

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: P334524

Luminaire Tested: **S122IW-S1440U840-4F0-1E-UDD-1**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P334524  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1807-864-8)  
Test Lab: INNOVATION CENTER  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: NEO-RAY  
Catalog Number: S122IW-S1440U840-4F0-1E-UDD-1  
Description: DEFINE 2 INDIRECT LED LUMINAIRE, FLUSH SATIN WHITE DIFFUSER  
WALL MOUNT, 1440 LUMENS PER FOOT  
Light Source: 4000K CCT, 80 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 5049.0 lumens  
Efficiency: N/A  
Efficacy: 165.0 lumens/watt  
Spacing Criteria (0/90/45): - / - / -  
Luminous Opening: Rectangular (W 0.17' x L: 4' x H: 0')  
CIE Type: Indirect

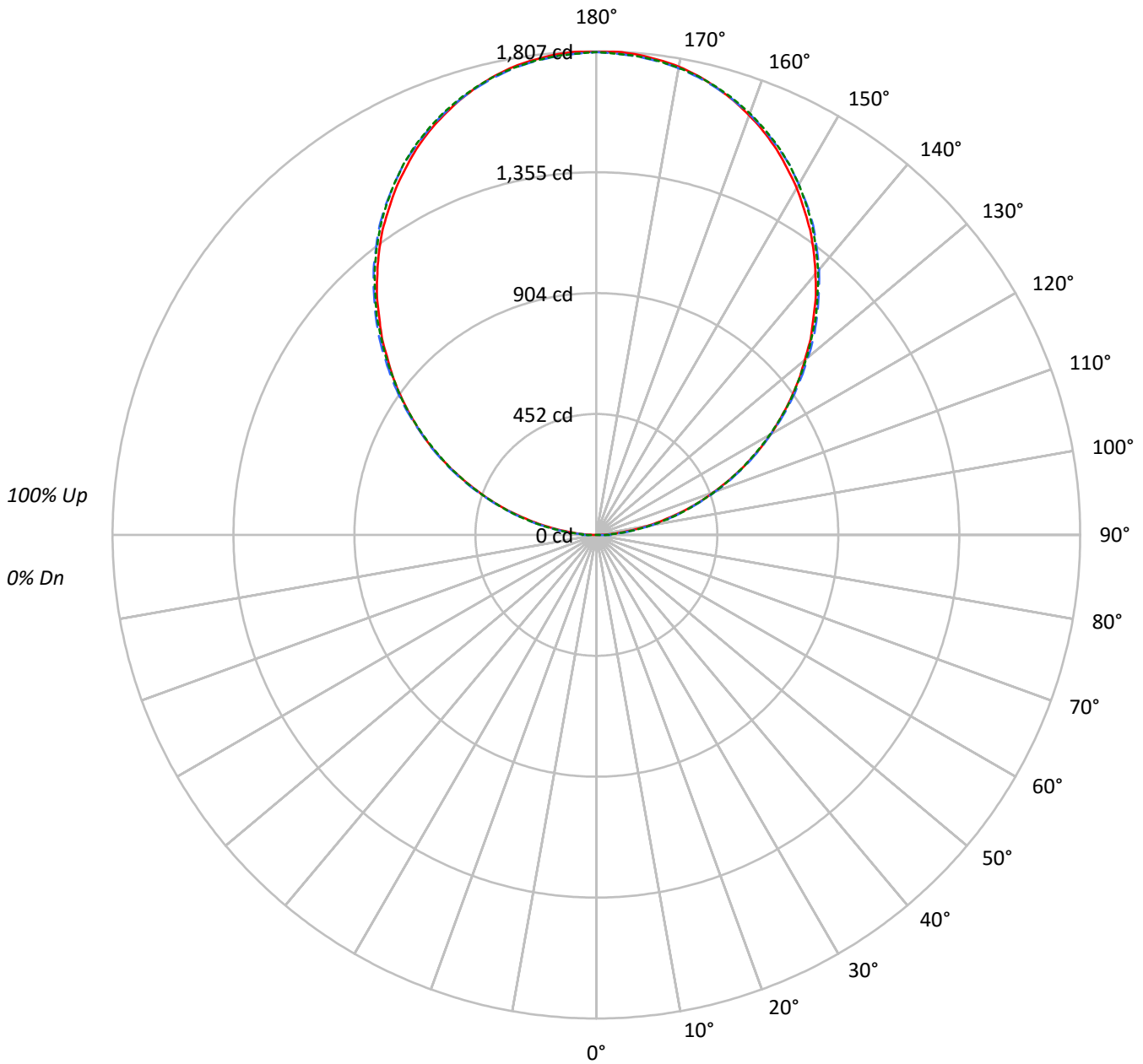
Input Watts (W): 30.6  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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### Luminous Intensity Polar Plot



