

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: P1059335

Luminaire Tested: S123RDR-S775D830-X4F0-XX-UDD-WVL-S

Issue Date: 8/7/2025

**Test Information**

Test Method: LM-79-2019  
Report Number: P1059335  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2406-143-67 )  
Test Lab: INNOVATION CENTER  
Issue Date: 8/7/2025  
Manufacturer: COOPER LIGHTING SOLUTIONS  
Product Line: NEO-RAY  
Catalog Number: S123RDR-S775D830-X4F0-XX-UDD-WVL-S  
Description: DEFINE 3 SILVER REGRESSED DIRECT RECESSED HOUSING WITH WHITE STRAIGHT BLADE  
LOUVER WITH DIFFUSER  
CORE LIGHT ENGINE  
Light Source: 3000K CCT, 80 CRI LEDS  
Ballast/Driver: -

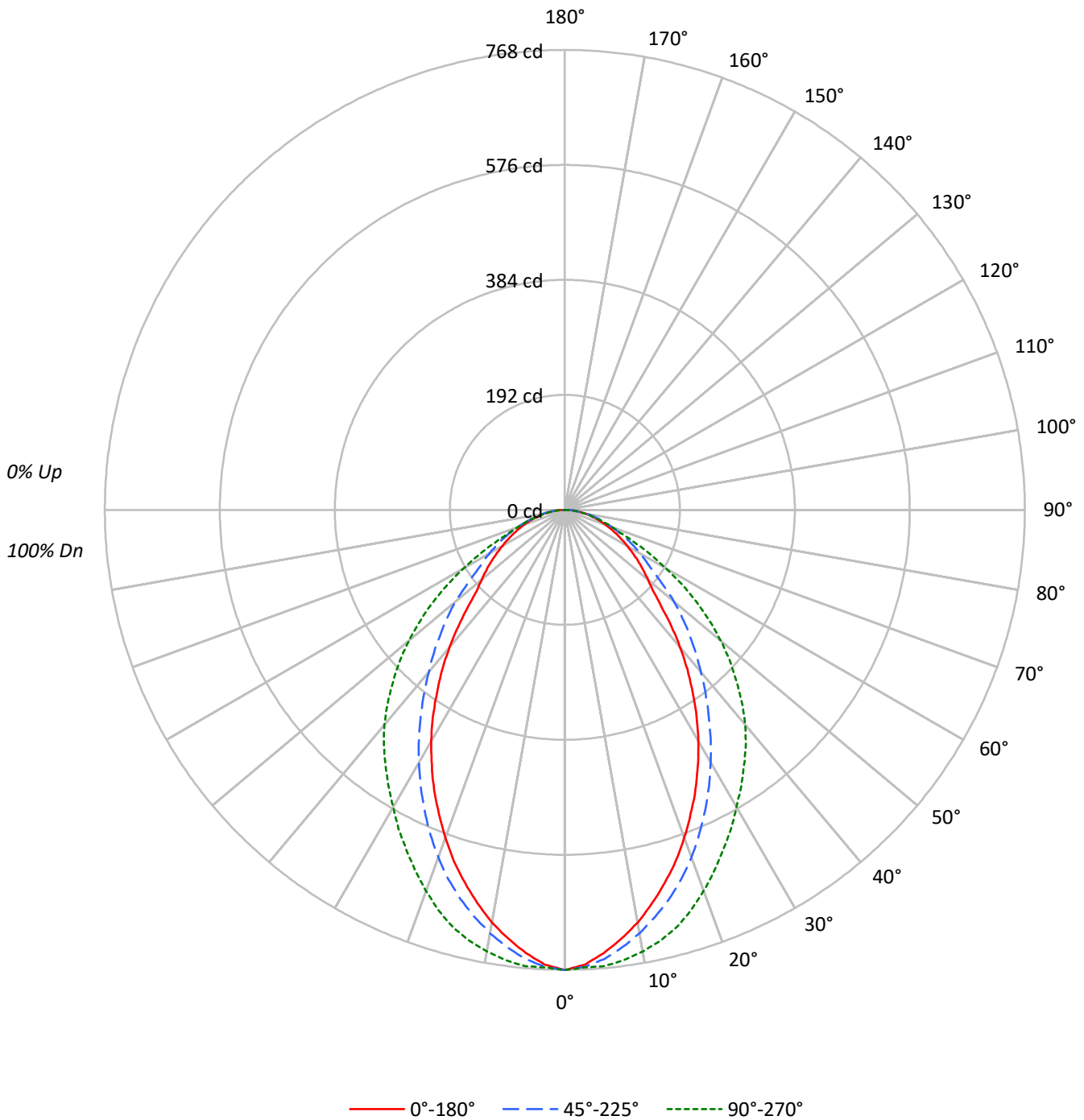
**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 1387.9 lumens  
Efficiency: N/A  
Efficacy: 53.8 lumens/watt  
Spacing Criteria (0/90/45): 0.93 / 1.12 / 1.1  
Luminous Opening: Rectangular (W 0.23' 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										
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	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	110	106	102	99	108	104	100	97	100	97	94	96	93	91	92	90	89	87						87														
2	102	94	88	83	99	92	87	82	89	84	80	86	82	78	83	80	77	75						75														
3	94	84	77	71	91	83	76	71	80	74	69	77	72	68	75	71	67	65						65														
4	87	76	68	62	84	74	67	61	72	66	61	70	64	60	68	63	59	57						57														
5	80	69	60	54	78	68	60	54	66	59	54	64	58	53	62	57	53	51						51														
6	75	63	54	48	73	62	54	48	60	53	48	58	52	47	57	51	47	45						45														
7	70	57	49	44	68	56	49	43	55	48	43	54	47	43	52	47	43	41						41														
8	65	53	45	39	64	52	45	39	51	44	39	50	43	39	48	43	39	37						37														
9	61	49	41	36	60	48	41	36	47	40	36	46	40	36	45	39	35	34						34														
10	58	45	38	33	56	45	38	33	44	37	33	43	37	33	42	37	33	31						31														

