

Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269



Scaled data based on original data using
LM-79-2024 Approved Method: Electrical and Photometric Measurements of Solid-
State Lighting Products

Test Report Prepared for
Cooper Lighting Solutions

Brand: NEO-RAY

Report Number: P1059020

Luminaire Tested: S123RDRP-S1000D835-X4F0-XX-UDD-WVL-S

Issue Date: 8/7/2025

Test Information

Test Method: LM-79-2024
Report Number: P1059020
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: S123RDRP-S1000D835-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

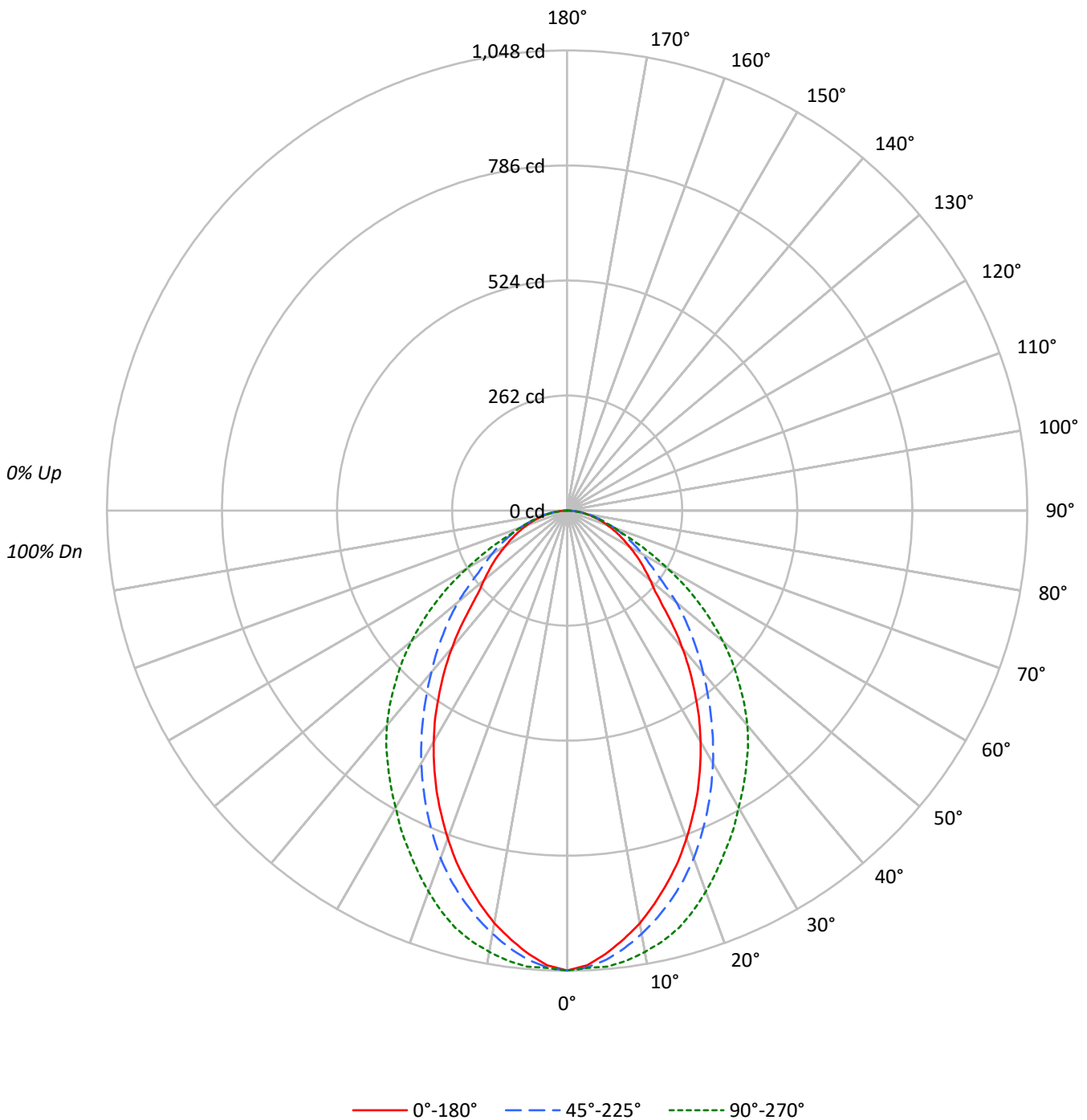
Lumens per Lamp: N/A
Luminaire Lumens: 1892.2 lumens
Efficiency: N/A
Efficacy: 54.1 lumens/watt
Spacing Criteria (0/90/45): 0.93 / 1.12 / 1.1
Luminous Opening: Rectangular (W 0.23' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 35
Input Voltage (V): 120
Input Current (A_{in}): 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	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				
2	102	94	88	83	99	92	87	82	89	84	80	86	82	78	83	80	77					75				
3	94	84	77	71	91	83	76	71	80	74	69	77	72	68	75	71	67					65				
4	87	76	68	62	84	74	67	61	72	66	61	70	64	60	68	63	59					57				
5	80	69	60	54	78	68	60	54	66	59	54	64	58	53	62	57	53					51				
6	75	63	54	48	73	62	54	48	60	53	48	58	52	47	57	51	47					45				
7	70	57	49	44	68	56	49	43	55	48	43	54	47	43	52	47	43					41				
8	65	53	45	39	64	52	45	39	51	44	39	50	43	39	48	43	39					37				
9	61	49	41	36	60	48	41	36	47	40	36	46	40	36	45	39	35					34				
10	58	45	38	33	56	45	38	33	44	37	33	43	37	33	42	37	33					31				