— 0°-180°    - - 45°-225°    - - - 90°-270°



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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°	5.1	0.1
90°-100°	111.6	2.2
100°-110°	354.8	7.0
110°-120°	607.1	12.0
120°-130°	798.4	15.8
130°-140°	896.2	17.7
140°-150°	878.9	17.4
150°-160°	737.2	14.6
160°-170°	488.9	9.7
170°-180°	170.9	3.4
0°-30°	0.0	0.0
0°-40°	0.0	0.0
0°-60°	0.0	0.0
0°-90°	5.1	0.1
90°-120°	1073.5	21.3
90°-150°	3646.9	72.2
90°-180°	5044.0	99.9
0°-180°	5049.0	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°	2	20	53	50	52	5
95°	79	94	97	97	94	88
105°	327	332	335	338	338	346
115°	609	618	615	614	609	602
125°	886	900	895	891	889	792
135°	1146	1163	1166	1165	1160	886
145°	1392	1402	1411	1413	1407	869
155°	1591	1596	1600	1608	1603	732
165°	1731	1730	1730	1740	1732	488
175°	1801	1796	1793	1804	1795	171
180°	1804	1804	1804	1804	1804	



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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°	1.5	19.8	53.3	50.2	51.8
92.5°	33.5	45.7	47.2	48.7	48.7
95°	79.2	94.4	97.4	97.4	94.4
97.5°	132.5	146.2	152.2	152.2	152.2
100°	193.3	205.5	210.1	210.1	208.6
102.5°	257.3	266.4	272.5	274.0	272.5
105°	327.3	331.9	334.9	338.0	338.0
107.5°	397.4	403.4	403.4	405.0	397.4
110°	464.3	473.5	473.5	473.5	468.9



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**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°
112.5°	537.4	546.6	545.0	540.5	537.4
115°	609.0	618.1	615.1	613.5	609.0
117.5°	680.5	692.7	685.1	680.5	676.0
120°	752.1	764.3	752.1	752.1	747.5
122.5°	817.5	832.8	825.2	820.6	817.5
125°	886.1	899.8	895.2	890.6	889.1
127.5°	953.0	969.8	963.7	957.6	953.0
130°	1015.5	1035.3	1032.2	1029.2	1023.1
132.5°	1085.5	1100.7	1102.2	1094.6	1090.1
135°	1146.4	1163.1	1166.2	1164.7	1160.1
137.5°	1213.4	1227.1	1230.1	1228.6	1222.5
140°	1272.8	1286.5	1294.1	1294.1	1288.0
142.5°	1333.7	1347.4	1351.9	1353.4	1347.4
145°	1391.5	1402.2	1411.3	1412.8	1406.7
147.5°	1443.3	1457.0	1463.1	1466.1	1460.0
150°	1496.6	1505.7	1511.8	1516.3	1511.8
152.5°	1543.7	1552.9	1560.5	1566.6	1560.5
155°	1590.9	1595.5	1600.1	1607.7	1603.1
157.5°	1632.0	1635.1	1638.1	1648.8	1641.2
160°	1668.6	1671.6	1673.2	1682.3	1676.2
162.5°	1702.1	1702.1	1703.6	1714.3	1706.6
165°	1731.0	1729.5	1729.5	1740.1	1732.5
167.5°	1756.9	1752.3	1752.3	1763.0	1755.4
170°	1776.7	1772.1	1770.6	1781.2	1772.1
172.5°	1790.4	1785.8	1784.3	1794.9	1785.8
175°	1801.0	1796.5	1793.4	1804.1	1794.9
177.5°	1807.1	1802.6	1799.5	1808.6	1799.5
180°	1804.1	1804.1	1804.1	1804.1	1804.1

(END OF REPORT)