

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: P334780

Luminaire Tested: **S123IW-S460U935-4F0-1E-UDD**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P334780
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1807-864-5)
Test Lab: INNOVATION CENTER
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: NEO-RAY
Catalog Number: S123IW-S460U935-4F0-1E-UDD
Description: DEFINE 3 INDIRECT LED LUMINAIRE, NO LENS
WALL MOUNT, 460 LUMENS PER FOOT
Light Source: 3500K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

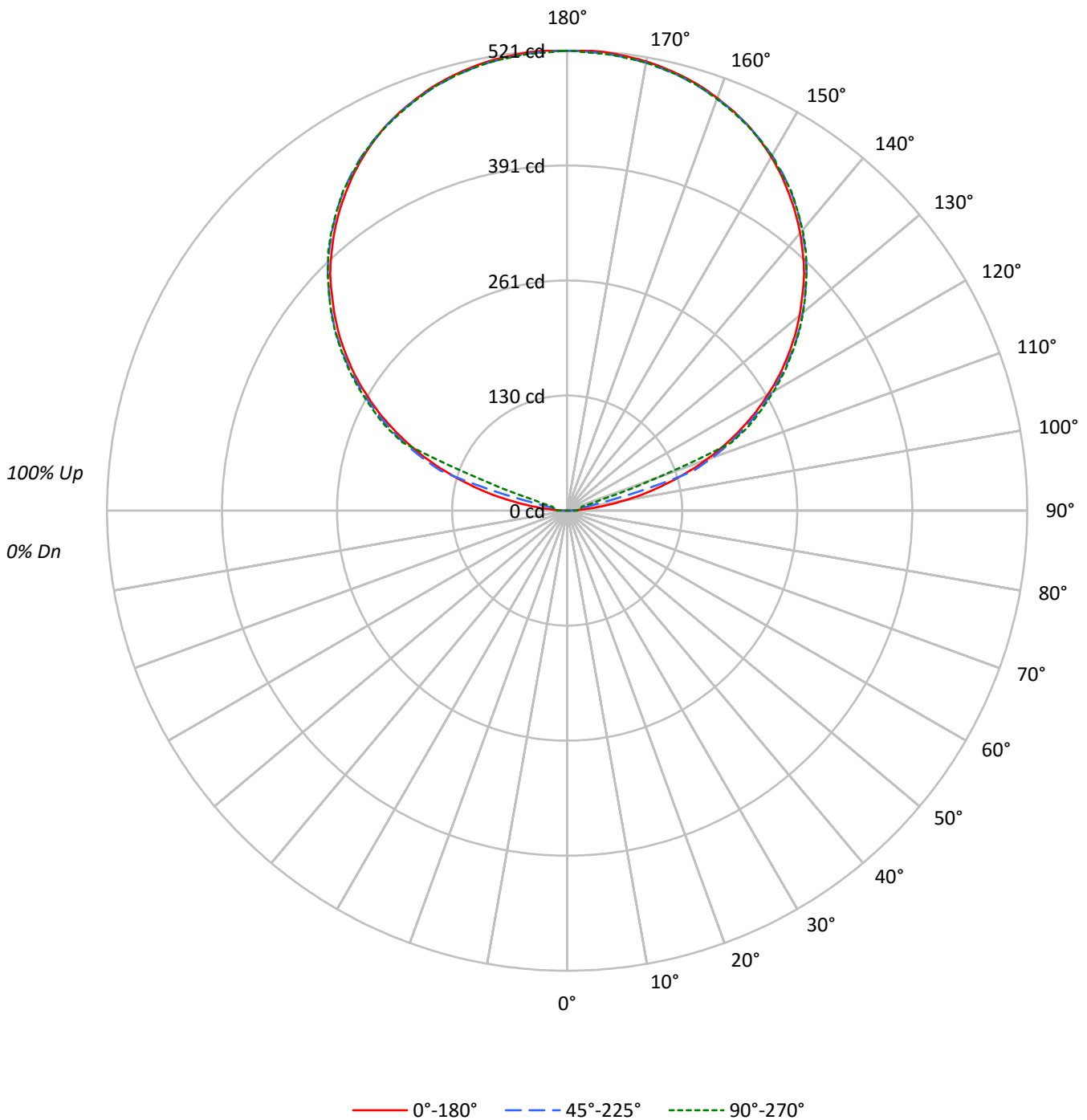
Lumens per Lamp: N/A
Luminaire Lumens: 1588.4 lumens
Efficiency: N/A
Efficacy: 182.6 lumens/watt
Spacing Criteria (0/90/45): - / - / -
Luminous Opening: Rectangular (W 0.25' x L: 4' x H: 0')
CIE Type: Indirect

