

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: G3-1802-639-27

Luminaire Tested: **S125RDR-S850D835-X4F0-XX-UDD-F-W**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: G3-1802-639-27
Test Lab: INNOVATION CENTER(G3)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: NEO-RAY
Catalog Number: S125RDR-S850D835-X4F0-XX-UDD-F-W
Description: DEFINE 5 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: 3128.1 lumens
Efficiency: N/A
Efficacy: 118.5 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.11 / 1.25
Luminous Opening: Rectangular (W 0.41' x L: 3.88' x H: 0')
CIE Type: Direct

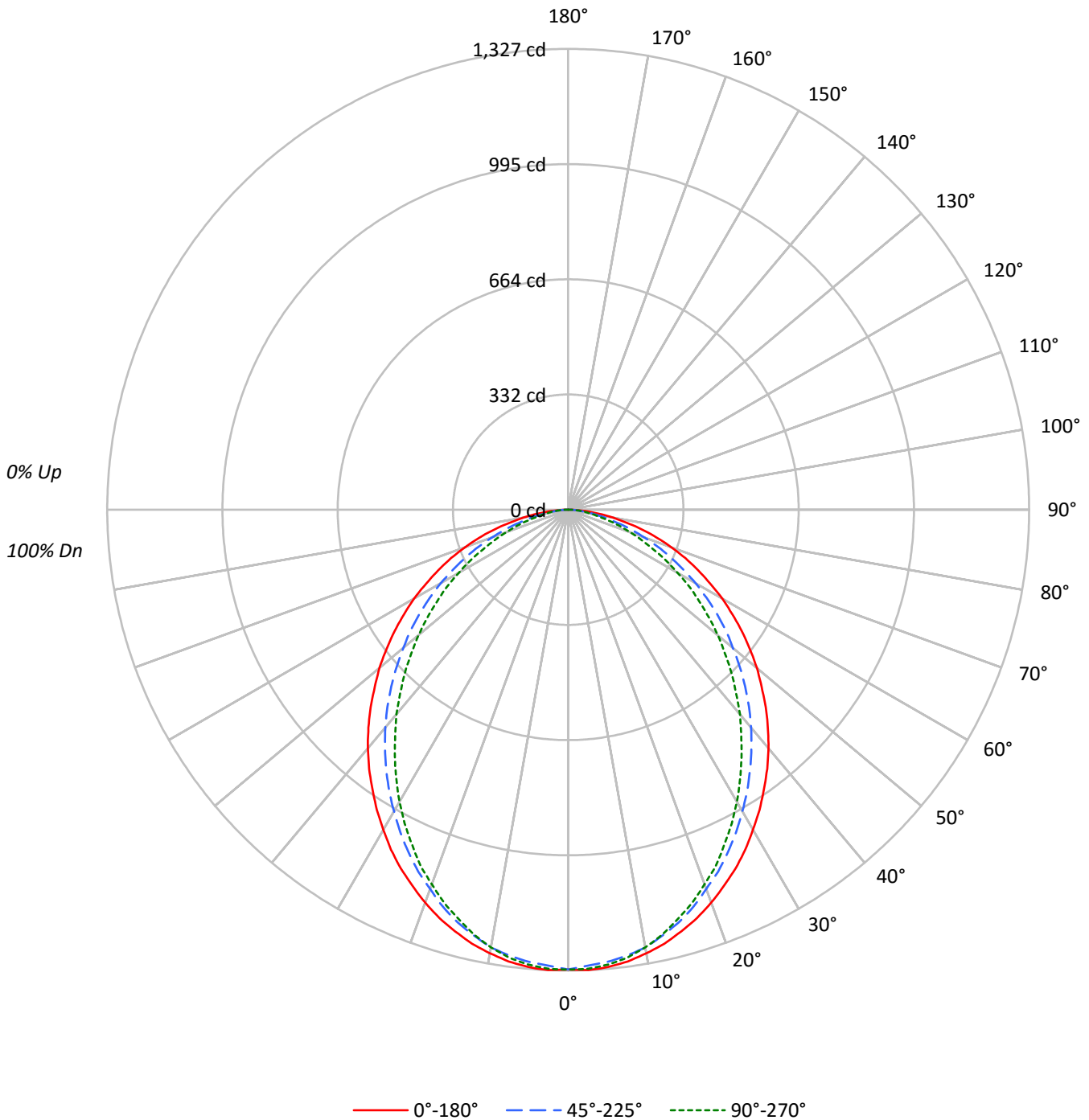
Input Watts (W): 26.4
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100
1	109	105	101	97	107	103	99	96	99	96	93	95	92	90	91	89	87	85
2	100	92	86	80	98	90	84	79	87	82	78	84	79	76	81	77	74	72
3	92	82	74	68	89	80	73	67	77	71	66	74	69	65	72	67	64	61
4	84	73	64	58	82	71	64	57	69	62	57	67	61	56	64	59	55	53
5	78	65	57	50	76	64	56	50	62	55	49	60	54	49	58	53	48	46
6	72	59	50	44	70	58	50	44	56	49	44	55	48	43	53	47	43	41
7	67	54	45	39	65	53	45	39	51	44	39	50	43	39	49	43	38	36
8	62	49	41	35	61	48	41	35	47	40	35	46	39	35	45	39	34	33
9	58	45	37	32	57	45	37	32	44	37	32	42	36	31	41	36	31	29
10	55	42	34	29	54	41	34	29	40	34	29	39	33	29	39	33	29	27

