

Signify Classified - Internal
Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269



Scaled data based on original data using
LM-79-2019 Approved Method: Electrical and Photometric Measurements of Solid-
State Lighting Products

Test Report Prepared for
Cooper Lighting Solutions

Brand: CORELITE

Report Number: P621843

Luminaire Tested: VLT-FB-100U-050D-840-UNV-STD-W-4

Issue Date: 9/2/2020

Test Information

Test Method: LM-79-2019
Report Number: P621843
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2203-563-26, G2-2203-563-19)
Test Lab: INNOVATION CENTER
Issue Date: 9/2/2020
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: CORELITE
Catalog Number: VLT-FB-100U-050D-840-UNV-STD-W-4
Description: CORELITE VAULT SUSPENDED LED LUMINAIRE
LIGHT SHAPING LENS - BATWING
DOWNLIGHT 500 LUMENS PER FOOT
UPLIGHT 1000 LUMENS PER FOOT
Light Source: 4000K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

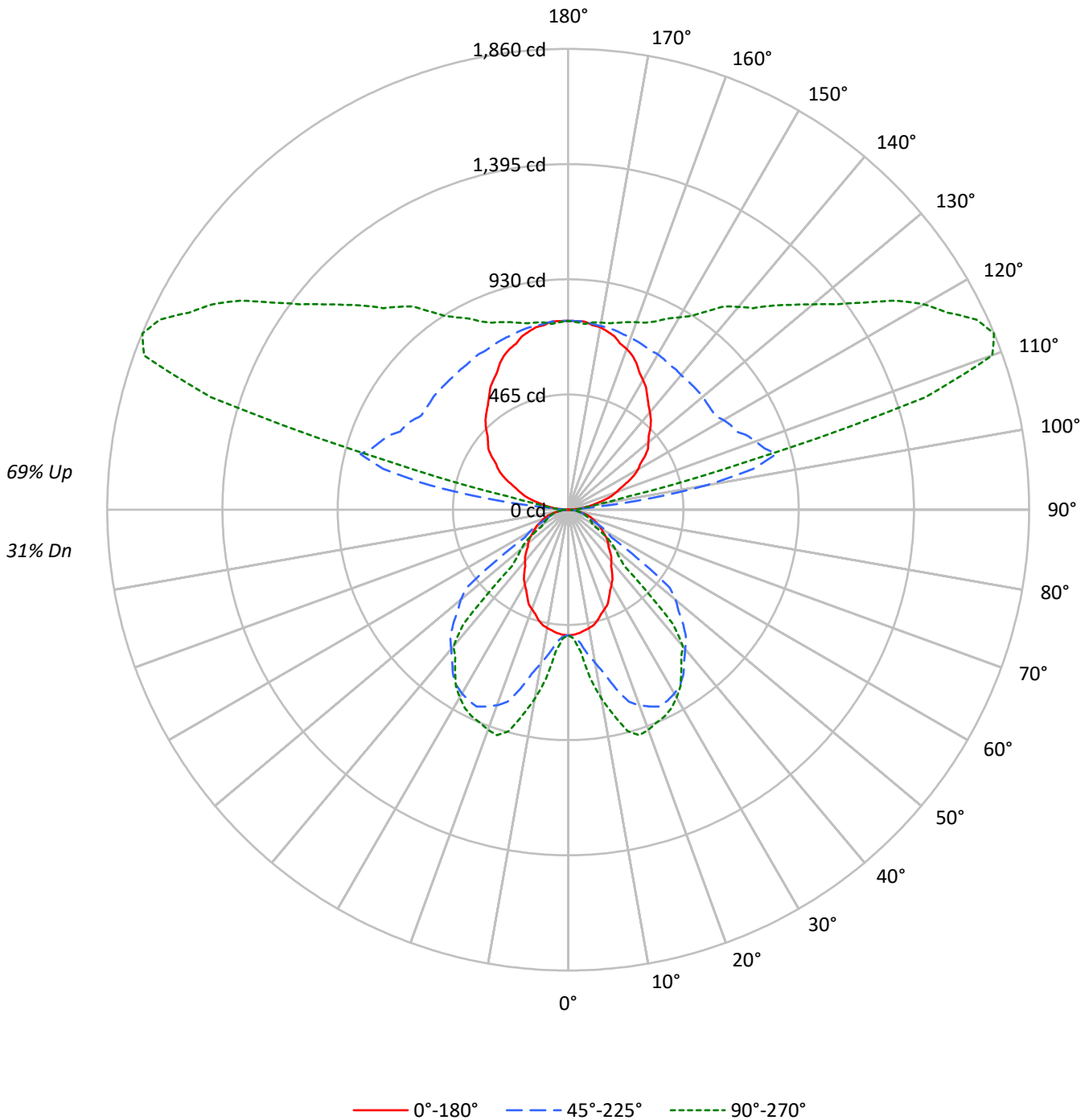
Lumens per Lamp: N/A
Luminaire Lumens: 5910.9 lumens
Efficiency: N/A
Efficacy: 136.2 lumens/watt
Spacing Criteria (0/90/45): 1.05 / 1.83 / 1.75
Luminous Opening: Rectangular (W 0.38' x L: 4' x H: 0')
CIE Type: Semi-Indirect