Input Watts (W): 8.7
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	95	95	95	95	81	81	81	81	56	56	56	32	32	32	10	10	10	0
1	87	83	79	76	74	71	68	65	48	47	45	28	27	26	9	9	8	0
2	79	72	66	62	67	62	57	53	42	40	37	24	23	22	8	7	7	0
3	72	63	56	51	61	54	49	44	37	34	31	21	20	18	7	6	6	0
4	65	56	48	43	56	48	42	37	33	29	26	19	17	16	6	6	5	0
5	60	49	42	36	51	42	36	32	29	25	22	17	15	13	5	5	4	0
6	55	44	36	31	47	38	32	27	26	22	19	15	13	11	5	4	4	0
7	50	39	32	27	43	34	28	23	23	19	17	14	11	10	4	4	3	0
8	47	35	28	23	40	30	24	20	21	17	14	12	10	9	4	3	3	0
9	43	32	25	20	37	27	22	18	19	15	13	11	9	8	4	3	3	0
10	40	29	22	18	34	25	19	16	17	14	11	10	8	7	3	3	2	0

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	0	0	0
5°	0	0	0
10°	0	0	0
15°	0	0	0
20°	0	0	0
25°	0	0	0
30°	0	0	0
35°	0	0	0
40°	0	0	0
45°	0	0	0
50°	0	0	0
55°	0	0	0
60°	0	0	0
65°	0	0	0
70°	0	0	0
75°	0	0	0
80°	0	0	0
85°	0	0	0



