

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: P1058126

Luminaire Tested: S122RDR-S865D835-X4F0-XX-UDD-SVL-S

Issue Date: 8/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1058126
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2406-143-59)
Test Lab: INNOVATION CENTER
Issue Date: 8/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S122RDR-S865D835-X4F0-XX-UDD-SVL-S
Description: DEFINE 2 SILVER REGRESSED DIRECT RECESSED HOUSING WITH SILVER STRAIGHT BLADE
LOUVER WITH DIFFUSER
CORE LIGHT ENGINE
Light Source: 3500K CCT, 80 CRI LEDS
Ballast/Driver: -

Summary

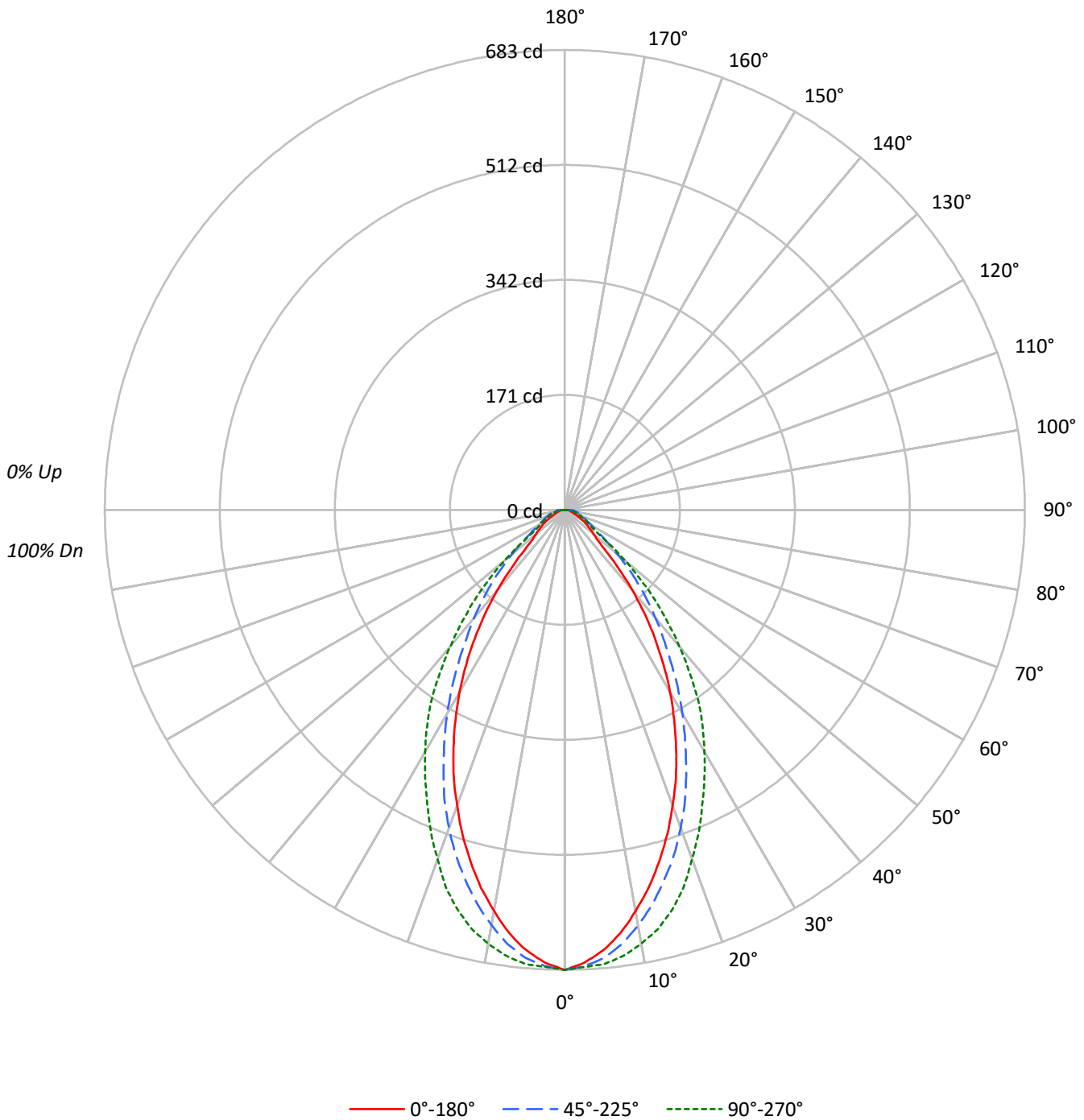
Lumens per Lamp: N/A
Luminaire Lumens: 824.1 lumens
Efficiency: N/A
Efficacy: 23.5 lumens/watt
Spacing Criteria (0/90/45): 0.82 / 0.97 / 0.94
Luminous Opening: Rectangular (W 0.15' x L: 4' x H: 0')
CIE Type: Direct