Input Watts (W): 43.4
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: 24 FT



TEST NUMBER: P621843
CATALOG NUMBER: VLT-FB-100U-050D-840-UNV-STD-W-4

Luminous Intensity Polar Plot





TEST NUMBER: P621843

CATALOG NUMBER: VLT-FB-100U-050D-840-UNV-STD-W-4

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	103	103	103	103	92	92	92	92	73	73	73	55	55	55	38	38	38	31
1	94	90	86	83	84	81	78	75	64	62	60	49	47	46	34	34	33	27
2	86	79	73	68	77	71	66	62	57	53	50	43	41	39	31	30	28	23
3	78	70	63	57	70	63	57	52	50	46	43	38	36	34	28	26	25	20
4	72	62	54	49	64	56	49	44	45	40	37	34	31	29	25	23	21	17
5	66	55	47	42	59	50	43	38	40	35	32	31	28	25	22	20	19	15
6	61	49	41	36	54	45	38	33	36	31	28	28	25	22	20	18	17	13
7	56	44	37	31	50	40	34	29	33	28	24	25	22	19	19	16	15	12
8	52	40	33	28	47	37	30	26	30	25	21	23	20	17	17	15	13	11
9	48	36	29	25	43	33	27	23	27	22	19	21	18	15	16	14	12	10
10	45	33	26	22	40	30	24	20	25	20	17	20	16	14	15	12	11	9

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3636	3636	3636
5°	3605	3865	4139
10°	3534	4570	5643
15°	3428	5570	6870
20°	3264	6417	7220
25°	3090	6939	7290
30°	2893	7100	7253
35°	2697	7100	6964
40°	2537	6879	6743
45°	2414	6667	3229
50°	2346	6312	2782
55°	2281	4226	2203
60°	2217	2572	1596
65°	2168	1958	1661
70°	2140	1708	1708
75°	2085	1769	1713
80°	1831	1789	1703
85°	1359	1869	1614

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 45°

Vertical Angle: 45°

Luminance: 6667 cd/sqm



TEST NUMBER: P621843

CATALOG NUMBER: VLT-FB-100U-050D-840-UNV-STD-W-4

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	54.6	0.9
10°-20°	201.5	3.4
20°-30°	341.2	5.8
30°-40°	413.9	7.0
40°-50°	364.3	6.2
50°-60°	225.5	3.8
60°-70°	122.2	2.1
70°-80°	69.6	1.2
80°-90°	24.5	0.4
90°-100°	93.7	1.6
100°-110°	667.6	11.3
110°-120°	906.4	15.3
120°-130°	737.7	12.5
130°-140°	593.3	10.0
140°-150°	467.8	7.9
150°-160°	342.0	5.8
160°-170°	212.4	3.6
170°-180°	72.4	1.2
0°-30°	597.3	10.1
0°-40°	1011.2	17.1
0°-60°	1601.0	27.1
0°-90°	1817.4	30.7
90°-120°	1667.7	28.2
90°-150°	3466.6	58.6
90°-180°	4094.0	69.3
0°-180°	5910.9	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	507	507	507	507	507	
5°	500	517	536	560	575	47
15°	461	532	750	886	925	129
25°	390	534	876	902	921	179
35°	308	495	810	799	795	193
45°	238	407	657	557	318	185
55°	182	284	338	195	176	163
65°	128	160	115	99	98	127
75°	75	66	64	63	62	79
85°	16	22	23	21	20	20
90°	0	5	10	14	14	2
95°	38	71	38	43	53	43
105°	149	228	868	1108	733	157
115°	264	320	748	1554	1816	262
125°	379	430	704	1232	1457	336
135°	470	521	709	1015	1165	361
145°	556	603	714	884	978	349
155°	652	675	728	801	839	299
165°	724	733	748	767	781	203
175°	762	767	762	757	752	72
180°	762	762	762	762	762	



