

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: P1059072

Luminaire Tested: S123RDR-S1000D940-X4F0-XX-UDD-SVL-W

Issue Date: 8/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1059072
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2406-143-65)
Test Lab: INNOVATION CENTER
Issue Date: 8/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S123RDR-S1000D940-X4F0-XX-UDD-SVL-W
Description: DEFINE 3 WHITE REGRESSED DIRECT RECESSED HOUSING WITH SILVER STRAIGHT BLADE
LOUVER WITH DIFFUSER
CORE LIGHT ENGINE
Light Source: 4000K CCT, 90 CRI LEDS
Ballast/Driver: -

Summary

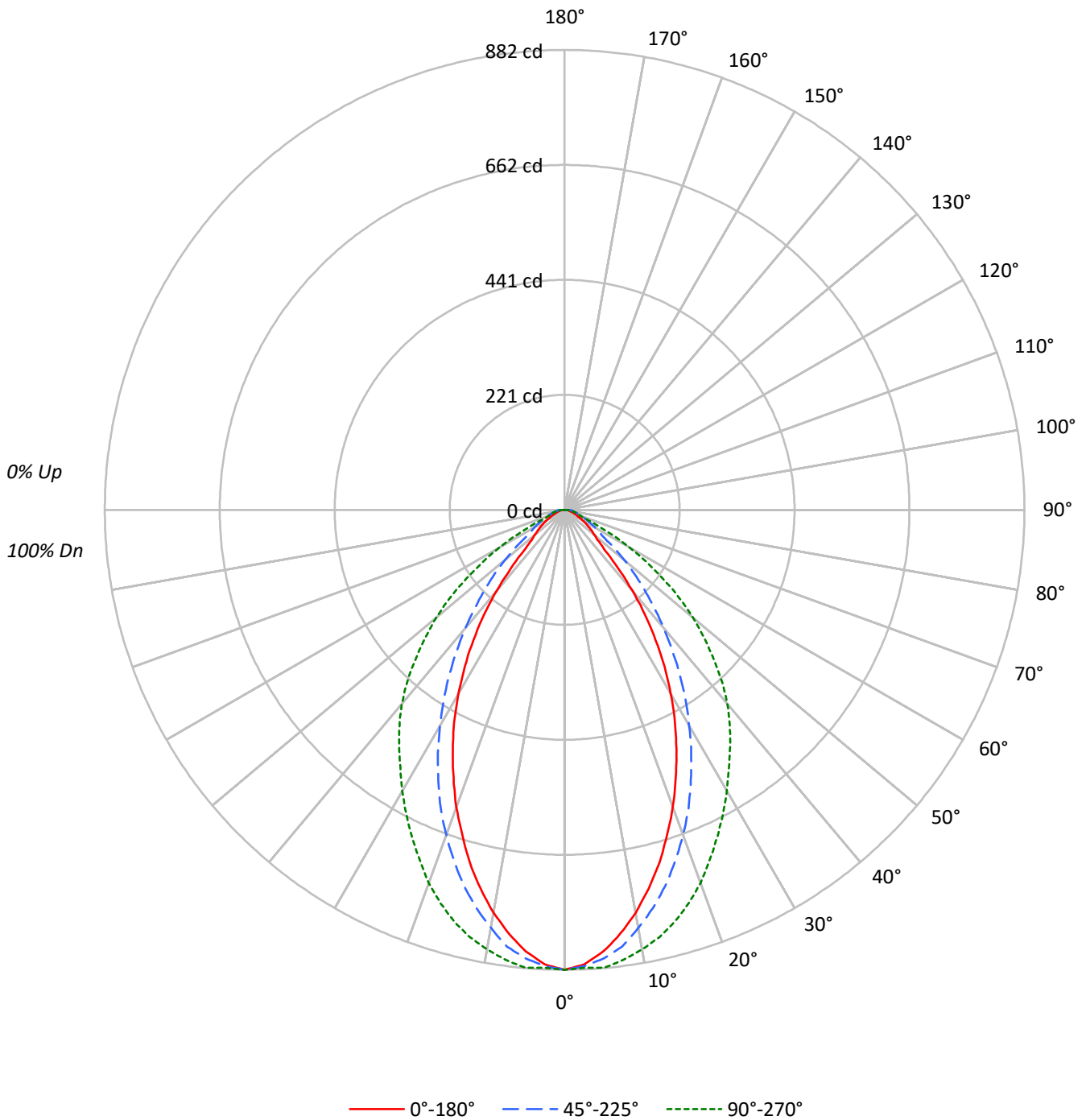
Lumens per Lamp: N/A
Luminaire Lumens: 1184.2 lumens
Efficiency: N/A
Efficacy: 33.8 lumens/watt
Spacing Criteria (0/90/45): 0.83 / 1.08 / 0.98
Luminous Opening: Rectangular (W 0.23' x L: 4' x H: 0')
CIE Type: Direct

