

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: P1058038

Luminaire Tested: S122RDR-S675D830-X4F0-XX-UDD-WVL-B

Issue Date: 8/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1058038
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2406-143-19)
Test Lab: INNOVATION CENTER
Issue Date: 8/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S122RDR-S675D830-X4F0-XX-UDD-WVL-B
Description: DEFINE 2 BLACK REGRESSED DIRECT RECESSED HOUSING WITH WHITE STRAIGHT BLADE
LOUVER WITH DIFFUSER
CORE LIGHT ENGINE
Light Source: 3000K CCT, 80 CRI LEDS
Ballast/Driver: -

Summary

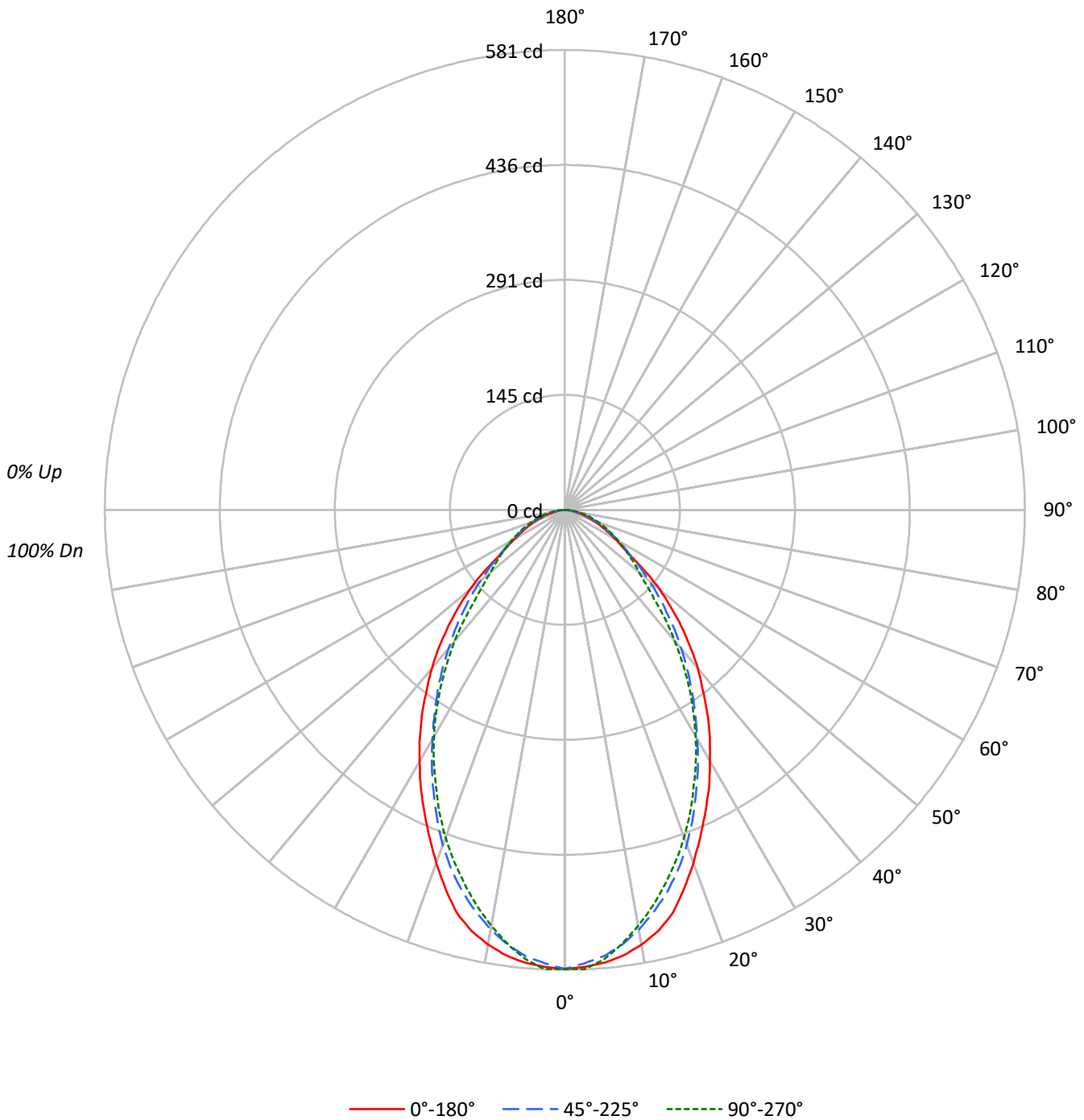
Lumens per Lamp: N/A
Luminaire Lumens: 880.6 lumens
Efficiency: N/A
Efficacy: 34.1 lumens/watt
Spacing Criteria (0/90/45): 1 / 0.92 / 1.02
Luminous Opening: Rectangular (W 0.15' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 25.8
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				
1	111	107	104	101	108	105	102	99	101	98	96	97	95	93	93	92	90	88				
2	103	96	91	86	100	94	89	85	91	87	83	88	84	81	85	82	79	77				
3	95	87	80	74	93	85	79	74	82	77	73	80	75	71	77	73	70	68				
4	89	79	71	65	87	77	70	65	75	69	64	73	68	63	71	66	63	61				
5	83	72	64	58	81	71	63	58	69	62	57	67	61	57	65	60	56	54				
6	77	66	58	52	75	65	57	52	63	56	52	61	56	51	60	55	51	49				
7	72	60	53	47	71	60	52	47	58	52	47	57	51	47	56	50	46	44				
8	68	56	48	43	66	55	48	43	54	47	43	53	47	43	52	46	42	41				
9	64	52	45	40	63	51	44	39	50	44	39	49	43	39	48	43	39	37				
10	60	48	41	36	59	48	41	36	47	41	36	46	40	36	45	40	36	34				

