

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: P333885

Luminaire Tested: **S122RDS-S290D835-4F0-1E-UDD-F**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P333885  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1802-639-24)  
Test Lab: INNOVATION CENTER  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: NEO-RAY  
Catalog Number: S122RDS-S290D835-4F0-1E-UDD-F  
Description: DEFINE 2 REGRESSED DIRECT LED LUMINAIRE, FLUSH SATIN WHITE DIFFUSER  
PENDANT/SURFACE/WALL MOUNT, 290 LUMENS PER FOOT  
Light Source: 3500K CCT, 80 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 992.3 lumens  
Efficiency: N/A  
Efficacy: 85.5 lumens/watt  
Spacing Criteria (0/90/45): 1.2 / 0.99 / 1.16  
Luminous Opening: Rectangular (W 0.17' x L: 4' x H: 0')  
CIE Type: Direct

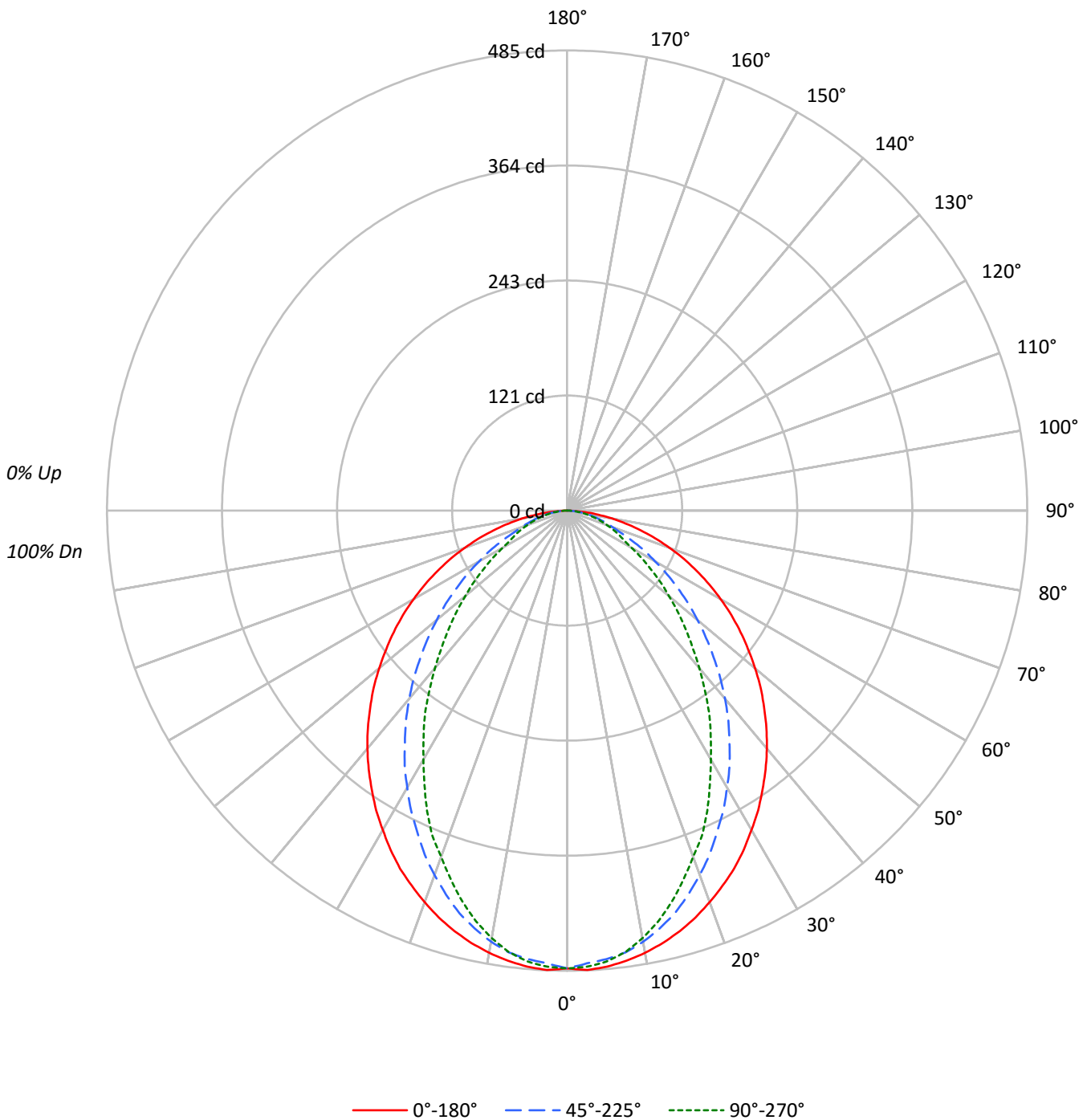
Input Watts (W): 11.6  
Input Voltage (V): 120  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	110	106	102	98	107	103	100	97	99	96	94	95	93	91	92	90	88	86
2	101	94	87	82	98	92	86	81	88	83	79	85	81	78	82	79	76	74
3	93	83	76	70	90	82	75	69	79	73	68	76	71	67	74	69	66	64
4	86	75	66	60	83	73	66	60	71	64	59	69	63	58	66	62	57	55
5	79	67	59	53	77	66	58	52	64	57	52	62	56	51	60	55	51	49
6	74	61	53	47	72	60	52	46	58	51	46	57	50	46	55	50	45	43
7	68	56	47	42	67	55	47	42	53	46	41	52	46	41	51	45	41	39
8	64	51	43	38	62	51	43	37	49	42	37	48	42	37	47	41	37	35
9	60	47	39	34	59	47	39	34	46	39	34	44	38	34	44	38	34	32
10	56	44	36	31	55	43	36	31	42	36	31	41	35	31	41	35	31	29