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	111	108	105	102	109	106	103	100	102	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	90	81	74	68	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	60	69	64	60	68	63	59	58
6	79	68	61	55	78	67	60	55	66	59	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	55	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	49	43	39	49	43	39	48	43	39	37

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	10359	10359	10359
5°	10024	10178	10386
10°	9355	9708	10205
15°	8525	9073	9938
20°	7586	8299	9517
25°	6574	7425	8974
30°	5513	6478	8439
35°	4366	5513	7933
40°	3090	4536	7442
45°	1820	3585	6697
50°	1361	2722	5866
55°	1144	1840	4711
60°	928	1569	3347
65°	731	1339	1767
70°	639	1167	1092
75°	599	1093	1043
80°	595	1183	1035
85°	741	1778	1334

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°
 Vertical Angle: 45°
 Luminance: 6697 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	81.2	6.9
10°-20°	211.0	17.8
20°-30°	268.7	22.7
30°-40°	252.7	21.3
40°-50°	182.0	15.4
50°-60°	105.1	8.9
60°-70°	48.1	4.1
70°-80°	24.0	2.0
80°-90°	11.4	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°	560.9	47.4
0°-40°	813.6	68.7
0°-60°	1100.8	93.0
0°-90°	1184.2	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1184.2	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	882	882	882	882	882	
5°	850	865	864	872	881	79
15°	701	727	746	788	818	195
25°	507	534	573	637	693	232
35°	305	331	385	473	553	189
45°	110	137	216	324	403	93
55°	56	58	90	171	230	50
65°	26	37	48	54	64	27
75°	13	25	24	23	23	14
85°	6	12	13	12	10	6
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	882.2	882.2	882.2	882.2	882.2
2.5°	872.3	883.3	875.6	876.7	878.9
5°	850.4	864.6	863.5	872.3	881.1
7.5°	819.7	836.1	844.9	858.1	870.1
10°	784.6	803.3	814.2	838.3	855.9
12.5°	744.1	768.2	782.4	814.2	839.4
15°	701.3	726.6	746.3	787.9	817.5
17.5°	653.1	680.5	705.7	755.0	791.2
20°	607.1	633.4	664.1	717.8	761.6
22.5°	556.7	585.2	620.3	677.2	726.6
25°	507.4	533.7	573.1	636.7	692.6
27.5°	458.1	484.4	526.0	596.1	657.5
30°	406.6	434.0	477.8	555.6	622.4
32.5°	356.2	382.5	431.8	516.1	586.3
35°	304.6	330.9	384.6	473.4	553.4
37.5°	254.2	281.6	338.6	438.3	520.5
40°	201.6	231.2	295.9	402.2	485.5
42.5°	152.3	184.1	253.1	364.9	447.1
45°	109.6	137.0	215.9	324.4	403.3
47.5°	85.5	99.7	181.9	282.7	362.7
50°	74.5	76.7	149.0	244.4	321.1
52.5°	64.7	66.8	117.3	208.2	277.3
55°	55.9	58.1	89.9	171.0	230.1
57.5°	47.1	50.4	74.5	135.9	185.2
60°	39.5	43.8	66.8	104.1	142.5
62.5°	31.8	39.5	57.0	76.7	101.9
65°	26.3	37.3	48.2	53.7	63.6
67.5°	21.9	34.0	40.5	38.4	37.3
70°	18.6	30.7	34.0	30.7	31.8
72.5°	15.3	28.5	28.5	26.3	26.3
75°	13.2	25.2	24.1	23.0	23.0
77.5°	11.0	21.9	20.8	19.7	18.6
80°	8.8	17.5	17.5	16.4	15.3
82.5°	7.7	14.2	14.2	14.2	12.1
85°	5.5	12.1	13.2	12.1	9.9
87.5°	4.4	11.0	11.0	9.9	6.6
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)