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	9053	9053	9053
5°	9074	8971	9026
10°	9005	8887	8887
15°	8898	8707	8636
20°	8761	8455	8353
25°	8601	8208	8027
30°	8401	7919	7666
35°	8197	7621	7262
40°	8007	7310	6864
45°	7775	6962	6430
50°	7542	6585	5978
55°	7272	6223	5496
60°	7002	5785	4978
65°	6682	5274	4385
70°	6317	4638	3778
75°	5812	3910	3144
80°	5119	3071	2638
85°	4315	2510	2354



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	124.6	4.0
10°-20°	348.2	11.1
20°-30°	504.9	16.1
30°-40°	575.3	18.4
40°-50°	560.7	17.9
50°-60°	471.9	15.1
60°-70°	330.7	10.6
70°-80°	169.5	5.4
80°-90°	42.3	1.4
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°	977.8	31.3
0°-40°	1553.1	49.6
0°-60°	2585.7	82.7
0°-90°	3128.1	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3128.1	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1324	1324	1324	1324	1324	
5°	1322	1318	1307	1317	1315	125
15°	1257	1251	1230	1229	1220	354
25°	1140	1125	1088	1075	1064	525
35°	982	958	913	884	870	615
45°	804	775	720	680	665	620
55°	610	578	522	477	461	545
65°	413	379	326	286	271	409
75°	220	190	148	126	119	233
85°	55	37	32	31	30	63
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1324	1324	1324	1324	1324
2.5°	1327	1324	1314	1324	1323
5°	1322	1318	1307	1317	1315
7.5°	1312	1308	1295	1303	1301
10°	1297	1294	1280	1283	1280
12.5°	1280	1276	1256	1258	1253
15°	1257	1251	1230	1229	1220
17.5°	1233	1224	1199	1194	1187
20°	1204	1194	1162	1157	1148
22.5°	1172	1162	1128	1117	1110
25°	1140	1125	1088	1075	1064
27.5°	1104	1086	1047	1030	1019
30°	1064	1045	1003	980	971
32.5°	1025	1002	959	933	921
35°	982	958	913	884	870
37.5°	941	912	866	832	818
40°	897	867	819	781	769
42.5°	851	820	770	734	715
45°	804	775	720	680	665
47.5°	755	725	670	629	612
50°	709	676	619	577	562
52.5°	659	625	572	526	511
55°	610	578	522	477	461
57.5°	560	526	472	428	414
60°	512	477	423	379	364
62.5°	461	428	373	333	318
65°	413	379	326	286	271
67.5°	365	331	280	242	230
70°	316	282	232	201	189
72.5°	268	235	189	161	154
75°	220	190	148	126	119
77.5°	171	147	112	95	89
80°	130	106	78	69	67
82.5°	90	69	52	49	48
85°	55	37	32	31	30
87.5°	23	16	15	15	14
90°	0	0	0	0	0

(END OF REPORT)