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

	0°	45°	90°
0°	7790	7790	7790
5°	7820	7692	7734
10°	7760	7566	7502
15°	7671	7341	7131
20°	7546	7022	6670
25°	7420	6657	6223
30°	7245	6285	5649
35°	7074	5878	5146
40°	6903	5457	4565
45°	6699	4985	4037
50°	6493	4509	3522
55°	6280	3994	3023
60°	6035	3455	2509
65°	5754	2904	2285
70°	5419	2389	2101
75°	5009	2177	1959
80°	4426	1953	1785
85°	3483	1538	1538



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	45.2	4.6
10°-20°	124.1	12.5
20°-30°	174.3	17.6
30°-40°	190.0	19.1
40°-50°	174.6	17.6
50°-60°	137.1	13.8
60°-70°	89.2	9.0
70°-80°	46.0	4.6
80°-90°	11.7	1.2
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°	343.6	34.6
0°-40°	533.6	53.8
0°-60°	845.3	85.2
0°-90°	992.3	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	992.3	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	482	482	482	482	482	
5°	482	480	475	478	477	46
15°	459	454	439	431	427	129
25°	416	403	374	356	349	192
35°	359	337	298	271	261	225
45°	293	264	218	187	177	227
55°	223	189	142	116	107	199
65°	151	115	76	61	60	149
75°	80	50	35	32	31	85
85°	19	10	8	8	8	23
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	482.5	482.5	482.5	482.5	482.5
2.5°	484.7	482.5	477.7	482.0	481.2
5°	482.5	480.3	474.6	478.5	477.2
7.5°	478.5	475.9	469.8	471.6	469.4
10°	473.3	470.2	461.5	460.2	457.6
12.5°	466.7	462.8	451.0	448.4	443.6
15°	458.9	454.1	439.2	430.9	426.6
17.5°	449.7	442.7	424.4	414.8	407.8
20°	439.2	430.5	408.7	397.8	388.2
22.5°	427.9	417.8	392.5	377.7	371.1
25°	416.5	402.6	373.7	355.8	349.3
27.5°	403.0	388.2	356.3	335.8	325.7
30°	388.6	372.0	337.1	314.8	303.0
32.5°	374.6	354.5	318.7	292.5	281.6
35°	358.9	336.6	298.2	270.7	261.1
37.5°	343.6	319.6	279.0	248.9	238.0
40°	327.5	301.3	258.9	227.9	216.6
42.5°	310.9	282.9	238.8	206.5	195.6
45°	293.4	264.2	218.3	187.3	176.8
47.5°	276.8	245.8	198.7	167.7	158.1
50°	258.5	227.5	179.5	149.3	140.2
52.5°	240.6	207.8	161.1	132.3	124.0
55°	223.1	189.1	141.9	115.7	107.4
57.5°	205.2	170.3	124.9	100.4	93.4
60°	186.9	151.9	107.0	84.7	77.7
62.5°	169.0	134.0	91.7	70.7	67.2
65°	150.6	115.3	76.0	61.1	59.8
67.5°	133.2	97.8	61.1	53.7	52.4
70°	114.8	80.8	50.6	46.3	44.5
72.5°	97.4	65.1	42.4	38.9	38.0
75°	80.3	49.8	34.9	31.9	31.4
77.5°	63.3	35.4	27.5	25.8	24.9
80°	47.6	25.3	21.0	19.2	19.2
82.5°	33.2	17.0	14.4	13.5	13.5
85°	18.8	9.6	8.3	8.3	8.3
87.5°	7.0	3.5	3.5	3.1	3.1
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)