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	0.0	0.0
10°-20°	0.0	0.0
20°-30°	0.0	0.0
30°-40°	0.0	0.0
40°-50°	0.0	0.0
50°-60°	0.0	0.0
60°-70°	0.0	0.0
70°-80°	0.0	0.0
80°-90°	1.0	0.1
90°-100°	18.4	1.2
100°-110°	88.8	5.6
110°-120°	217.5	13.7
120°-130°	276.2	17.4
130°-140°	295.0	18.6
140°-150°	275.9	17.4
150°-160°	222.5	14.0
160°-170°	143.6	9.0
170°-180°	49.5	3.1
0°-30°	0.0	0.0
0°-40°	0.0	0.0
0°-60°	0.0	0.0
0°-90°	1.0	0.1
90°-120°	324.7	20.4
90°-150°	1171.7	73.8
90°-180°	1587.0	99.9
0°-180°	1588.4	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	0	0	0	0	0	
5°	0	0	0	0	0	0
15°	0	0	0	0	0	0
25°	0	0	0	0	0	0
35°	0	0	0	0	0	0
45°	0	0	0	0	0	0
55°	0	0	0	0	0	0
65°	0	0	0	0	0	0
75°	0	0	0	0	0	0
85°	0	0	0	0	0	0
90°	0	4	9	11	12	1
95°	24	8	12	15	15	28
105°	115	120	85	16	17	122
115°	216	219	222	226	228	214
125°	305	308	310	310	311	272
135°	380	382	383	384	383	292
145°	438	441	441	442	442	274
155°	482	482	482	484	482	222
165°	509	508	507	510	508	144
175°	521	519	519	522	519	50
180°	521	521	521	521	521	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	0.0	0.0	0.0	0.0	0.0
2.5°	0.0	0.0	0.0	0.0	0.0
5°	0.0	0.0	0.0	0.0	0.0
7.5°	0.0	0.0	0.0	0.0	0.0
10°	0.0	0.0	0.0	0.0	0.0
12.5°	0.0	0.0	0.0	0.0	0.0
15°	0.0	0.0	0.0	0.0	0.0
17.5°	0.0	0.0	0.0	0.0	0.0
20°	0.0	0.0	0.0	0.0	0.0
22.5°	0.0	0.0	0.0	0.0	0.0
25°	0.0	0.0	0.0	0.0	0.0
27.5°	0.0	0.0	0.0	0.0	0.0
30°	0.0	0.0	0.0	0.0	0.0
32.5°	0.0	0.0	0.0	0.0	0.0
35°	0.0	0.0	0.0	0.0	0.0
37.5°	0.0	0.0	0.0	0.0	0.0
40°	0.0	0.0	0.0	0.0	0.0
42.5°	0.0	0.0	0.0	0.0	0.0
45°	0.0	0.0	0.0	0.0	0.0
47.5°	0.0	0.0	0.0	0.0	0.0
50°	0.0	0.0	0.0	0.0	0.0
52.5°	0.0	0.0	0.0	0.0	0.0
55°	0.0	0.0	0.0	0.0	0.0
57.5°	0.0	0.0	0.0	0.0	0.0
60°	0.0	0.0	0.0	0.0	0.0
62.5°	0.0	0.0	0.0	0.0	0.0
65°	0.0	0.0	0.0	0.0	0.0
67.5°	0.0	0.0	0.0	0.0	0.0
70°	0.0	0.0	0.0	0.0	0.0
72.5°	0.0	0.0	0.0	0.0	0.0
75°	0.0	0.0	0.0	0.0	0.0
77.5°	0.0	0.0	0.0	0.0	0.0
80°	0.0	0.0	0.0	0.0	0.0
82.5°	0.0	0.0	0.0	0.0	0.0
85°	0.0	0.0	0.0	0.0	0.0
87.5°	0.0	0.0	0.0	0.0	0.0
90°	0.4	4.3	9.3	10.8	11.6
92.5°	8.9	6.6	10.1	12.8	13.2
95°	23.6	7.7	12.0	14.7	14.7
97.5°	42.9	32.1	12.4	15.5	15.9
100°	65.4	73.1	12.8	15.9	16.2
102.5°	90.9	95.9	28.6	15.9	16.6
105°	115.3	119.5	84.7	16.2	17.0
107.5°	141.2	144.7	150.5	90.9	40.2
110°	167.1	170.2	174.5	161.7	106.4



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	191.9	194.6	198.8	202.3	201.5
115°	216.2	218.6	222.0	225.9	227.5
117.5°	240.2	242.9	244.9	248.0	248.3
120°	262.3	265.8	266.9	270.0	270.0
122.5°	284.7	287.4	289.0	290.9	291.3
125°	304.8	307.9	309.5	310.2	311.0
127.5°	324.9	328.0	330.0	331.1	330.4
130°	343.5	346.6	348.1	349.7	348.9
132.5°	361.3	364.4	365.6	367.1	365.9
135°	379.5	381.8	383.3	384.5	383.3
137.5°	395.0	398.0	398.8	400.8	400.0
140°	410.4	412.7	413.9	415.5	414.7
142.5°	424.7	427.1	428.2	429.4	428.2
145°	437.9	440.6	441.4	442.1	442.1
147.5°	450.7	452.6	453.4	454.1	452.2
150°	462.3	463.4	464.2	465.0	463.8
152.5°	472.7	473.1	473.5	475.0	473.1
155°	482.4	481.6	482.0	483.9	481.6
157.5°	490.1	490.1	489.7	492.0	489.0
160°	497.1	496.7	496.3	498.6	495.9
162.5°	503.7	502.5	502.1	504.8	502.5
165°	508.7	507.5	507.1	510.2	507.5
167.5°	512.9	511.4	511.4	514.5	511.4
170°	516.4	514.9	514.9	518.0	514.9
172.5°	518.7	516.8	517.2	520.3	516.8
175°	520.7	518.7	519.1	521.8	518.7
177.5°	521.4	519.5	519.9	523.0	519.1
180°	520.7	520.7	520.7	520.7	520.7

(END OF REPORT)