

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: LUMIERE

Report Number: P221835

Luminaire Tested: **9004-W2-[RW, RI]-LED3590-W-BK-L1-UNV**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P221835
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P29494)
Test Lab: INNOVATION CENTER-P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: LUMIERE
Catalog Number: 9004-W2-[RW, RI]-LED3590-W-BK-L1-UNV
Description: LUMIERE LANTERRA 9004 LED WALL LUMINAIRE, RECESSED LENS, WIDE FLOOD OPTIC, BLACK HOUSING.
Light Source: (1) 3500K CCT, 90 CRI LED
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 1613.1 lumens
Efficiency: N/A
Efficacy: 81.9 lumens/watt
Spacing Criteria (0/90/45): 0.85 / 0.85 / 0.83
Luminous Opening: Circular (Dia: 0.33' x H: 0')
CIE Type: General Diffuse

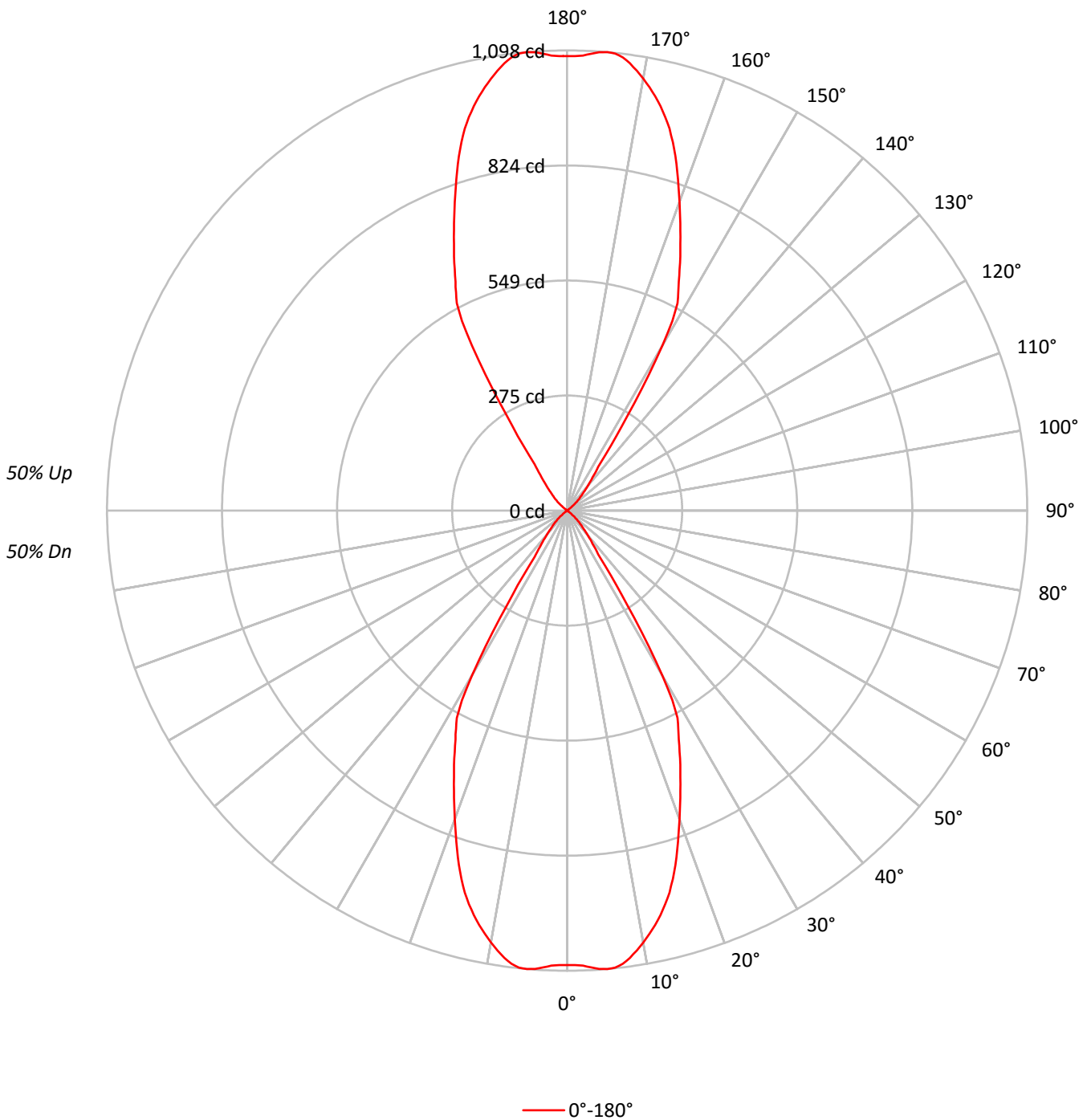
Input Watts (W): 19.7
Input Voltage (V): 120
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P221835

