

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: P1058096

Luminaire Tested: S122RDR-S675D940-X4F0-XX-UDD-BVL-S

Issue Date: 8/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1058096
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2406-143-60)
Test Lab: INNOVATION CENTER
Issue Date: 8/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S122RDR-S675D940-X4F0-XX-UDD-BVL-S
Description: DEFINE 2 SILVER REGRESSED DIRECT RECESSED HOUSING WITH BLACK STRAIGHT BLADE LOUVER WITH DIFFUSER
CORE LIGHT ENGINE
Light Source: 4000K CCT, 90 CRI LEDS
Ballast/Driver: -

Summary

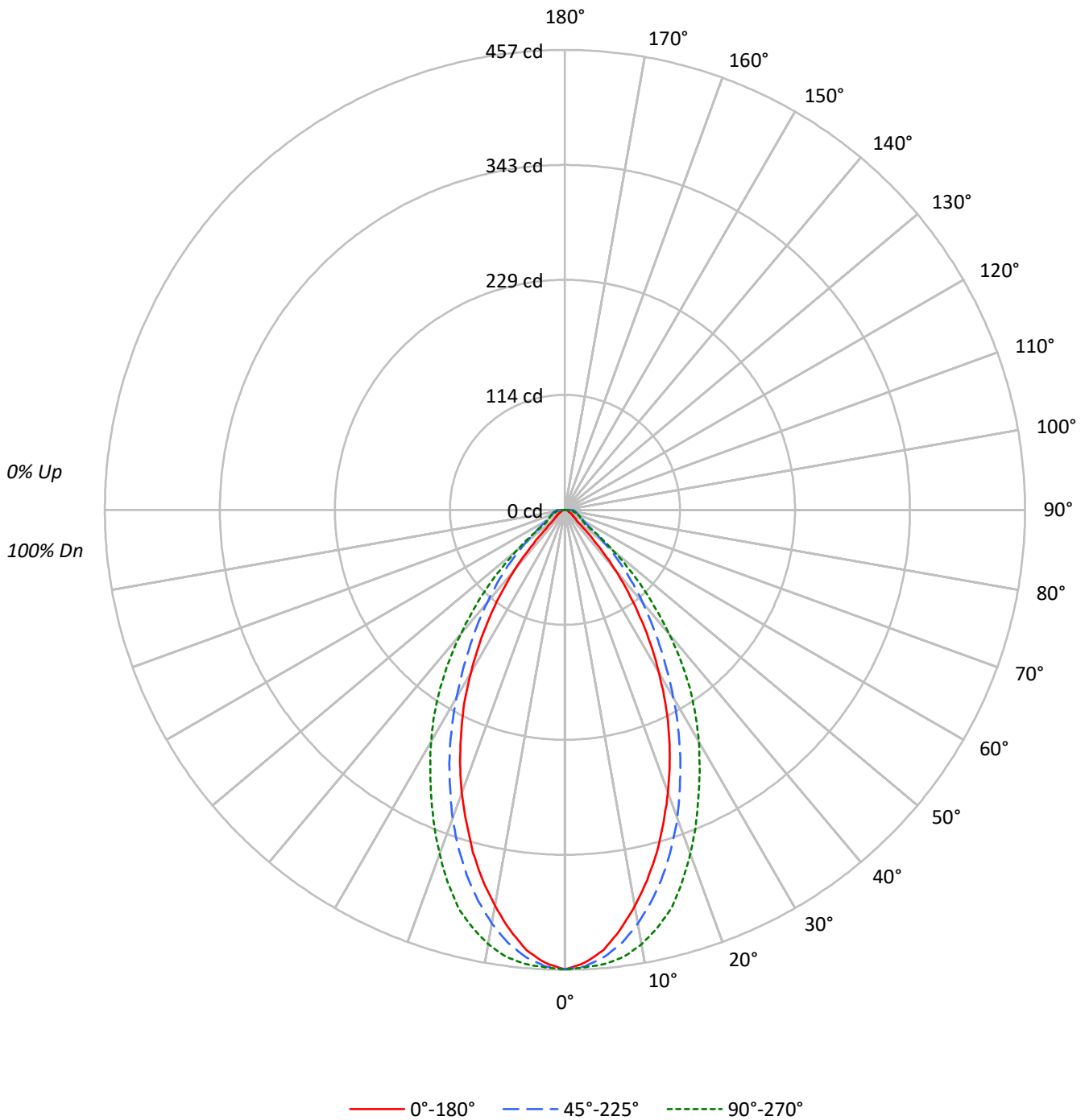
Lumens per Lamp: N/A
Luminaire Lumens: 492.2 lumens
Efficiency: N/A
Efficacy: 19.1 lumens/watt
Spacing Criteria (0/90/45): 0.79 / 0.95 / 0.9
Luminous Opening: Rectangular (W 0.15' x L: 4' x H: 0')
CIE Type: Direct

