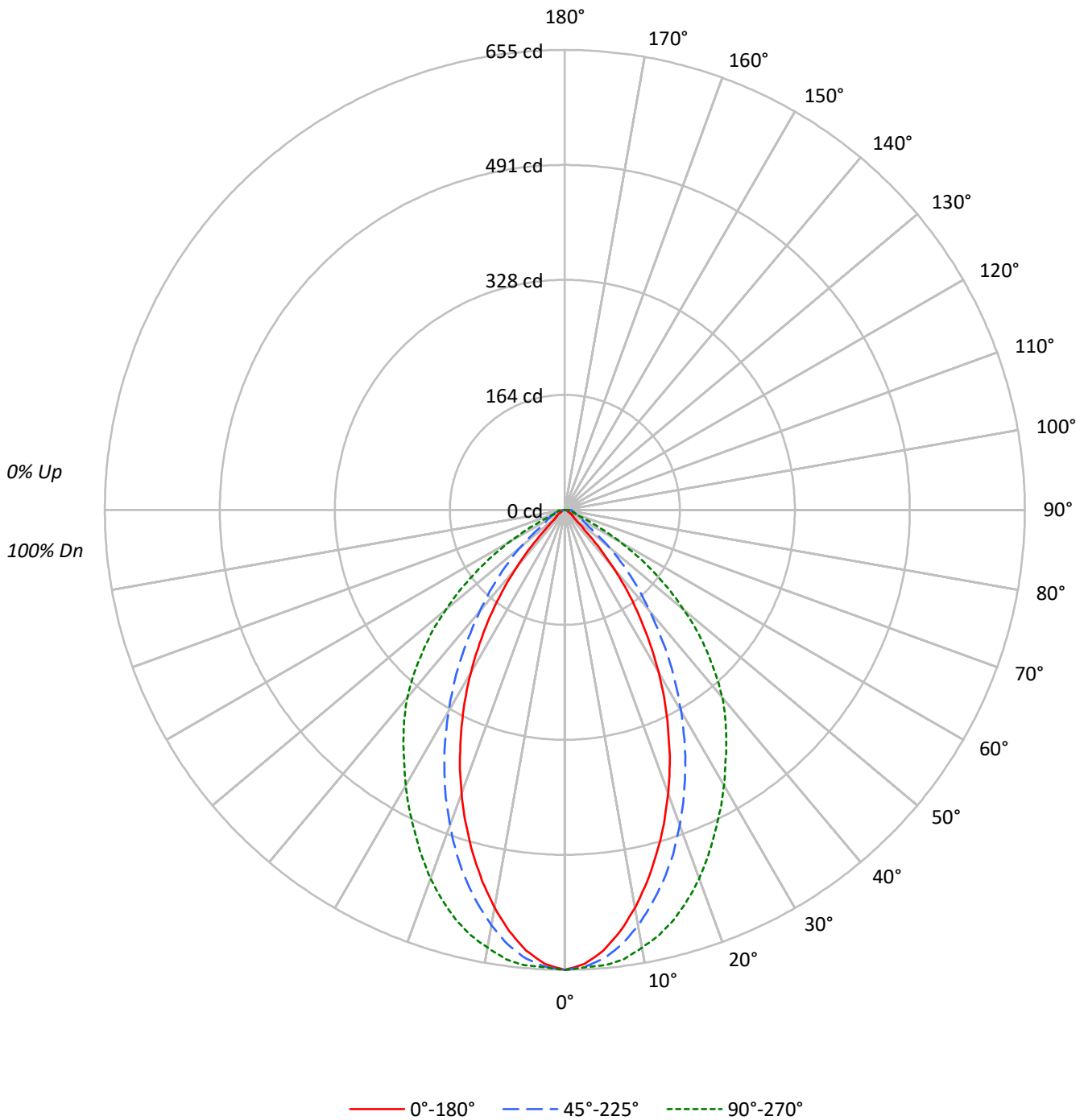
Lumens per Lamp: N/A
Luminaire Lumens: 787.0 lumens
Efficiency: N/A
Efficacy: 22.5 lumens/watt
Spacing Criteria (0/90/45): 0.79 / 1.06 / 0.94
Luminous Opening: Rectangular (W 0.23' x L: 4' x H: 0')
CIE Type: Direct

