

Scaled data based on original data using  
LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-State  
Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: NEO-RAY

Report Number: P333812

Luminaire Tested: **S122DW-S675D830-4F0-1E-UDD-F**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P333812  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1802-639-10)  
Test Lab: INNOVATION CENTER  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: NEO-RAY  
Catalog Number: S122DW-S675D830-4F0-1E-UDD-F  
Description: DEFINE 2 DIRECT LED LUMINAIRE, FLUSH SATIN WHITE DIFFUSER  
PENDANT/SURFACE/WALL MOUNT, 675 LUMENS PER FOOT  
Light Source: 3000K CCT, 80 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 2493.9 lumens  
Efficiency: N/A  
Efficacy: 94.8 lumens/watt  
Spacing Criteria (0/90/45): 1.2 / 1.16 / 1.29  
Luminous Opening: Rectangular (W 0.17' x L: 4' x H: 0')  
CIE Type: Direct

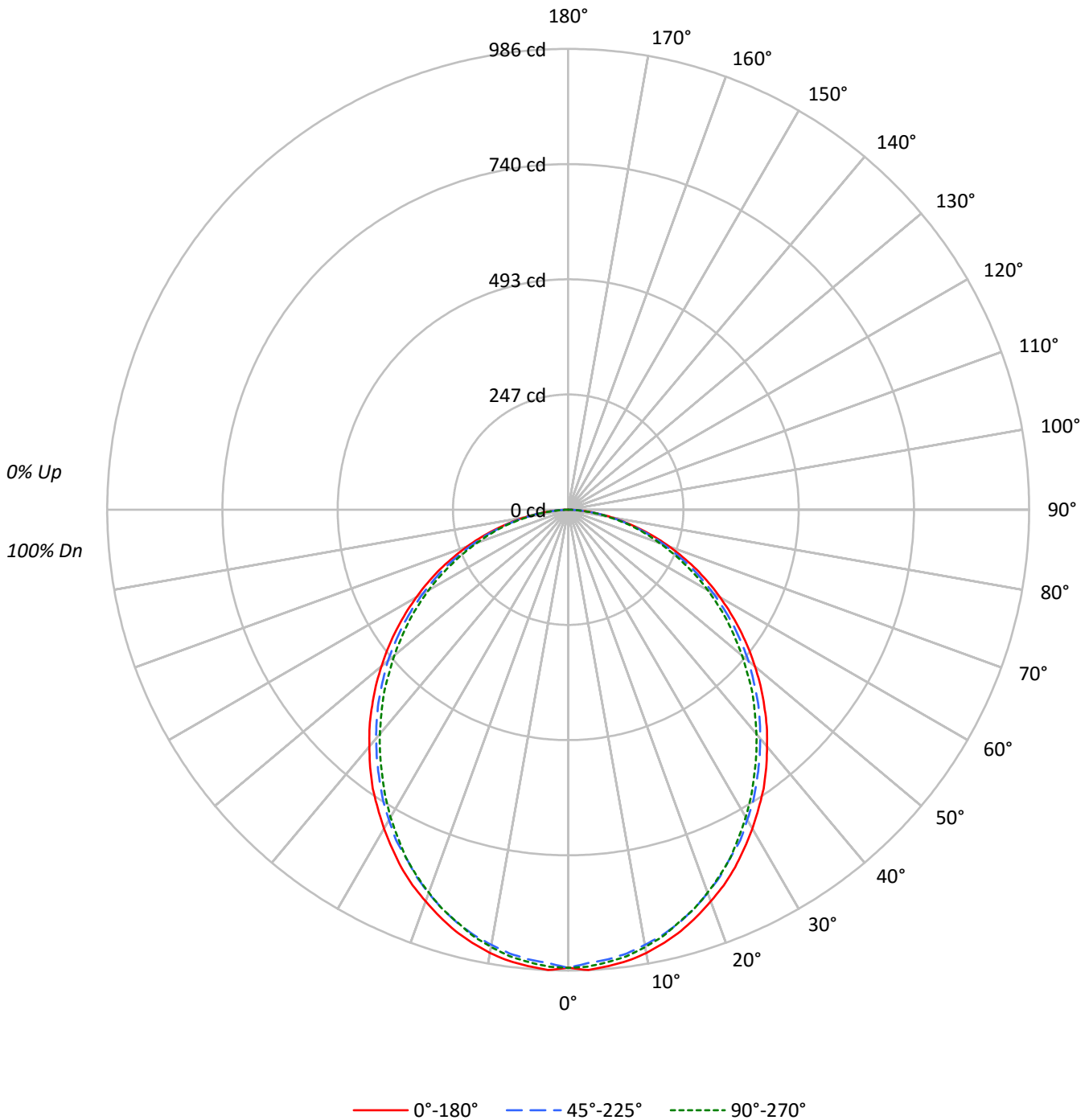
Input Watts (W): 26.3  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	0
RCR																		
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100
1	109	104	100	96	106	102	98	95	98	95	92	94	91	89	90	88	86	84
2	99	91	85	79	97	89	83	78	86	81	76	83	78	74	80	76	73	71
3	91	80	72	66	88	79	71	65	76	69	64	73	68	63	71	66	62	60
4	83	71	63	56	81	70	62	56	68	61	55	65	59	54	63	58	54	51
5	77	64	55	49	75	63	55	48	61	53	48	59	52	47	57	51	47	45
6	71	58	49	43	69	57	48	42	55	48	42	53	47	42	52	46	41	39
7	66	52	44	38	64	52	43	38	50	43	37	49	42	37	47	41	37	35
8	61	48	40	34	60	47	39	34	46	39	33	45	38	33	44	38	33	31
9	57	44	36	30	56	43	36	30	42	35	30	41	35	30	40	34	30	28
10	54	41	33	28	53	40	33	28	39	32	27	38	32	27	37	32	27	26

