

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: P334884

Luminaire Tested: **S124IW-S1560U930-4F0-1E-UDD-1**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P334884  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1807-864-10)  
Test Lab: INNOVATION CENTER  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: NEO-RAY  
Catalog Number: S124IW-S1560U930-4F0-1E-UDD-1  
Description: DEFINE 4 INDIRECT LED LUMINAIRE, FLUSH SATIN WHITE DIFFUSER  
WALL MOUNT, 1560 LUMENS PER FOOT  
Light Source: 3000K CCT, 90 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 4413.8 lumens  
Efficiency: N/A  
Efficacy: 144.2 lumens/watt  
Spacing Criteria (0/90/45): - / - / -  
Luminous Opening: Rectangular (W 0.33' x L: 4' x H: 0')  
CIE Type: Indirect

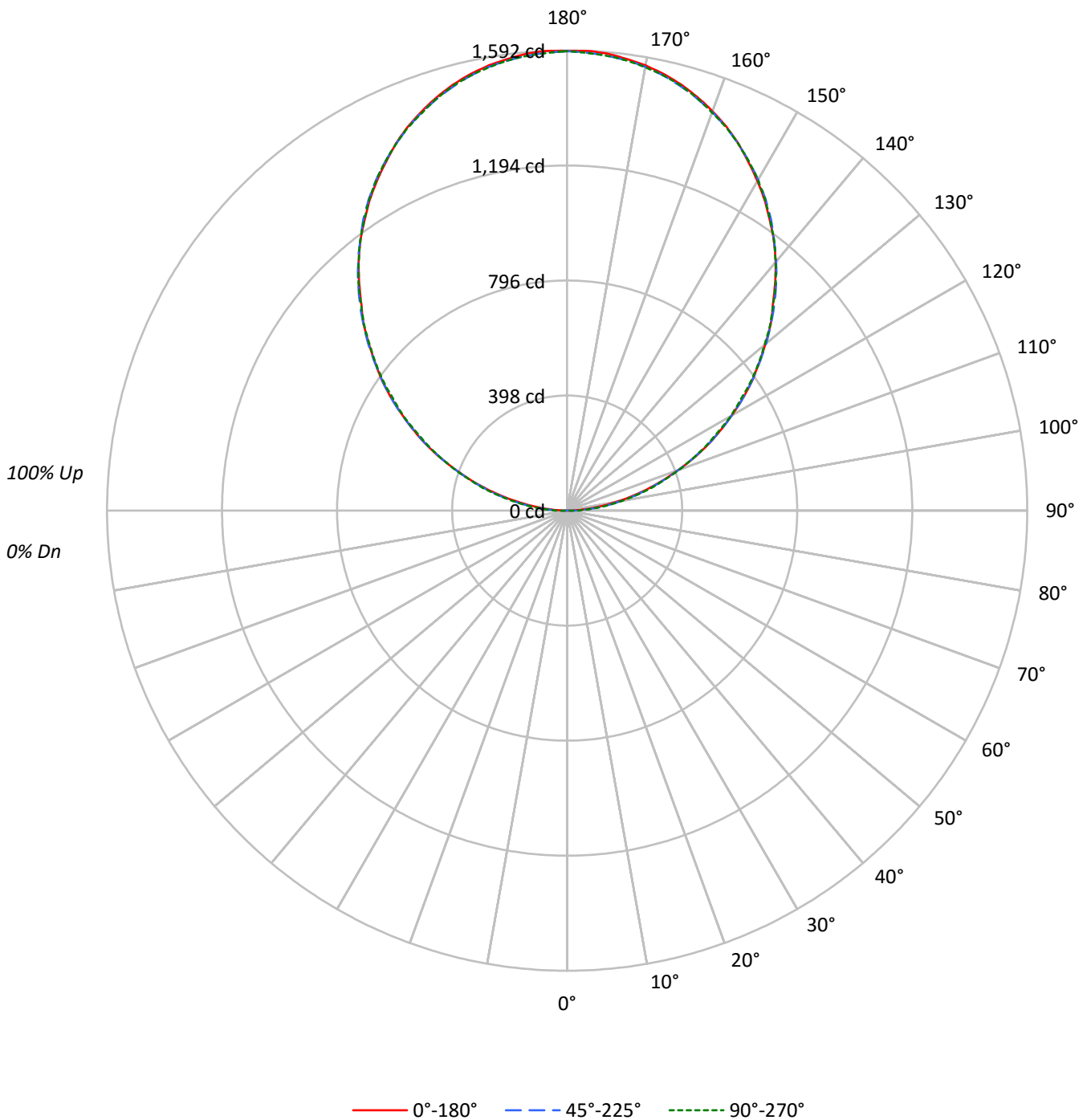
Input Watts (W): 30.6  
Input Voltage (V): 120  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	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°	3.4	0.1
90°-100°	103.6	2.3
100°-110°	310.3	7.0
110°-120°	527.2	11.9
120°-130°	695.3	15.8
130°-140°	780.9	17.7
140°-150°	767.5	17.4
150°-160°	645.6	14.6
160°-170°	429.5	9.7
170°-180°	150.4	3.4
0°-30°	0.0	0.0
0°-40°	0.0	0.0
0°-60°	0.0	0.0
0°-90°	3.4	0.1
90°-120°	941.1	21.3
90°-150°	3184.9	72.2
90°-180°	4410.0	99.9
0°-180°	4413.8	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°	4	17	27	34	37	5
95°	74	85	93	97	97	80
105°	286	288	293	296	300	304
115°	536	536	534	532	531	529
125°	781	781	779	777	774	696
135°	1007	1014	1014	1012	1008	779
145°	1223	1228	1229	1228	1224	766
155°	1401	1401	1400	1405	1400	645
165°	1526	1522	1520	1527	1522	430
175°	1587	1581	1580	1588	1580	151
180°	1590	1590	1590	1590	1590	