**AVERAGE LUMINANCE (cd/sqm):**

	0°	45°	90°
0°	9022	9022	9022
5°	8759	8876	9014
10°	8345	8560	8925
15°	7840	8179	8771
20°	7283	7721	8465
25°	6687	7178	8111
30°	6046	6607	7768
35°	5333	6003	7476
40°	4583	5413	7180
45°	3770	4876	6731
50°	3307	4344	6204
55°	3061	3705	5495
60°	2813	3405	4549
65°	2628	3129	3579
70°	2475	2846	2846
75°	2327	2613	2450
80°	2191	2374	2069
85°	2061	2304	1576

**MAXIMUM LUMINANCE 45°-90°:**

Horizontal Angle: 90°  
 Vertical Angle: 45°  
 Luminance: 6731 cd/sqm

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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	71.1	5.1
10°-20°	190.5	13.7
20°-30°	258.2	18.6
30°-40°	270.0	19.5
40°-50°	234.2	16.9
50°-60°	174.2	12.6
60°-70°	111.8	8.1
70°-80°	59.9	4.3
80°-90°	18.1	1.3
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°	519.7	37.4
0°-40°	789.7	56.9
0°-60°	1198.1	86.3
0°-90°	1387.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1387.9	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	768	768	768	768	768	
5°	743	756	753	758	765	70
15°	645	660	673	700	722	181
25°	516	532	554	591	626	237
35°	372	390	419	472	522	232
45°	227	244	294	357	405	179
55°	150	153	181	232	268	134
65°	95	103	113	120	129	94
75°	51	59	58	55	54	54
85°	15	19	17	14	12	17
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	768.3	768.3	768.3	768.3	768.3
2.5°	760.2	771.0	763.8	763.8	764.7
5°	743.1	755.7	753.0	758.4	764.7
7.5°	722.4	735.9	736.8	749.4	758.4
10°	699.9	713.4	717.9	735.9	748.5
12.5°	672.8	688.2	696.3	718.8	736.8
15°	644.9	660.2	672.8	699.9	721.5
17.5°	615.2	630.5	646.7	677.4	700.8
20°	582.8	599.0	617.9	648.5	677.4
22.5°	549.4	566.6	586.4	619.7	652.1
25°	516.1	532.3	554.0	590.9	626.0
27.5°	481.0	498.1	520.6	561.2	600.8
30°	445.9	463.0	487.3	530.5	572.9
32.5°	409.8	426.9	453.1	501.7	547.6
35°	372.0	390.0	418.8	472.0	521.5
37.5°	336.0	353.1	385.5	444.1	496.3
40°	299.0	317.1	353.1	416.1	468.4
42.5°	263.0	281.0	323.4	386.4	437.8
45°	227.0	244.1	293.6	356.7	405.3
47.5°	199.1	211.7	265.7	325.2	373.8
50°	181.0	185.6	237.8	294.5	339.6
52.5°	164.8	168.4	207.2	263.9	304.4
55°	149.5	153.1	181.0	232.4	268.4
57.5°	134.2	138.7	161.2	200.0	232.4
60°	119.8	125.2	145.0	171.1	193.7
62.5°	107.2	113.5	128.8	145.0	160.3
65°	94.6	102.7	112.6	119.8	128.8
67.5°	82.9	91.9	97.3	99.1	100.0
70°	72.1	81.1	82.9	82.9	82.9
72.5°	61.2	71.2	69.4	68.5	67.6
75°	51.3	59.4	57.6	54.9	54.0
77.5°	41.4	48.6	45.9	44.1	41.4
80°	32.4	37.8	35.1	33.3	30.6
82.5°	24.3	27.9	25.2	23.4	20.7
85°	15.3	18.9	17.1	14.4	11.7
87.5°	8.1	10.8	9.0	8.1	4.5
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)