

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: P1058040

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

Issue Date: 8/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1058040
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2406-143-55)
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-W
Description: DEFINE 2 WHITE REGRESSED DIRECT RECESSED HOUSING WITH WHITE STRAIGHT BLADE
LOUVER WITH DIFFUSER
CORE LIGHT ENGINE
Light Source: 3000K CCT, 80 CRI LEDS
Ballast/Driver: -

Summary

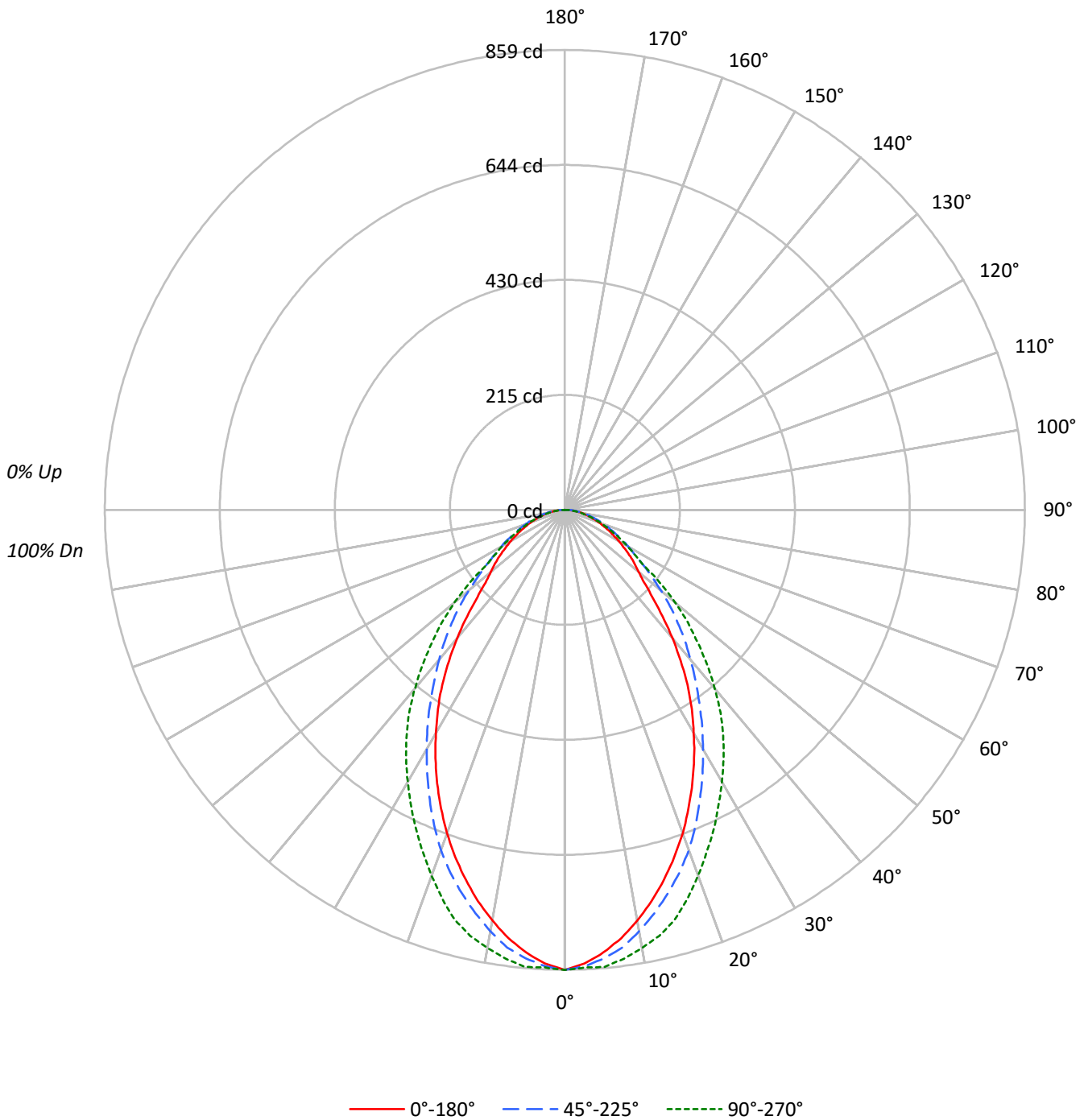
Lumens per Lamp: N/A
Luminaire Lumens: 1401.0 lumens
Efficiency: N/A
Efficacy: 54.3 lumens/watt
Spacing Criteria (0/90/45): 0.91 / 1.05 / 1.05
Luminous Opening: Rectangular (W 0.15' x L: 4' x H: 0')
CIE Type: Direct