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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°	3.7	17.2	27.0	34.4	36.9
92.5°	32.0	47.9	54.1	57.8	59.0
95°	73.8	84.8	93.4	97.1	97.1
97.5°	118.0	127.9	137.7	142.6	142.6
100°	172.1	177.0	188.1	190.5	190.5
102.5°	228.7	229.9	239.7	243.4	244.6
105°	286.4	287.7	292.6	296.3	300.0
107.5°	346.7	347.9	349.1	354.0	352.8
110°	408.1	410.6	409.4	406.9	410.6



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**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°
112.5°	472.1	472.1	469.6	469.6	469.6
115°	536.0	536.0	533.5	532.3	531.1
117.5°	596.2	596.2	595.0	591.3	587.6
120°	656.5	661.4	657.7	651.5	654.0
122.5°	719.2	720.4	719.2	715.5	709.3
125°	780.6	780.6	779.4	776.9	774.5
127.5°	836.0	839.6	837.2	834.7	833.5
130°	895.0	898.6	898.6	896.2	891.3
132.5°	955.2	957.7	956.4	954.0	952.7
135°	1006.8	1014.2	1014.2	1011.7	1008.1
137.5°	1064.6	1068.3	1070.8	1067.1	1068.3
140°	1122.4	1124.8	1124.8	1123.6	1122.4
142.5°	1175.2	1177.7	1176.5	1176.5	1176.5
145°	1223.2	1228.1	1229.3	1228.1	1224.4
147.5°	1272.4	1278.5	1277.3	1276.1	1274.8
150°	1316.6	1321.5	1321.5	1321.5	1320.3
152.5°	1358.4	1360.9	1362.1	1365.8	1362.1
155°	1401.4	1401.4	1400.2	1405.1	1400.2
157.5°	1438.3	1435.9	1435.9	1439.6	1435.9
160°	1470.3	1469.1	1467.8	1471.5	1465.4
162.5°	1499.8	1496.1	1494.9	1502.3	1496.1
165°	1525.6	1521.9	1519.5	1526.8	1521.9
167.5°	1546.5	1541.6	1541.6	1549.0	1541.6
170°	1563.7	1557.6	1558.8	1566.2	1557.6
172.5°	1576.0	1571.1	1571.1	1579.7	1571.1
175°	1587.1	1580.9	1579.7	1588.3	1579.7
177.5°	1592.0	1585.8	1585.8	1594.5	1584.6
180°	1589.5	1589.5	1589.5	1589.5	1589.5

(END OF REPORT)