

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: P1059344

Luminaire Tested: S123RDR-S775D835-X4F0-XX-UDD-WVL-S

Issue Date: 8/7/2025

**Test Information**

Test Method: LM-79-2019  
Report Number: P1059344  
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-S775D835-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: 3500K CCT, 80 CRI LEDS  
Ballast/Driver: -

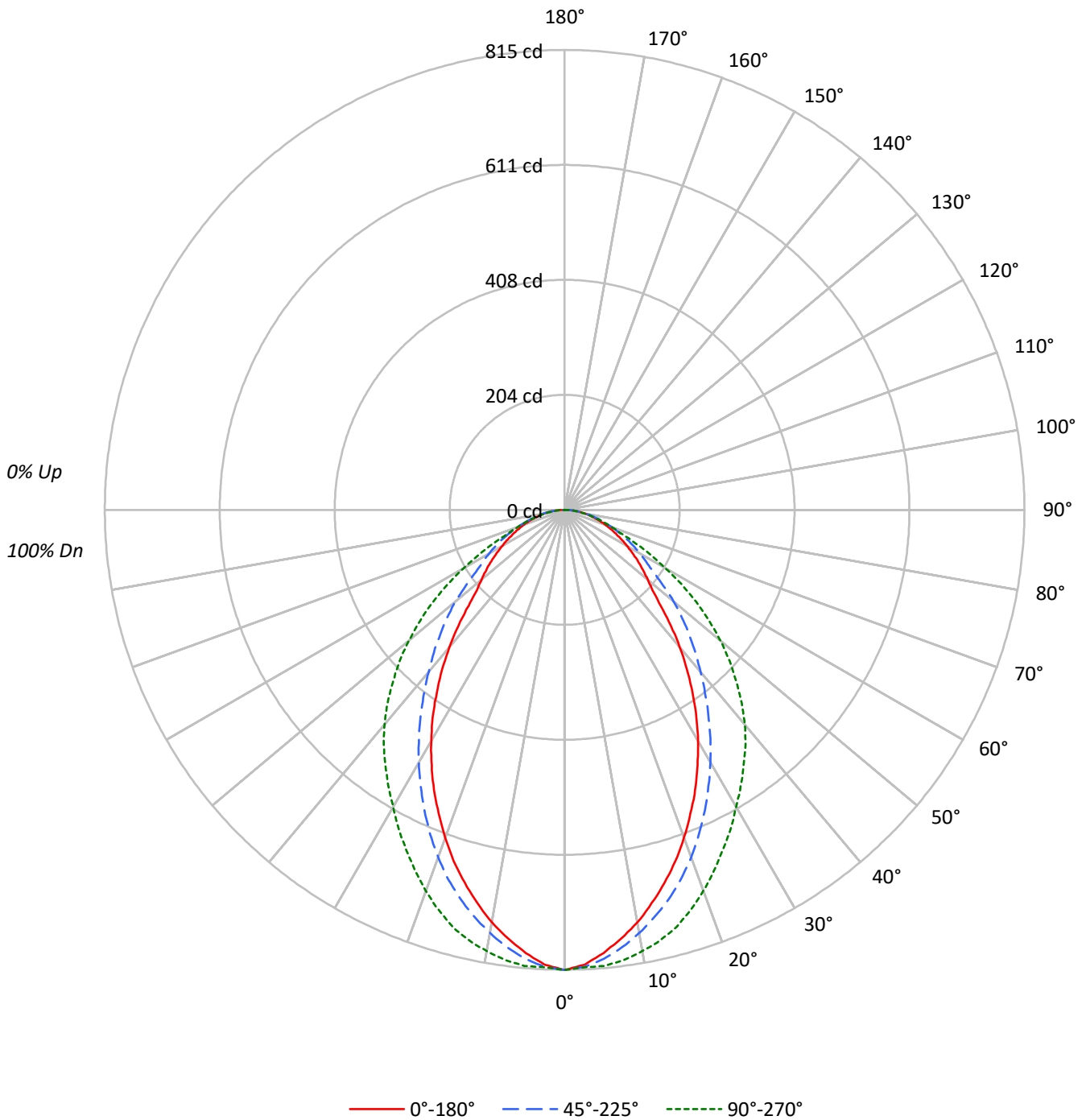
**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 1472.5 lumens  
Efficiency: N/A  
Efficacy: 57.1 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	65	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°	9572	9572	9572
5°	9293	9417	9563
10°	8853	9081	9469
15°	8318	8679	9306
20°	7726	8192	8980
25°	7095	7614	8606
30°	6413	7010	8241
35°	5658	6370	7931
40°	4864	5742	7617
45°	3999	5173	7141
50°	3509	4609	6582
55°	3247	3933	5831
60°	2985	3614	4826
65°	2787	3320	3798
70°	2626	3018	3018
75°	2473	2777	2600
80°	2326	2522	2198
85°	2183	2452	1671