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	110	106	103	99	108	104	101	98	100	97	95	96	94	92	93	91	89	87				
2	102	95	89	84	100	93	88	83	90	85	81	87	83	80	84	81	78	76				
3	94	85	78	73	92	84	77	72	81	75	71	78	74	70	76	72	68	67				
4	88	77	69	64	85	76	69	63	73	67	62	71	66	62	69	65	61	59				
5	81	70	62	56	80	69	62	56	67	60	55	65	59	55	63	58	54	52				
6	76	64	56	50	74	63	56	50	61	55	50	60	54	49	58	53	49	47				
7	71	59	51	46	69	58	51	45	57	50	45	55	49	45	54	49	44	43				
8	67	54	47	41	65	54	46	41	52	46	41	51	45	41	50	45	41	39				
9	63	50	43	38	61	50	43	38	49	42	38	48	42	37	47	41	37	36				
10	59	47	40	35	58	46	40	35	46	39	35	45	39	35	44	38	34	33				

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	15858	15858	15858
5°	15370	15576	15867
10°	14596	14977	15565
15°	13663	14175	15145
20°	12628	13282	14280
25°	11477	12153	13395
30°	10257	10986	12503
35°	8993	9846	11615
40°	7523	8792	10483
45°	6028	7790	9162
50°	5173	6712	7693
55°	4726	5707	5678
60°	4296	5049	4945
65°	3912	4519	4318
70°	3588	4138	3841
75°	3358	3821	3358
80°	3145	3539	2943
85°	3133	3726	2541

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°
 Vertical Angle: 45°
 Luminance: 9162 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	79.3	5.7
10°-20°	210.0	15.0
20°-30°	277.0	19.8
30°-40°	279.0	19.9
40°-50°	227.0	16.2
50°-60°	154.8	11.0
60°-70°	100.5	7.2
70°-80°	55.3	3.9
80°-90°	18.0	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°	566.4	40.4
0°-40°	845.3	60.3
0°-60°	1227.1	87.6
0°-90°	1401.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1401.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	859	859	859	859	859	
5°	830	846	841	848	857	78
15°	715	734	742	772	793	200
25°	564	582	597	624	658	258
35°	399	420	437	475	516	248
45°	231	260	298	324	351	182
55°	147	162	177	178	176	132
65°	90	106	104	98	99	89
75°	47	58	54	48	47	50
85°	15	19	18	14	12	16
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	859.4	859.4	859.4	859.4	859.4
2.5°	848.3	862.1	852.9	853.8	855.7
5°	829.8	845.5	840.9	848.3	856.6
7.5°	806.7	822.4	824.3	835.3	845.5
10°	779.0	796.5	799.3	815.9	830.7
12.5°	748.5	767.9	771.6	795.6	815.0
15°	715.2	733.7	742.0	772.5	792.8
17.5°	680.1	697.7	710.6	738.3	761.4
20°	643.1	659.8	676.4	701.4	727.2
22.5°	603.4	621.9	637.6	662.5	692.1
25°	563.7	582.2	596.9	623.7	657.9
27.5°	523.0	541.5	556.3	584.9	621.9
30°	481.4	500.8	515.6	548.0	586.8
32.5°	440.8	460.2	476.8	511.0	551.7
35°	399.2	419.5	437.1	475.0	515.6
37.5°	354.8	377.9	400.1	438.0	477.7
40°	312.3	338.2	365.0	400.1	435.2
42.5°	269.8	298.5	331.7	361.3	393.6
45°	231.0	259.7	298.5	324.3	351.1
47.5°	200.5	224.5	266.1	287.4	311.4
50°	180.2	196.8	233.8	250.4	268.0
52.5°	163.6	177.4	203.3	214.4	223.6
55°	146.9	161.7	177.4	178.3	176.5
57.5°	130.3	146.9	155.2	148.8	152.5
60°	116.4	133.1	136.8	130.3	134.0
62.5°	101.6	120.1	120.1	113.7	115.5
65°	89.6	106.3	103.5	97.9	98.9
67.5°	77.6	94.3	89.6	84.1	84.1
70°	66.5	82.2	76.7	71.2	71.2
72.5°	56.4	69.3	65.6	59.1	58.2
75°	47.1	58.2	53.6	48.1	47.1
77.5°	37.9	47.1	43.4	38.8	37.0
80°	29.6	37.9	33.3	29.6	27.7
82.5°	22.2	28.6	24.9	21.3	19.4
85°	14.8	19.4	17.6	13.9	12.0
87.5°	7.4	12.9	11.1	9.2	7.4
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)