TEST NUMBER: P621843

CATALOG NUMBER: VLT-FB-100U-050D-840-UNV-STD-W-4

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	506.7	506.7	506.7	506.7	506.7
2.5°	505.0	510.7	513.3	518.3	520.7
5°	500.5	516.6	536.5	559.5	574.6
7.5°	492.5	521.3	584.3	656.9	687.9
10°	485.0	524.3	627.2	732.1	774.4
12.5°	476.8	527.4	677.4	804.6	847.7
15°	461.4	531.8	749.7	886.5	924.8
17.5°	441.4	534.6	812.3	929.9	954.4
20°	427.4	535.1	840.3	935.3	945.4
22.5°	414.2	535.6	860.1	922.1	930.5
25°	390.3	534.3	876.4	902.5	920.7
27.5°	366.4	528.3	868.3	889.4	902.5
30°	349.1	522.3	856.8	874.3	875.3
32.5°	332.6	512.3	839.5	844.6	843.2
35°	307.9	495.2	810.5	799.0	795.0
37.5°	284.8	472.5	768.0	749.7	748.7
40°	270.8	456.1	734.3	716.8	719.8
42.5°	257.7	437.3	703.8	683.3	626.7
45°	237.9	407.1	657.0	556.9	318.2
47.5°	220.8	372.6	604.1	298.3	273.9
50°	210.1	349.0	565.4	262.3	249.2
52.5°	199.4	327.0	515.1	235.8	218.7
55°	182.3	284.0	337.8	195.2	176.1
57.5°	166.0	238.7	206.4	151.7	131.0
60°	154.5	211.9	179.2	122.3	111.2
62.5°	143.8	189.9	152.8	108.5	106.3
65°	127.7	159.9	115.3	98.8	97.8
67.5°	112.7	131.4	87.9	89.0	87.9
70°	102.0	111.0	81.4	82.4	81.4
72.5°	92.1	91.5	74.8	74.1	73.1
75°	75.2	66.1	63.8	62.8	61.8
77.5°	57.5	48.8	51.5	50.4	49.4
80°	44.3	41.3	43.3	42.2	41.2
82.5°	32.7	33.8	35.0	33.1	32.1
85°	16.5	22.5	22.7	20.6	19.6
87.5°	4.9	10.7	11.0	10.3	9.5
90°	0.0	4.7	9.6	14.4	14.4
92.5°	11.5	16.2	21.1	29.8	33.5
95°	38.3	71.1	38.3	43.3	52.7
97.5°	68.1	136.5	281.8	83.1	71.9
100°	91.1	170.7	565.5	166.5	110.2
102.5°	114.1	197.5	764.9	439.3	240.6
105°	148.6	228.2	867.5	1108.2	733.3
107.5°	183.1	243.1	828.2	1612.8	1510.7
110°	206.1	262.3	805.2	1694.7	1821.3



TEST NUMBER: P621843

CATALOG NUMBER: VLT-FB-100U-050D-840-UNV-STD-W-4

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	229.1	285.3	782.2	1646.8	1859.6
115°	263.6	319.8	747.7	1554.0	1816.5
117.5°	299.1	354.4	739.0	1453.6	1723.5
120°	325.9	377.5	723.7	1377.1	1658.3
122.5°	345.1	400.4	704.5	1311.4	1570.1
125°	378.6	430.2	704.5	1232.1	1457.0
127.5°	406.4	458.9	705.5	1140.0	1362.1
130°	421.8	478.0	709.3	1078.4	1289.3
132.5°	440.9	497.2	709.3	1050.7	1224.1
135°	469.7	521.2	709.3	1014.7	1164.6
137.5°	493.7	549.0	709.3	974.9	1103.3
140°	512.8	564.4	709.3	951.6	1068.8
142.5°	532.0	579.8	713.2	924.6	1034.3
145°	556.0	602.8	714.1	884.0	977.7
147.5°	584.7	626.0	719.9	854.8	926.9
150°	603.9	641.4	723.7	835.3	896.2
152.5°	623.1	656.8	723.7	819.7	869.4
155°	651.8	675.2	728.5	801.2	838.7
157.5°	674.8	697.3	734.3	789.5	816.7
160°	690.2	708.9	738.1	781.8	805.2
162.5°	701.7	720.4	741.9	777.7	793.7
165°	723.7	733.1	747.7	767.2	781.2
167.5°	736.2	744.6	752.5	762.2	770.7
170°	747.7	752.4	752.5	762.2	766.8
172.5°	751.5	759.9	756.3	758.3	763.0
175°	762.1	766.7	762.1	757.2	752.5
177.5°	762.1	765.8	762.1	762.0	758.2
180°	762.1	762.1	762.1	762.1	762.1

(END OF REPORT)