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	10701	10701	10701
5°	10638	10484	10553
10°	10450	10086	10000
15°	10071	9542	9349
20°	9320	8848	8648
25°	8553	7989	7839
30°	7811	7121	7044
35°	7071	6303	6156
40°	6294	5494	5205
45°	5423	4723	4167
50°	4478	3976	3499
55°	3236	3298	3150
60°	2690	2827	2864
65°	2297	2458	2620
70°	1894	2190	2390
75°	1583	1847	2174
80°	1180	1477	1966
85°	381	783	1757

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 5423 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	53.6	6.1
10°-20°	141.2	16.0
20°-30°	182.7	20.7
30°-40°	179.2	20.3
40°-50°	141.1	16.0
50°-60°	92.5	10.5
60°-70°	56.3	6.4
70°-80°	28.1	3.2
80°-90°	6.1	0.7
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°	377.4	42.9
0°-40°	556.6	63.2
0°-60°	790.1	89.7
0°-90°	880.6	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	880.6	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	580	580	580	580	580	
5°	574	574	566	570	570	54
15°	527	520	500	493	489	147
25°	420	406	392	391	385	193
35°	314	296	280	279	273	196
45°	208	195	181	168	160	160
55°	101	106	102	99	98	96
65°	53	54	56	59	60	52
75°	22	23	26	30	30	24
85°	2	3	4	6	8	4
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	579.9	579.9	579.9	579.9	579.9
2.5°	578.0	578.9	573.4	578.9	580.8
5°	574.3	574.3	566.0	569.7	569.7
7.5°	567.9	566.9	554.0	554.0	553.1
10°	557.7	554.0	538.3	535.5	533.7
12.5°	544.8	538.3	519.8	515.2	512.5
15°	527.2	519.8	499.5	493.1	489.4
17.5°	501.4	494.0	476.4	469.1	465.4
20°	474.6	463.5	450.6	444.1	440.4
22.5°	446.9	434.0	422.0	417.3	413.7
25°	420.1	406.3	392.4	390.6	385.0
27.5°	394.3	377.6	363.8	362.9	358.3
30°	366.6	349.0	334.2	335.2	330.6
32.5°	340.7	324.1	306.5	307.5	301.9
35°	313.9	296.4	279.8	278.8	273.3
37.5°	286.2	269.6	253.9	250.2	244.7
40°	261.3	244.7	228.1	221.6	216.1
42.5°	234.5	219.8	205.0	194.8	187.4
45°	207.8	194.8	181.0	168.0	159.7
47.5°	181.9	171.7	159.7	144.0	138.5
50°	156.0	148.7	138.5	124.7	121.9
52.5°	129.3	126.5	120.0	110.8	109.9
55°	100.6	106.2	102.5	98.8	97.9
57.5°	84.9	85.9	88.6	87.7	87.7
60°	72.9	72.9	76.6	77.6	77.6
62.5°	61.9	62.8	66.5	68.3	68.3
65°	52.6	53.6	56.3	59.1	60.0
67.5°	43.4	45.2	48.0	50.8	51.7
70°	35.1	36.9	40.6	43.4	44.3
72.5°	28.6	29.5	33.2	36.0	36.9
75°	22.2	23.1	25.9	29.5	30.5
77.5°	15.7	17.5	20.3	23.1	24.9
80°	11.1	12.0	13.9	17.5	18.5
82.5°	6.5	7.4	9.2	12.0	12.9
85°	1.8	2.8	3.7	6.5	8.3
87.5°	0.0	0.0	0.0	1.8	3.7
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)