

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: CORELITE

Report Number: P213077

Luminaire Tested: **DSI-WD-20L840-1D-UNV-4-STD-DC-W**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P213077
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P35733)
Test Lab: INNOVATION CENTER-P3
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: CORELITE
Catalog Number: DSI-WD-20L840-1D-UNV-4-STD-DC-W
Description: DIVIDE 4' SUSPENDED WAVESTREAM LED LUMINAIRE
WaveStream DIFFUSE OPTIC WITH DUST COVER, LIGHT LEVEL 1.
Light Source: (308) 4000K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2120.7 lumens
Efficiency: N/A
Efficacy: 139.5 lumens/watt
Spacing Criteria (0/90/45): 1.34 / 1.47 / 1.55
Luminous Opening: Rectangular (W 0.83' x L: 3.83' x H: 0')
CIE Type: Semi-Direct

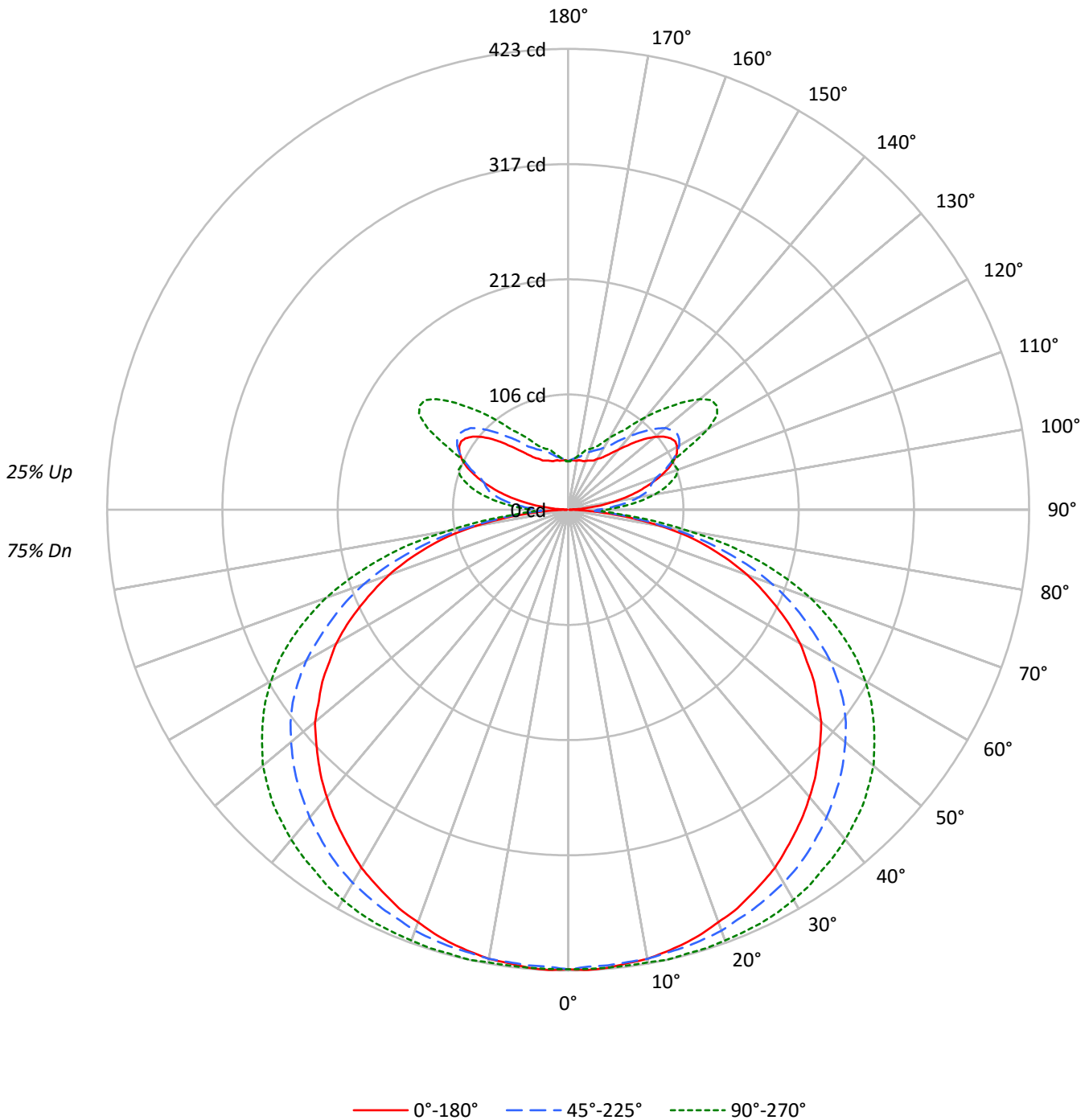
Input Watts (W): 15.2
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	113	113	113	113	108	108	108	108	97	97	97	88	88	88	79	79	79	75
1	102	97	92	88	97	92	88	84	83	80	77	75	73	70	68	66	64	60
2	92	83	76	70	87	79	73	67	72	67	62	65	61	57	58	55	52	49
3	83	72	64	57	79	69	61	55	62	56	51	56	51	47	51	47	43	40
4	76	63	55	48	71	60	52	46	55	48	43	50	44	39	45	40	36	33
5	69	56	47	40	65	54	45	39	49	42	36	44	38	34	40	35	31	28
6	64	50	41	35	60	48	40	34	44	37	31	40	34	29	36	31	27	24
7	59	45	36	30	56	43	35	29	39	32	27	36	30	26	32	27	24	21
8	54	41	32	27	52	39	31	26	36	29	24	33	27	23	30	25	21	19
9	51	37	29	24	48	36	28	23	33	26	22	30	24	20	27	22	19	17
10	47	34	26	21	45	33	26	21	30	24	19	28	22	18	25	20	17	15