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	112	108	105	102	109	106	103	101	102	100	97	98	96	95	95	93	92	90				
2	105	99	94	90	102	97	92	89	94	90	87	91	87	85	88	85	83	81				
3	98	91	85	80	96	89	84	79	86	82	78	84	80	77	82	78	75	74				
4	92	83	77	72	90	82	76	71	80	75	70	78	73	70	76	72	69	67				
5	87	77	70	65	85	76	70	65	74	69	64	72	68	64	71	67	63	61				
6	82	72	65	60	80	71	64	59	69	63	59	68	63	59	66	62	58	57				
7	77	67	60	55	76	66	59	55	65	59	54	63	58	54	62	57	54	52				
8	73	62	55	51	72	62	55	51	61	55	50	59	54	50	58	54	50	48				
9	69	58	52	47	68	58	51	47	57	51	47	56	51	47	55	50	47	45				
10	66	55	48	44	65	54	48	44	54	48	44	53	47	44	52	47	44	42				

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	8425	8425	8425
5°	8133	8263	8393
10°	7491	7819	8212
15°	6734	7185	7821
20°	5875	6407	7146
25°	4970	5522	6393
30°	3970	4585	5666
35°	2935	3685	4868
40°	1855	2886	3878
45°	731	2169	2852
50°	376	1455	1757
55°	309	955	788
60°	225	775	709
65°	192	725	725
70°	189	755	707
75°	250	870	749
80°	372	1116	839
85°	550	1842	1101

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 45°
 Vertical Angle: 87.5°
 Luminance: 3680 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	41.8	8.5
10°-20°	105.5	21.4
20°-30°	125.4	25.5
30°-40°	104.3	21.2
40°-50°	58.2	11.8
50°-60°	23.5	4.8
60°-70°	15.0	3.1
70°-80°	11.3	2.3
80°-90°	7.2	1.5
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°	272.6	55.4
0°-40°	376.9	76.6
0°-60°	458.7	93.2
0°-90°	492.2	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	492.2	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	457	457	457	457	457	
5°	439	447	446	450	453	41
15°	352	363	376	395	409	98
25°	244	254	271	292	314	111
35°	130	143	164	191	216	81
45°	28	47	83	97	109	26
55°	10	20	30	29	24	8
65°	4	18	17	16	17	4
75°	4	12	12	11	10	4
85°	3	8	9	8	5	3
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	456.6	456.6	456.6	456.6	456.6
2.5°	450.5	457.5	454.0	454.0	454.9
5°	439.1	447.0	446.1	449.6	453.1
7.5°	420.8	429.5	433.9	441.8	447.9
10°	399.8	409.4	417.3	429.5	438.3
12.5°	377.0	386.6	398.0	413.8	425.1
15°	352.5	363.0	376.1	395.4	409.4
17.5°	325.4	336.8	351.7	372.7	387.5
20°	299.2	310.5	326.3	347.3	363.9
22.5°	272.1	281.7	298.3	319.3	339.4
25°	244.1	253.7	271.2	292.2	314.0
27.5°	216.1	225.7	243.2	265.1	289.5
30°	186.3	196.8	215.2	239.7	265.9
32.5°	158.3	168.8	188.1	215.2	241.4
35°	130.3	142.6	163.6	190.7	216.1
37.5°	103.2	117.2	140.8	166.2	188.9
40°	77.0	91.9	119.8	141.7	161.0
42.5°	50.7	68.2	100.6	119.0	133.8
45°	28.0	47.2	83.1	97.1	109.3
47.5°	15.7	30.6	65.6	77.0	84.0
50°	13.1	22.7	50.7	58.6	61.2
52.5°	10.5	21.0	38.5	42.9	41.1
55°	9.6	20.1	29.7	28.9	24.5
57.5°	7.9	20.1	23.6	21.0	21.0
60°	6.1	19.2	21.0	18.4	19.2
62.5°	5.2	18.4	19.2	17.5	17.5
65°	4.4	17.5	16.6	15.7	16.6
67.5°	3.5	15.7	15.7	14.9	14.9
70°	3.5	14.9	14.0	13.1	13.1
72.5°	3.5	13.1	13.1	12.2	12.2
75°	3.5	12.2	12.2	11.4	10.5
77.5°	3.5	10.5	11.4	10.5	9.6
80°	3.5	9.6	10.5	9.6	7.9
82.5°	3.5	8.7	9.6	8.7	7.0
85°	2.6	7.9	8.7	7.9	5.2
87.5°	2.6	7.9	8.7	7.0	4.4
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)