**MAXIMUM LUMINANCE 45°-90°:**

Horizontal Angle: 90°  
 Vertical Angle: 45°  
 Luminance: 7141 cd/sqm



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	75.4	5.1
10°-20°	202.1	13.7
20°-30°	274.0	18.6
30°-40°	286.4	19.5
40°-50°	248.4	16.9
50°-60°	184.8	12.6
60°-70°	118.6	8.1
70°-80°	63.6	4.3
80°-90°	19.2	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°	551.4	37.4
0°-40°	837.9	56.9
0°-60°	1271.1	86.3
0°-90°	1472.5	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1472.5	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	815	815	815	815	815	
5°	788	802	799	805	811	74
15°	684	700	714	742	766	192
25°	548	565	588	627	664	251
35°	395	414	444	501	553	246
45°	241	259	312	378	430	189
55°	159	162	192	247	285	142
65°	100	109	120	127	137	100
75°	54	63	61	58	57	58
85°	16	20	18	15	12	18
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	815.2	815.2	815.2	815.2	815.2
2.5°	806.6	818.0	810.4	810.4	811.3
5°	788.4	801.8	798.9	804.6	811.3
7.5°	766.4	780.8	781.7	795.1	804.6
10°	742.5	756.9	761.6	780.8	794.1
12.5°	713.9	730.1	738.7	762.6	781.7
15°	684.2	700.5	713.9	742.5	765.5
17.5°	652.7	668.9	686.2	718.6	743.5
20°	618.3	635.5	655.6	688.1	718.6
22.5°	582.9	601.1	622.1	657.5	691.9
25°	547.6	564.8	587.7	626.9	664.2
27.5°	510.3	528.5	552.4	595.4	637.4
30°	473.0	491.2	517.0	562.9	607.8
32.5°	434.8	453.0	480.7	532.3	581.0
35°	394.7	413.8	444.4	500.8	553.3
37.5°	356.5	374.6	409.0	471.1	526.6
40°	317.3	336.4	374.6	441.5	496.9
42.5°	279.0	298.2	343.1	410.0	464.4
45°	240.8	259.0	311.5	378.4	430.0
47.5°	211.2	224.6	281.9	345.0	396.6
50°	192.1	196.9	252.3	312.5	360.3
52.5°	174.9	178.7	219.8	280.0	323.0
55°	158.6	162.5	192.1	246.6	284.8
57.5°	142.4	147.2	171.1	212.2	246.6
60°	127.1	132.8	153.9	181.6	205.5
62.5°	113.7	120.4	136.7	153.9	170.1
65°	100.3	108.9	119.5	127.1	136.7
67.5°	87.9	97.5	103.2	105.1	106.1
70°	76.5	86.0	87.9	87.9	87.9
72.5°	65.0	75.5	73.6	72.6	71.7
75°	54.5	63.1	61.2	58.3	57.3
77.5°	44.0	51.6	48.7	46.8	44.0
80°	34.4	40.1	37.3	35.4	32.5
82.5°	25.8	29.6	26.8	24.8	22.0
85°	16.2	20.1	18.2	15.3	12.4
87.5°	8.6	11.5	9.6	8.6	4.8
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)