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	1422	1422	1422
5°	1427	1420	1427
10°	1433	1433	1444
15°	1438	1449	1472
20°	1444	1475	1509
25°	1458	1502	1557
30°	1477	1538	1608
35°	1491	1578	1666
40°	1515	1623	1739
45°	1546	1677	1824
50°	1589	1739	1917
55°	1619	1812	2011
60°	1657	1871	2121
65°	1682	1910	2231
70°	1723	1963	2329
75°	1739	1946	2360
80°	1667	1789	2181
85°	1229	1597	1844



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	40.2	1.9
10°-20°	117.9	5.6
20°-30°	187.0	8.8
30°-40°	240.6	11.3
40°-50°	272.7	12.9
50°-60°	275.7	13.0
60°-70°	240.9	11.4
70°-80°	162.2	7.6
80°-90°	51.8	2.4
90°-100°	46.9	2.2
100°-110°	83.5	3.9
110°-120°	106.4	5.0
120°-130°	116.0	5.5
130°-140°	83.6	3.9
140°-150°	48.5	2.3
150°-160°	27.6	1.3
160°-170°	14.7	0.7
170°-180°	4.5	0.2
0°-30°	345.1	16.3
0°-40°	585.8	27.6
0°-60°	1134.2	53.5
0°-90°	1589.1	74.9
90°-120°	236.8	11.2
90°-150°	484.9	22.9
90°-180°	532.0	25.1
0°-180°	2120.7	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	422	422	422	422	422	
5°	422	422	420	422	422	40
15°	412	413	416	421	422	116
25°	392	396	404	414	419	181
35°	362	369	384	399	405	227
45°	324	334	352	374	383	251
55°	276	287	308	331	342	246
65°	211	225	240	267	280	209
75°	134	142	150	172	181	140
85°	32	34	41	47	48	38
90°	1	16	26	34	35	2
95°	16	33	47	55	57	19
105°	68	67	77	92	98	71
115°	107	103	105	107	105	105
125°	114	114	122	150	166	101
135°	88	93	103	123	135	68
145°	60	68	75	85	89	39
155°	50	54	60	62	65	23
165°	47	49	52	54	55	13
175°	46	46	47	47	47	4
180°	44	44	44	44	44	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	421.9	421.9	421.9	421.9	421.9
2.5°	422.9	421.9	419.8	421.9	421.9
5°	421.9	421.9	419.8	421.9	421.9
7.5°	419.8	420.8	418.7	421.9	421.9
10°	418.7	418.7	418.7	421.9	421.9
12.5°	415.5	416.6	416.6	420.8	422.9
15°	412.3	413.4	415.5	420.8	421.9
17.5°	408.1	410.2	413.4	419.8	421.9
20°	402.8	406.0	411.3	418.7	420.8
22.5°	398.6	401.7	407.0	416.6	419.8
25°	392.2	396.4	403.9	414.5	418.7
27.5°	385.8	390.1	399.6	411.3	416.6
30°	379.5	384.8	395.4	408.1	413.4
32.5°	371.0	377.4	390.1	403.9	410.2