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	12300	12300	12300
5°	11942	12102	12289
10°	11377	11671	12168
15°	10689	11153	11959
20°	9929	10527	11540
25°	9117	9786	11058
30°	8243	9009	10590
35°	7271	8185	10192
40°	6249	7379	9789
45°	5140	6648	9177
50°	4509	5922	8458
55°	4174	5053	7493
60°	3835	4643	6200
65°	3581	4265	4879
70°	3371	3880	3880
75°	3176	3566	3344
80°	2989	3239	2827
85°	2816	3139	2156

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°
 Vertical Angle: 45°
 Luminance: 9177 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	96.9	5.1
10°-20°	259.7	13.7
20°-30°	352.1	18.6
30°-40°	368.1	19.5
40°-50°	319.3	16.9
50°-60°	237.5	12.6
60°-70°	152.4	8.1
70°-80°	81.7	4.3
80°-90°	24.7	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°	708.6	37.4
0°-40°	1076.7	56.9
0°-60°	1633.4	86.3
0°-90°	1892.2	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1892.2	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1048	1048	1048	1048	1048	
5°	1013	1030	1027	1034	1043	95
15°	879	900	917	954	984	246
25°	704	726	755	806	854	323
35°	507	532	571	644	711	317
45°	310	333	400	486	553	243
55°	204	209	247	317	366	182
65°	129	140	154	163	176	128
75°	70	81	79	75	74	74
85°	21	26	23	20	16	24
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1047.5	1047.5	1047.5	1047.5	1047.5
2.5°	1036.5	1051.2	1041.4	1041.4	1042.6
5°	1013.1	1030.3	1026.7	1034.0	1042.6
7.5°	984.9	1003.3	1004.6	1021.7	1034.0
10°	954.2	972.6	978.8	1003.3	1020.5
12.5°	917.4	938.2	949.3	980.0	1004.6
15°	879.3	900.2	917.4	954.2	983.7
17.5°	838.8	859.6	881.7	923.5	955.4
20°	794.6	816.7	842.4	884.2	923.5
22.5°	749.1	772.5	799.5	844.9	889.1
25°	703.7	725.8	755.3	805.6	853.5
27.5°	655.8	679.1	709.8	765.1	819.1
30°	607.9	631.2	664.4	723.3	781.0
32.5°	558.8	582.1	617.7	684.0	746.7
35°	507.2	531.8	571.0	643.5	711.0
37.5°	458.1	481.4	525.6	605.4	676.7
40°	407.7	432.3	481.4	567.4	638.6
42.5°	358.6	383.2	440.9	526.8	596.8
45°	309.5	332.8	400.3	486.3	552.6
47.5°	271.4	288.6	362.3	443.3	509.6
50°	246.8	253.0	324.2	401.6	463.0
52.5°	224.7	229.6	282.5	359.8	415.1
55°	203.9	208.8	246.8	316.8	366.0
57.5°	183.0	189.1	219.8	272.6	316.8
60°	163.3	170.7	197.7	233.3	264.0
62.5°	146.1	154.7	175.6	197.7	218.6
65°	128.9	140.0	153.5	163.3	175.6
67.5°	113.0	125.3	132.6	135.1	136.3
70°	98.2	110.5	113.0	113.0	113.0
72.5°	83.5	97.0	94.6	93.3	92.1
75°	70.0	81.1	78.6	74.9	73.7
77.5°	56.5	66.3	62.6	60.2	56.5
80°	44.2	51.6	47.9	45.4	41.8
82.5°	33.2	38.1	34.4	31.9	28.2
85°	20.9	25.8	23.3	19.6	16.0
87.5°	11.1	14.7	12.3	11.1	6.1
90°	0.0	0.0	0.0	0.0	0.0



