

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: P242364

Luminaire Tested: **S122RDR-S485D835-X4F0-XX-UDD-F-W**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P242364
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: S122RDR-S485D835-X4F0-XX-UDD-F-W
Description: DEFINE 2 REGRESSED DIRECT RECESSED WITH SATIN FLUSH DIFFUSER
STANDARD LIGHT ENGINE
Light Source: (92) 3500K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 1631.7 lumens
Efficiency: N/A
Efficacy: 86.8 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 0.99 / 1.16
Luminous Opening: Rectangular (W 0.15' x L: 3.88' x H: 0')
CIE Type: Direct

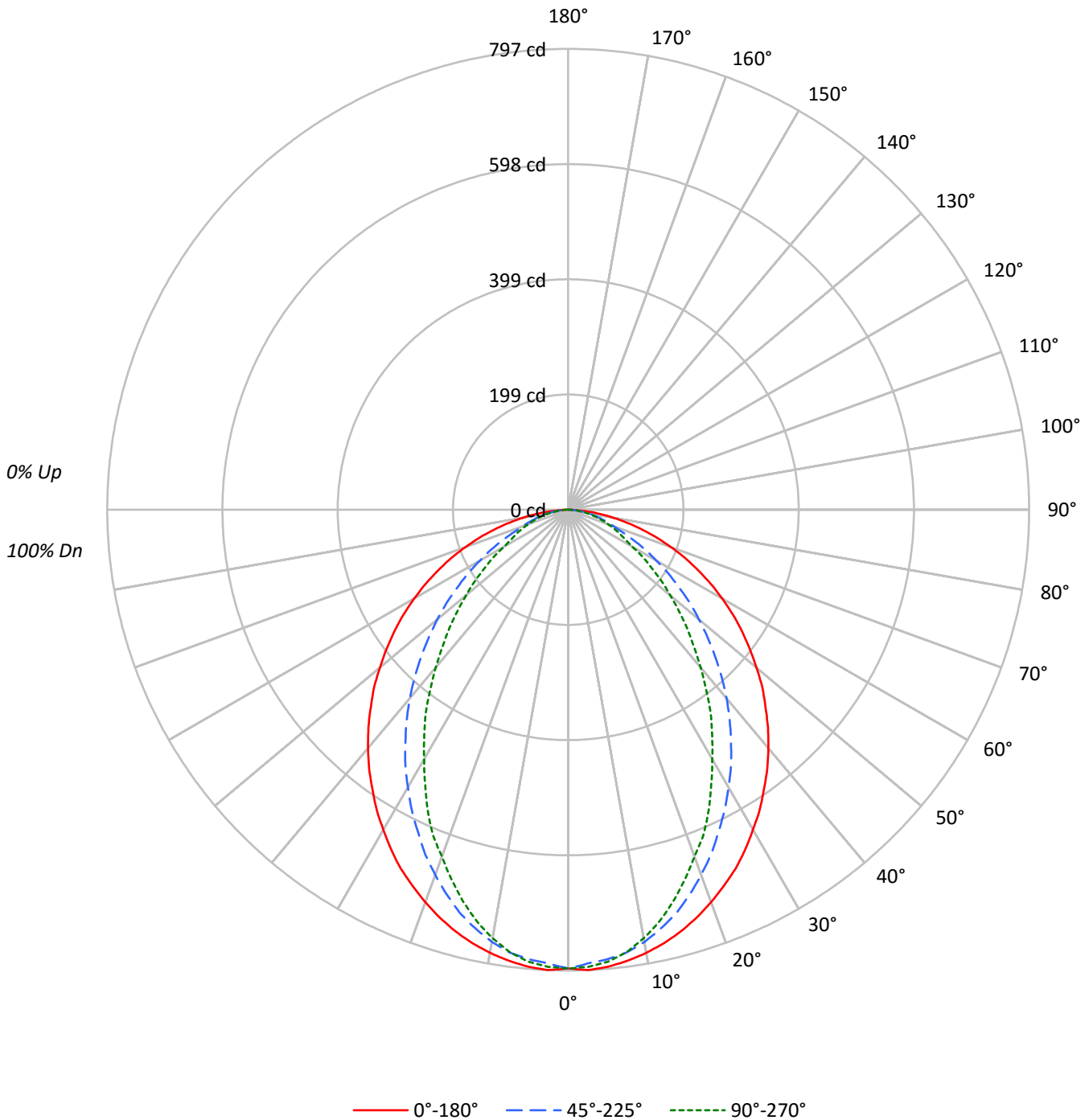
Input Watts (W): 18.8
Input Voltage (V): 120
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P242364