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
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	93	88	102	96	91	87	93	89	85	90	86	83	87	84	82	80		
3	97	89	83	78	95	88	82	77	85	80	76	82	78	75	80	77	74	72		
4	91	82	75	70	89	81	74	69	78	73	68	76	71	68	74	70	67	65		
5	86	75	68	63	84	74	68	63	72	66	62	71	65	61	69	64	61	59		
6	80	70	62	57	79	69	62	57	67	61	57	66	60	56	64	59	56	54		
7	76	65	57	52	74	64	57	52	62	56	52	61	56	52	60	55	51	50		
8	71	60	53	48	70	59	53	48	58	52	48	57	52	48	56	51	47	46		
9	67	56	49	45	66	56	49	44	55	49	44	54	48	44	53	48	44	42		
10	64	53	46	41	63	52	46	41	51	45	41	50	45	41	50	45	41	39		

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	12607	12607	12607
5°	12164	12373	12538
10°	11336	11737	12258
15°	10329	10883	11751
20°	9182	9875	10841
25°	7955	8673	9830
30°	6661	7438	8836
35°	5253	6161	7781
40°	3765	5039	6376
45°	2205	3980	4935
50°	1593	2894	3330
55°	1338	2069	1744
60°	1070	1675	1487
65°	882	1485	1375
70°	750	1430	1289
75°	720	1526	1255
80°	808	1870	1339
85°	1334	2943	1863

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°
 Vertical Angle: 45°
 Luminance: 4935 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	62.6	7.6
10°-20°	160.4	19.5
20°-30°	197.1	23.9
30°-40°	174.3	21.1
40°-50°	111.2	13.5
50°-60°	54.3	6.6
60°-70°	32.3	3.9
70°-80°	20.6	2.5
80°-90°	11.4	1.4
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°	420.1	51.0
0°-40°	594.3	72.1
0°-60°	759.8	92.2
0°-90°	824.1	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	824.1	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	683	683	683	683	683	
5°	657	671	668	671	677	61
15°	541	556	570	595	615	151
25°	391	405	426	452	483	179
35°	233	246	274	311	345	145
45°	84	108	152	171	189	71
55°	42	56	64	60	54	37
65°	20	38	34	32	32	20
75°	10	23	21	19	18	11
85°	6	13	14	13	9	6
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	683.2	683.2	683.2	683.2	683.2
2.5°	673.1	685.7	678.1	678.1	679.4
5°	656.7	670.6	668.0	670.6	676.9
7.5°	634.0	647.9	650.4	660.5	668.0
10°	605.0	618.9	626.4	642.8	654.2
12.5°	574.8	588.6	600.0	621.4	637.8
15°	540.7	555.9	569.7	594.9	615.1
17.5°	505.4	520.6	538.2	563.4	587.4
20°	467.6	481.5	502.9	526.9	552.1
22.5°	431.1	443.7	466.4	489.1	519.3
25°	390.7	404.6	426.0	452.5	482.8
27.5°	351.7	365.5	387.0	417.2	448.7
30°	312.6	325.2	349.1	380.7	414.7
32.5°	272.3	284.9	311.3	345.4	380.7
35°	233.2	245.8	273.5	311.3	345.4
37.5°	194.1	208.0	239.5	274.8	303.8
40°	156.3	172.7	209.2	239.5	264.7
42.5°	118.5	141.2	180.2	205.5	225.6
45°	84.5	108.4	152.5	171.4	189.1
47.5°	64.3	83.2	126.0	139.9	151.3
50°	55.5	68.1	100.8	110.9	116.0
52.5°	47.9	60.5	80.7	84.5	81.9
55°	41.6	55.5	64.3	60.5	54.2
57.5°	35.3	51.7	52.9	45.4	46.6
60°	29.0	46.6	45.4	39.1	40.3
62.5°	23.9	42.9	39.1	35.3	35.3
65°	20.2	37.8	34.0	31.5	31.5
67.5°	16.4	34.0	30.3	27.7	27.7
70°	13.9	30.3	26.5	23.9	23.9
72.5°	12.6	26.5	23.9	21.4	21.4
75°	10.1	22.7	21.4	18.9	17.6
77.5°	8.8	18.9	18.9	17.6	15.1
80°	7.6	16.4	17.6	15.1	12.6
82.5°	7.6	15.1	15.1	13.9	10.1
85°	6.3	12.6	13.9	12.6	8.8
87.5°	3.8	11.3	11.3	10.1	6.3
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)