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CIE UGR TABLE:

Reflectances:											
Ceiling		0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3
Wall		0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3
Reference plane		0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2
Room dimensions		Viewed crosswise					Viewed endwise				
X=2H	Y=2H	15.50	16.99	15.87	17.30	17.62	18.26	19.74	18.63	20.06	20.37
	3H	17.22	18.54	17.59	18.87	19.23	19.28	20.61	19.66	20.94	21.30
	4H	17.88	19.12	18.28	19.47	19.85	19.65	20.89	20.05	21.24	21.62
	6H	18.38	19.53	18.79	19.89	20.29	19.90	21.05	20.31	21.42	21.81
	8H	18.56	19.65	18.98	20.04	20.44	19.97	21.07	20.40	21.46	21.86
	12H	18.68	19.73	19.11	20.11	20.54	20.01	21.06	20.44	21.44	21.87
4H	2H	16.28	17.53	16.68	17.88	18.25	18.53	19.78	18.93	20.13	20.51
	3H	18.21	19.24	18.62	19.64	20.04	19.79	20.82	20.20	21.22	21.62
	4H	19.02	19.95	19.45	20.36	20.80	20.27	21.20	20.71	21.62	22.06
	6H	19.66	20.47	20.12	20.91	21.37	20.65	21.46	21.11	21.91	22.37
	8H	19.89	20.64	20.35	21.09	21.55	20.77	21.52	21.23	21.97	22.43
	12H	20.06	20.73	20.54	21.21	21.68	20.84	21.51	21.32	21.99	22.46
8H	4H	19.34	20.09	19.80	20.54	21.00	20.46	21.22	20.93	21.66	22.13
	6H	20.13	20.75	20.63	21.25	21.72	20.95	21.58	21.45	22.07	22.55
	8H	20.46	21.02	20.97	21.53	22.02	21.13	21.69	21.64	22.20	22.69
	12H	20.74	21.23	21.25	21.72	22.29	21.26	21.76	21.77	22.25	22.81
12H	4H	19.36	20.03	19.84	20.51	20.99	20.48	21.15	20.96	21.63	22.10
	6H	20.18	20.74	20.70	21.25	21.74	20.99	21.55	21.50	22.06	22.55
	8H	20.58	21.07	21.09	21.57	22.13	21.22	21.71	21.73	22.21	22.77