CATALOG NUMBER: S122RDR-S485D835-X4F0-XX-UDD-F-W

Luminous Intensity Polar Plot





TEST NUMBER: P242364

CATALOG NUMBER: S122RDR-S485D835-X4F0-XX-UDD-F-W

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°	15112	15112	15112
5°	15170	14924	15006
10°	15054	14680	14555
15°	14880	14243	13833
20°	14641	13624	12938
25°	14397	12917	12072
30°	14054	12191	10960
35°	13724	11403	9985
40°	13390	10588	8854
45°	12997	9671	7833
50°	12597	8745	6830
55°	12184	7751	5865
60°	11707	6701	4869
65°	11164	5629	4435
70°	10515	4639	4077
75°	9722	4224	3805
80°	8589	3784	3466
85°	6753	2972	2972



TEST NUMBER: P242364

CATALOG NUMBER: S122RDR-S485D835-X4F0-XX-UDD-F-W

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	74.4	4.6
10°-20°	204.1	12.5
20°-30°	286.6	17.6
30°-40°	312.4	19.1
40°-50°	287.1	17.6
50°-60°	225.5	13.8
60°-70°	146.8	9.0
70°-80°	75.6	4.6
80°-90°	19.3	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°	565.1	34.6
0°-40°	877.5	53.8
0°-60°	1390.1	85.2
0°-90°	1631.7	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1631.7	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	793	793	793	793	793	
5°	793	790	780	787	785	75
15°	755	747	722	709	702	213
25°	685	662	615	585	574	315
35°	590	554	490	445	429	369
45°	482	434	359	308	291	373
55°	367	311	233	190	177	328
65°	248	190	125	100	98	246
75°	132	82	57	52	52	140
85°	31	16	14	14	14	37
90°	0	0	0	0	0	



TEST NUMBER: P242364

CATALOG NUMBER: S122RDR-S485D835-X4F0-XX-UDD-F-W

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	793.4	793.4	793.4	793.4	793.4
2.5°	797.0	793.4	785.5	792.7	791.3
5°	793.4	789.8	780.5	787.0	784.8
7.5°	787.0	782.6	772.6	775.5	771.9
10°	778.3	773.3	759.0	756.8	752.5
12.5°	767.6	761.1	741.7	737.4	729.5
15°	754.6	746.7	722.3	708.7	701.5
17.5°	739.6	728.1	697.9	682.1	670.6
20°	722.3	708.0	672.1	654.1	638.3
22.5°	703.7	687.1	645.5	621.1	610.3
25°	685.0	662.0	614.6	585.2	574.4
27.5°	662.7	638.3	585.9	552.2	535.6
30°	639.0	611.8	554.3	517.7	498.3
32.5°	616.1	583.0	524.2	481.1	463.1
35°	590.2	553.6	490.4	445.2	429.4
37.5°	565.1	525.6	458.8	409.3	391.3
40°	538.5	495.4	425.8	374.8	356.1
42.5°	511.2	465.3	392.8	339.6	321.7
45°	482.5	434.4	359.0	308.0	290.8
47.5°	455.2	404.2	326.7	275.7	259.9
50°	425.1	374.1	295.1	245.6	230.5
52.5°	395.6	341.8	265.0	217.6	203.9
55°	366.9	310.9	233.4	190.3	176.6
57.5°	337.5	280.0	205.4	165.1	153.7
60°	307.3	249.9	175.9	139.3	127.8
62.5°	277.9	220.4	150.8	116.3	110.6
65°	247.7	189.6	124.9	100.5	98.4
67.5°	219.0	160.8	100.5	88.3	86.2
70°	188.8	132.8	83.3	76.1	73.2
72.5°	160.1	107.0	69.6	63.9	62.5
75°	132.1	81.9	57.4	52.4	51.7
77.5°	104.1	58.2	45.2	42.4	40.9
80°	78.3	41.6	34.5	31.6	31.6
82.5°	54.6	28.0	23.7	22.3	22.3
85°	30.9	15.8	13.6	13.6	13.6
87.5°	11.5	5.7	5.7	5.0	5.0
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)