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

	0°	45°	90°
0°	15826	15826	15826
5°	15887	15658	15750
10°	15793	15500	15577
15°	15597	15298	15283
20°	15320	14996	14981
25°	15045	14626	14626
30°	14691	14287	14164
35°	14361	13878	13673
40°	13947	13468	13211
45°	13538	13063	12741
50°	13092	12642	12193
55°	12631	12152	11702
60°	12113	11567	11141
65°	11561	10984	10479
70°	10858	10277	9791
75°	9875	9463	9233
80°	8768	8498	8061
85°	7151	6817	6113



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	92.3	3.7
10°-20°	259.6	10.4
20°-30°	381.5	15.3
30°-40°	443.1	17.8
40°-50°	442.5	17.7
50°-60°	385.9	15.5
60°-70°	285.2	11.4
70°-80°	161.4	6.5
80°-90°	42.6	1.7
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°	733.3	29.4
0°-40°	1176.4	47.2
0°-60°	2004.7	80.4
0°-90°	2493.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2493.9	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	980	980	980	980	980	
5°	980	976	966	974	972	93
15°	933	928	915	919	914	263
25°	844	837	821	823	821	389
35°	729	719	704	698	694	455
45°	593	586	572	562	558	458
55°	449	443	432	420	416	401
65°	303	297	288	279	274	299
75°	158	156	152	146	148	169
85°	39	38	37	34	33	45
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	980.2	980.2	980.2	980.2	980.2
2.5°	985.9	981.2	970.8	980.2	978.4
5°	980.2	976.5	966.1	973.6	971.8
7.5°	973.6	968.0	957.6	965.2	963.3
10°	963.3	956.7	945.4	952.9	950.1
12.5°	949.1	943.5	932.2	936.9	935.0
15°	933.1	927.5	915.2	919.0	914.3
17.5°	913.3	907.7	895.4	900.1	895.4
20°	891.6	886.0	872.8	875.6	871.9
22.5°	870.0	861.5	849.2	849.2	847.3
25°	844.5	837.0	821.0	822.8	821.0
27.5°	816.2	809.6	797.4	794.6	789.9
30°	788.0	780.4	766.3	763.5	759.7
32.5°	757.8	752.2	737.1	731.4	727.6
35°	728.6	719.2	704.1	698.4	693.7
37.5°	695.6	687.1	672.0	665.4	660.7
40°	661.7	654.1	639.0	630.6	626.8
42.5°	628.7	621.1	606.1	596.6	591.0
45°	592.9	586.3	572.1	561.8	558.0
47.5°	558.0	551.4	536.3	525.9	520.3
50°	521.2	516.5	503.3	490.1	485.4
52.5°	485.4	478.8	466.6	456.2	449.6
55°	448.7	443.0	431.7	420.4	415.7
57.5°	411.9	407.2	394.9	383.6	379.8
60°	375.1	371.4	358.2	347.8	345.0
62.5°	339.3	332.7	323.3	313.9	310.1
65°	302.6	296.9	287.5	279.0	274.3
67.5°	264.9	260.1	251.7	245.1	241.3
70°	230.0	226.2	217.7	211.1	207.4
72.5°	194.2	190.4	185.7	179.1	176.3
75°	158.3	156.5	151.7	146.1	148.0
77.5°	126.3	122.5	120.6	117.8	115.0
80°	94.3	93.3	91.4	88.6	86.7
82.5°	64.1	64.1	63.2	59.4	59.4
85°	38.6	37.7	36.8	33.9	33.0
87.5°	17.0	15.1	13.2	10.4	9.4
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)