CATALOG NUMBER: 9004-W2-[RW, RI]-LED3590-W-BK-L1-UNV

Luminous Intensity Polar Plot





TEST NUMBER: P221835

CATALOG NUMBER: 9004-W2-[RW, RI]-LED3590-W-BK-L1-UNV

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	107	107	107	107	99	99	99	99	83	83	83		69	69	69		56	56	56	50
1	100	97	94	91	93	90	87	85	77	75	74		65	64	63		53	53	52	47
2	94	88	83	79	87	82	78	75	71	68	66		60	59	57		51	50	49	44
3	88	80	75	70	81	75	70	67	65	62	59		56	54	52		48	47	45	42
4	82	74	68	63	76	69	64	60	61	57	54		53	50	48		46	44	42	39
5	77	68	62	57	72	64	58	54	57	52	49		50	47	44		43	41	40	37
6	72	63	56	52	68	59	54	50	53	49	45		47	44	41		41	39	37	35
7	68	58	52	47	64	55	50	46	49	45	42		44	41	38		39	37	35	33
8	64	54	48	44	60	52	46	42	46	42	39		41	38	36		37	35	33	31
9	61	51	45	40	57	48	43	39	44	39	36		39	36	34		35	33	31	29
10	58	48	42	38	54	45	40	36	41	37	34		37	34	32		33	31	29	28

AVERAGE LUMINANCE (cd/sqm):

	0°
0°	133793
5°	135976
10°	131072
15°	120482
20°	102857
25°	86408
30°	64690
35°	20298
40°	12028
45°	7309
50°	3051
55°	516
60°	345
65°	204
70°	108
75°	143
80°	0
85°	0



TEST NUMBER: P221835

CATALOG NUMBER: 9004-W2-[RW, RI]-LED3590-W-BK-L1-UNV

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	103.2	6.4
10°-20°	260.2	16.1
20°-30°	289.8	18.0
30°-40°	115.6	7.2
40°-50°	33.1	2.0
50°-60°	3.7	0.2
60°-70°	0.7	0.0
70°-80°	0.3	0.0
80°-90°	0.0	0.0
90°-100°	0.0	0.0
100°-110°	0.3	0.0
110°-120°	0.7	0.0
120°-130°	3.7	0.2
130°-140°	33.1	2.0
140°-150°	115.6	7.2
150°-160°	289.8	18.0
160°-170°	260.2	16.1
170°-180°	103.2	6.4
0°-30°	653.2	40.5
0°-40°	768.9	47.7
0°-60°	805.6	49.9
0°-90°	806.6	50.0
90°-120°	1.0	0.1
90°-150°	153.4	9.5
90°-180°	807.0	50.0
0°-180°	1613.1	100.0

CANDELA DISTRIBUTION:

	0°	Flux
0°	1085	
5°	1098	103
15°	944	260
25°	635	290
35°	135	116
45°	42	33
55°	2	4
65°	1	1
75°	0	0
85°	0	0
90°	0	0
95°	0	0
105°	0	0
115°	1	1
125°	2	4
135°	42	33
145°	135	116
155°	635	290
165°	944	260
175°	1098	103
180°	1085	



TEST NUMBER: P221835

CATALOG NUMBER: 9004-W2-[RW, RI]-LED3590-W-BK-L1-UNV

CANDELA DISTRIBUTION (FULL):

0°	
0°	1084.7
1°	1084.4
2°	1086.4
3°	1091.5
4°	1096.2
5°	1098.2
6°	1096.9
7°	1089.8
8°	1077.6
9°	1062.7
10°	1046.5
11°	1028.9
12°	1010.7
13°	990.4
14°	968.1
15°	943.5
16°	914.7
17°	884.0
18°	850.5
19°	816.4
20°	783.6
21°	751.9
22°	721.4
23°	691.7
24°	663.7
25°	634.9
26°	607.9
27°	584.6
28°	560.3
29°	517.3
30°	454.2
32.5°	265.6
35°	134.8
37.5°	99.7
40°	74.7
42.5°	55.4
45°	41.9
47.5°	31.1
50°	15.9
52.5°	4.1
55°	2.4
57.5°	1.7
60°	1.4
62.5°	1.0
65°	0.7



TEST NUMBER: P221835

CATALOG NUMBER: 9004-W2-[RW, RI]-LED3590-W-BK-L1-UNV

CANDELA DISTRIBUTION (continued):

	0°
67.5°	0.3
70°	0.3
72.5°	0.3
75°	0.3
77.5°	0.3
80°	0.0
82.5°	0.0
85°	0.0
87.5°	0.0
90°	0.0
92.5°	0.0
95°	0.0
97.5°	0.0
100°	0.0
102.5°	0.3
105°	0.3
107.5°	0.3
110°	0.3
112.5°	0.3
115°	0.7
117.5°	1.0
120°	1.4
122.5°	1.7
125°	2.4
127.5°	4.1
130°	15.9
132.5°	31.1
135°	41.9
137.5°	55.4
140°	74.7
142.5°	99.7
145°	134.8
147.5°	265.6
150°	454.2
151°	517.3
152°	560.3
153°	584.6
154°	607.9
155°	634.9
156°	663.7
157°	691.7
158°	721.4
159°	751.9
160°	783.6
161°	816.4



TEST NUMBER: P221835

CATALOG NUMBER: 9004-W2-[RW, RI]-LED3590-W-BK-L1-UNV

CANDELA DISTRIBUTION (continued):

	0°
162°	850.5
163°	884.0
164°	914.7
165°	943.5
166°	968.1
167°	990.4
168°	1010.7
169°	1028.9
170°	1046.5
171°	1062.7
172°	1077.6
173°	1089.8
174°	1096.9
175°	1098.2
176°	1096.2
177°	1091.5
178°	1086.4
179°	1084.4
180°	1084.7

(END OF REPORT)