

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: P1059143

Luminaire Tested: S123RDR-S1165D935-X4F0-XX-UDD-SVL-S

Issue Date: 8/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1059143
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-S1165D935-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: 3500K CCT, 90 CRI LEDS
Ballast/Driver: -

Summary

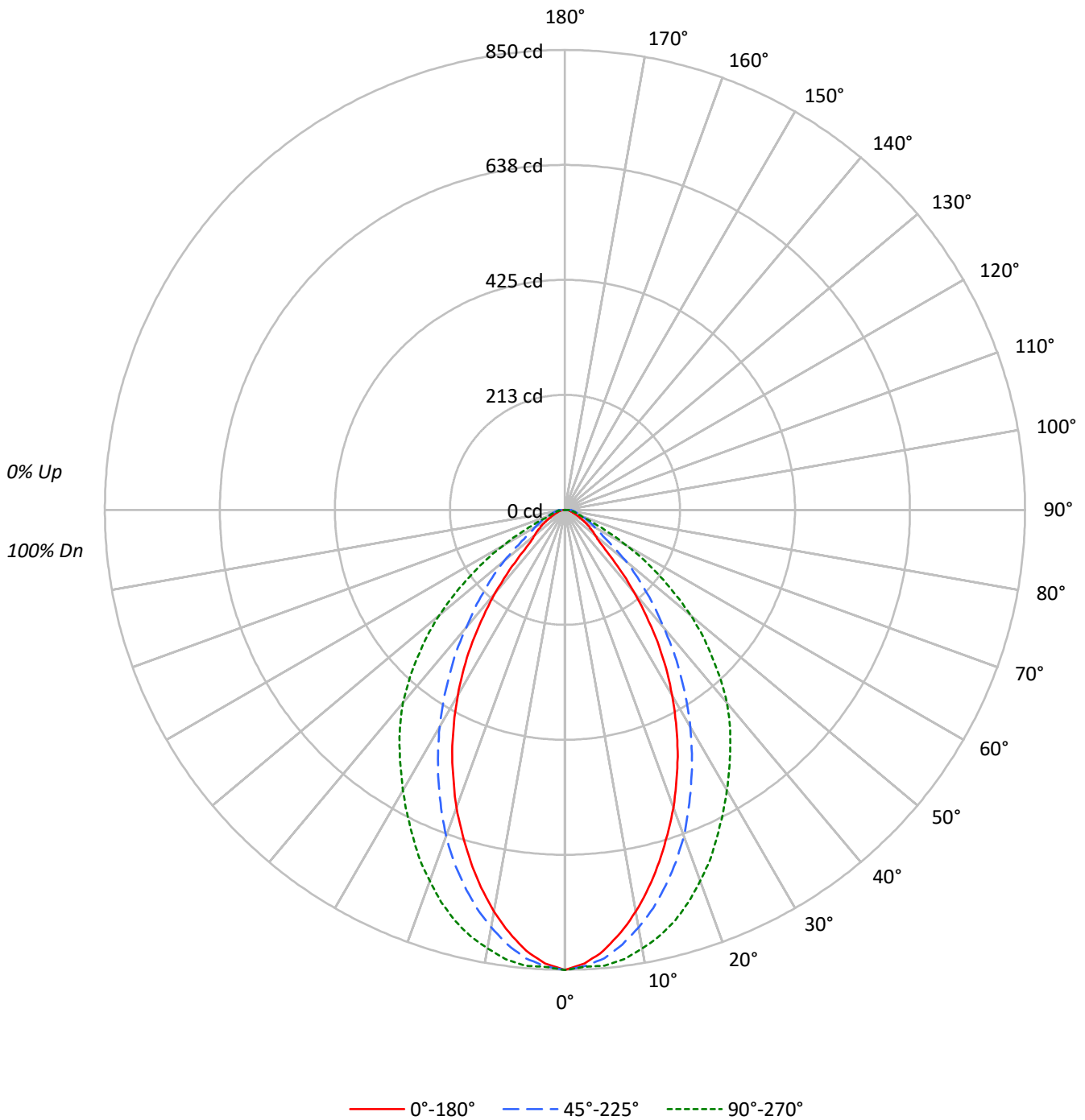
Lumens per Lamp: N/A
Luminaire Lumens: 1138.9 lumens
Efficiency: N/A
Efficacy: 27.2 lumens/watt
Spacing Criteria (0/90/45): 0.83 / 1.07 / 0.98
Luminous Opening: Rectangular (W 0.23' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 41.8
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				100
1	111	108	105	102	109	106	103	100	101	99	97	98	96	94	94	93	91	89				89
2	104	98	92	88	102	96	91	87	92	88	85	89	86	83	86	84	81	79				79
3	97	89	82	77	95	87	81	77	84	79	75	82	78	74	79	76	73	71				71
4	91	81	74	69	88	80	73	68	77	72	67	75	70	66	73	69	66	64				64
5	85	74	67	61	83	73	66	61	71	65	61	69	64	60	68	63	59	58				58
6	79	68	61	56	78	67	60	55	66	60	55	64	59	54	63	58	54	52				52
7	74	63	56	51	73	62	55	50	61	55	50	60	54	50	58	53	49	48				48
8	70	58	51	46	69	58	51	46	57	50	46	56	50	46	54	49	45	44				44
9	66	54	47	43	65	54	47	43	53	47	42	52	46	42	51	46	42	40				40
10	62	51	44	39	61	50	44	39	50	43	39	49	43	39	48	43	39	37				37