35°	362.5	368.9	383.7	398.6	404.9
37.5°	354.0	361.5	376.3	393.3	400.7
40°	344.5	351.9	368.9	388.0	395.4
42.5°	335.0	343.4	360.4	380.5	389.0
45°	324.4	333.9	351.9	374.2	382.7
47.5°	313.8	323.3	342.4	365.7	374.2
50°	303.2	312.7	331.8	355.1	365.7
52.5°	288.3	300.0	321.2	343.4	354.0
55°	275.6	287.3	308.5	330.7	342.4
57.5°	259.7	273.5	293.6	316.9	329.7
60°	245.9	257.6	277.7	302.1	314.8
62.5°	229.0	241.7	258.6	285.1	298.9
65°	210.9	224.7	239.6	267.1	279.8
67.5°	192.9	205.6	220.5	245.9	258.6
70°	174.9	186.6	199.3	224.7	236.4
72.5°	154.8	165.4	176.0	199.3	209.9
75°	133.6	142.0	149.5	171.7	181.3
77.5°	112.4	116.6	123.0	142.0	150.5
80°	85.9	89.0	92.2	108.1	112.4
82.5°	58.3	60.4	64.7	74.2	78.4
85°	31.8	33.9	41.3	46.6	47.7
87.5°	10.6	17.0	24.4	28.6	30.7
90°	1.1	15.9	26.5	33.9	35.0
92.5°	5.3	24.4	36.0	42.4	44.5
95°	15.9	32.9	46.6	55.1	57.2
97.5°	29.7	41.3	57.2	66.8	70.0
100°	42.4	48.8	65.7	77.4	80.6
102.5°	56.2	56.2	73.1	85.9	90.1
105°	67.8	66.8	77.4	92.2	97.5
107.5°	79.5	76.3	80.6	97.5	103.9
110°	90.1	85.9	85.9	98.6	107.1



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	99.6	94.3	96.5	98.6	106.0
115°	107.1	102.8	104.9	107.1	104.9
117.5°	112.4	109.2	112.4	128.3	125.1
120°	115.5	113.4	117.7	142.0	148.4
122.5°	116.6	115.5	120.8	148.4	162.2
125°	114.5	114.5	121.9	150.5	166.4
127.5°	110.2	112.4	119.8	147.3	165.4
130°	103.9	107.1	116.6	141.0	157.9
132.5°	96.5	100.7	110.2	132.5	147.3
135°	88.0	93.3	102.8	123.0	134.6
137.5°	79.5	85.9	95.4	112.4	123.0
140°	72.1	79.5	88.0	102.8	111.3
142.5°	65.7	73.1	81.6	93.3	99.6
145°	60.4	67.8	75.3	84.8	89.0
147.5°	56.2	63.6	68.9	79.5	82.7
150°	54.1	59.4	65.7	73.1	76.3
152.5°	50.9	56.2	62.5	66.8	70.0
155°	49.8	54.1	60.4	62.5	64.7
157.5°	48.8	51.9	58.3	60.4	61.5
160°	47.7	50.9	56.2	59.4	59.4
162.5°	46.6	49.8	54.1	57.2	58.3
165°	46.6	48.8	51.9	54.1	55.1
167.5°	46.6	47.7	49.8	51.9	51.9
170°	45.6	46.6	48.8	49.8	49.8
172.5°	45.6	46.6	47.7	48.8	47.7
175°	45.6	45.6	46.6	46.6	46.6
177.5°	45.6	45.6	45.6	45.6	44.5
180°	44.5	44.5	44.5	44.5	44.5

(END OF REPORT)