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	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	108	105	102	109	106	103	101	102	100	98	98	96	95	95	93	92	90				
2	105	99	94	89	102	97	92	88	94	90	86	90	87	85	88	85	83	81				
3	98	90	84	79	96	89	83	78	86	81	77	83	79	76	81	78	75	73				
4	92	83	76	71	90	81	75	70	79	74	69	77	72	69	75	71	68	66				
5	86	76	69	64	84	75	68	64	73	67	63	71	66	62	70	65	62	60				
6	81	70	63	58	79	69	63	58	68	62	57	66	61	57	65	60	57	55				
7	76	65	58	53	75	64	58	53	63	57	53	62	56	52	61	56	52	50				
8	72	61	54	49	70	60	53	49	59	53	48	58	52	48	57	52	48	46				
9	68	57	50	45	67	56	50	45	55	49	45	54	49	45	53	48	45	43				
10	64	53	46	42	63	53	46	42	52	46	42	51	45	42	50	45	41	40				

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	7694	7694	7694
5°	7428	7558	7676
10°	6857	7167	7550
15°	6151	6625	7332
20°	5371	5972	6987
25°	4518	5258	6556
30°	3627	4483	6141
35°	2658	3691	5745
40°	1643	2873	5345
45°	633	2162	4758
50°	311	1483	4026
55°	246	821	3159
60°	164	683	2118
65°	139	611	947
70°	137	549	549
75°	181	590	544
80°	270	744	609
85°	404	1213	808

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°
 Vertical Angle: 45°
 Luminance: 4758 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	60.1	7.6
10°-20°	153.8	19.5
20°-30°	190.9	24.3
30°-40°	171.0	21.7
40°-50°	112.4	14.3
50°-60°	56.3	7.2
60°-70°	22.2	2.8
70°-80°	12.4	1.6
80°-90°	7.8	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°	404.8	51.4
0°-40°	575.8	73.2
0°-60°	744.6	94.6
0°-90°	787.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	787.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	655	655	655	655	655	
5°	630	640	641	645	651	58
15°	506	522	545	582	603	141
25°	349	371	406	463	506	159
35°	185	210	258	337	401	115
45°	38	63	130	219	286	36
55°	12	14	40	108	154	11
65°	5	14	22	28	34	5
75°	4	13	13	12	12	4
85°	3	9	9	9	6	3
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	655.2	655.2	655.2	655.2	655.2
2.5°	647.2	656.2	651.2	651.2	652.2
5°	630.2	640.2	641.2	645.2	651.2
7.5°	605.2	618.2	624.2	636.2	645.2
10°	575.1	589.1	601.1	622.2	633.2
12.5°	542.0	556.1	574.1	603.1	620.2
15°	506.0	522.0	545.0	582.1	603.1
17.5°	468.9	484.9	513.0	555.1	582.1
20°	429.8	447.9	477.9	526.0	559.1
22.5°	390.7	410.8	442.8	494.9	533.0
25°	348.7	370.7	405.8	462.9	506.0
27.5°	308.6	331.6	368.7	430.8	479.9
30°	267.5	290.6	330.6	397.8	452.9
32.5°	225.4	251.5	293.6	366.7	425.8
35°	185.4	210.4	257.5	336.6	400.8
37.5°	146.3	171.3	220.4	307.6	375.7
40°	107.2	133.3	187.4	279.5	348.7
42.5°	70.1	97.2	158.3	251.5	318.6
45°	38.1	63.1	130.2	219.4	286.5
47.5°	21.0	34.1	105.2	189.4	255.5
50°	17.0	19.0	81.2	161.3	220.4
52.5°	14.0	16.0	58.1	134.3	188.4
55°	12.0	14.0	40.1	108.2	154.3
57.5°	10.0	12.0	32.1	83.2	121.2
60°	7.0	12.0	29.1	61.1	90.2
62.5°	6.0	12.0	25.0	42.1	60.1
65°	5.0	14.0	22.0	28.1	34.1
67.5°	4.0	14.0	19.0	18.0	18.0
70°	4.0	14.0	16.0	15.0	16.0
72.5°	4.0	15.0	15.0	14.0	14.0
75°	4.0	13.0	13.0	12.0	12.0
77.5°	4.0	12.0	12.0	11.0	11.0
80°	4.0	11.0	11.0	10.0	9.0
82.5°	4.0	10.0	10.0	9.0	8.0
85°	3.0	9.0	9.0	9.0	6.0
87.5°	3.0	8.0	9.0	8.0	5.0
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)