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	9986	9986	9986
5°	9643	9805	9966
10°	8986	9341	9814
15°	8180	8738	9554
20°	7323	8021	9122
25°	6386	7158	8621
30°	5369	6279	8114
35°	4272	5321	7635
40°	3044	4340	7137
45°	1815	3484	6392
50°	1337	2654	5533
55°	1118	1804	4397
60°	904	1487	3091
65°	725	1275	1656
70°	597	1109	1023
75°	563	1071	957
80°	588	1177	926
85°	835	1671	1172

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°
 Vertical Angle: 45°
 Luminance: 6392 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	78.1	6.9
10°-20°	202.9	17.8
20°-30°	258.9	22.7
30°-40°	243.5	21.4
40°-50°	175.0	15.4
50°-60°	100.3	8.8
60°-70°	45.9	4.0
70°-80°	23.1	2.0
80°-90°	11.3	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°	539.9	47.4
0°-40°	783.5	68.8
0°-60°	1058.8	93.0
0°-90°	1138.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1138.9	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	850	850	850	850	850	
5°	818	834	832	838	846	76
15°	673	696	719	757	786	188
25°	493	515	552	612	665	225
35°	298	319	371	456	533	184
45°	109	133	210	309	385	92
55°	55	56	88	163	215	49
65°	26	36	46	51	60	26
75°	12	25	24	21	21	14
85°	6	12	12	11	9	6
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	850.4	850.4	850.4	850.4	850.4
2.5°	839.3	851.7	844.2	844.2	845.5
5°	818.1	834.3	831.8	838.0	845.5
7.5°	788.4	805.7	810.7	825.6	838.0
10°	753.6	773.5	783.4	807.0	823.1
12.5°	715.1	737.5	753.6	783.4	807.0
15°	672.9	696.5	718.8	757.3	785.9
17.5°	629.4	653.0	681.6	726.3	759.8
20°	586.0	609.6	641.9	689.0	730.0
22.5°	538.8	562.4	597.2	650.5	700.2
25°	492.9	515.2	552.5	612.1	665.4
27.5°	444.5	466.8	507.8	572.3	631.9
30°	396.0	418.4	463.1	532.6	598.4
32.5°	347.6	368.7	417.1	494.1	564.9
35°	298.0	319.1	371.2	455.6	532.6
37.5°	247.1	268.2	329.0	420.9	500.3
40°	198.6	222.2	283.1	386.1	465.6
42.5°	151.5	176.3	245.8	348.9	425.8
45°	109.3	132.8	209.8	309.1	384.9
47.5°	83.2	95.6	177.5	269.4	345.1
50°	73.2	74.5	145.3	233.4	302.9
52.5°	63.3	64.6	113.0	198.6	258.2
55°	54.6	55.9	88.1	162.6	214.8
57.5°	45.9	48.4	72.0	129.1	172.6
60°	38.5	43.5	63.3	98.1	131.6
62.5°	31.0	39.7	54.6	72.0	94.4
65°	26.1	36.0	45.9	50.9	59.6
67.5°	21.1	33.5	38.5	36.0	36.0
70°	17.4	29.8	32.3	29.8	29.8
72.5°	14.9	28.6	27.3	24.8	24.8
75°	12.4	24.8	23.6	21.1	21.1
77.5°	11.2	21.1	19.9	18.6	17.4
80°	8.7	17.4	17.4	16.1	13.7
82.5°	7.4	14.9	14.9	13.7	11.2
85°	6.2	12.4	12.4	11.2	8.7
87.5°	5.0	11.2	11.2	9.9	6.2
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)