

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: STREETWORKS

Report Number: P165511

Luminaire Tested: **VST-F07-LED-E-U-SL4-HSS-7030**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P165511
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (P33728)
Test Lab: INNOVATION CENTER-P3
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: VST-F07-LED-E-U-SL4-HSS-7030
Description: VENTUS LED SITE/ROADWAY LUMINAIRE
(7) LIGHTBARS WITH AccuLED OPTICS - TYPE 4 W/ SPILL LIGHT CONTROL AND HOUSE SIDE SHIELD
Light Source: (49) 3000K CCT, 70 CRI LEDs
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 10611.3 lumens
Efficiency: N/A
Efficacy: 58.8 lumens/watt
Luminous Opening: Rectangular w/ Sides (W: 1.17' x L: 1' x H: 0.1')
IES Classification: Type IV - Short - Semi-Cutoff
BUG Rating: B1 - U0 - G3

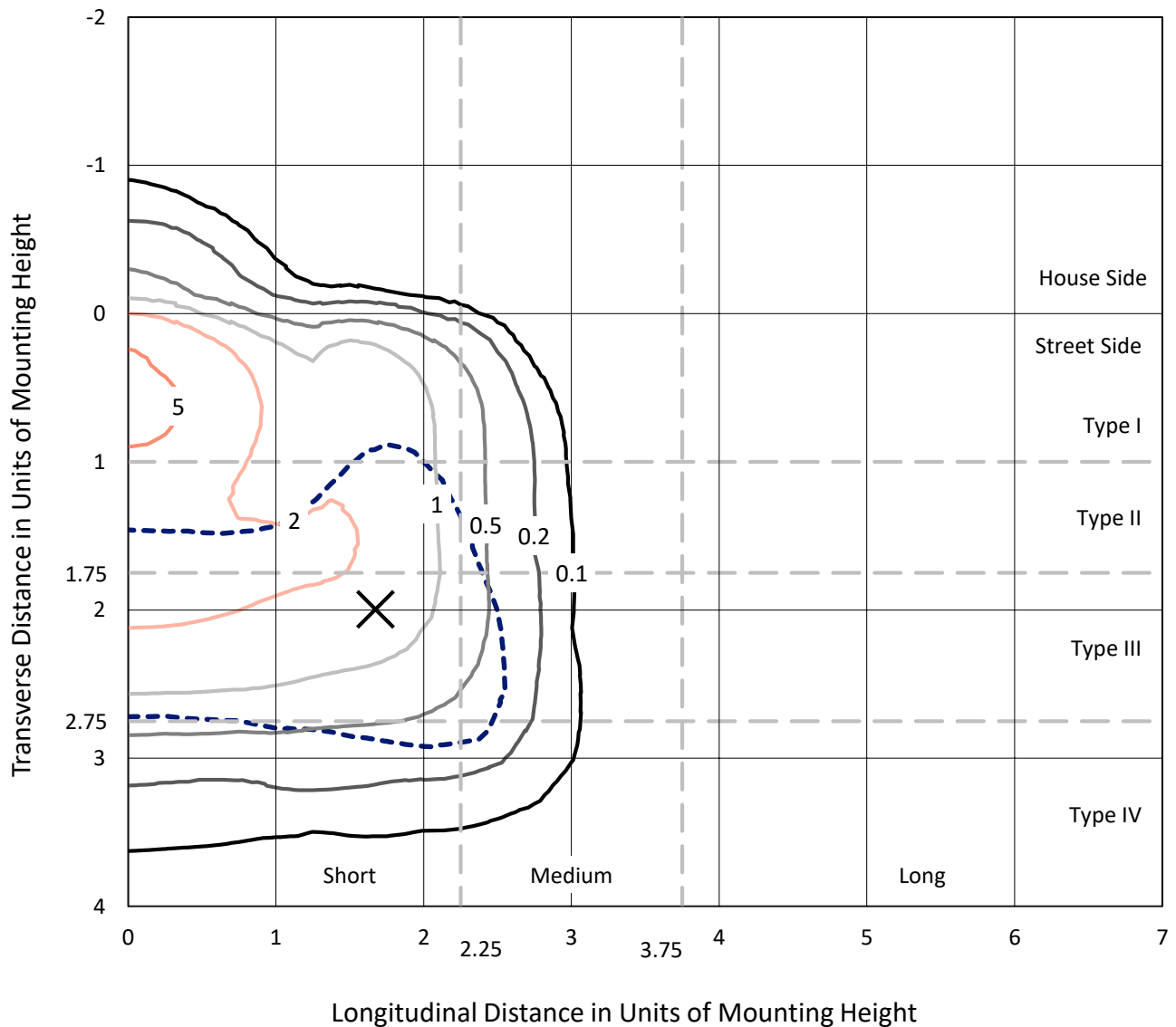
Input Watts (W): 180.5
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 28.75 FT



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Iso-Footcandle Lines of Horizontal Illumination

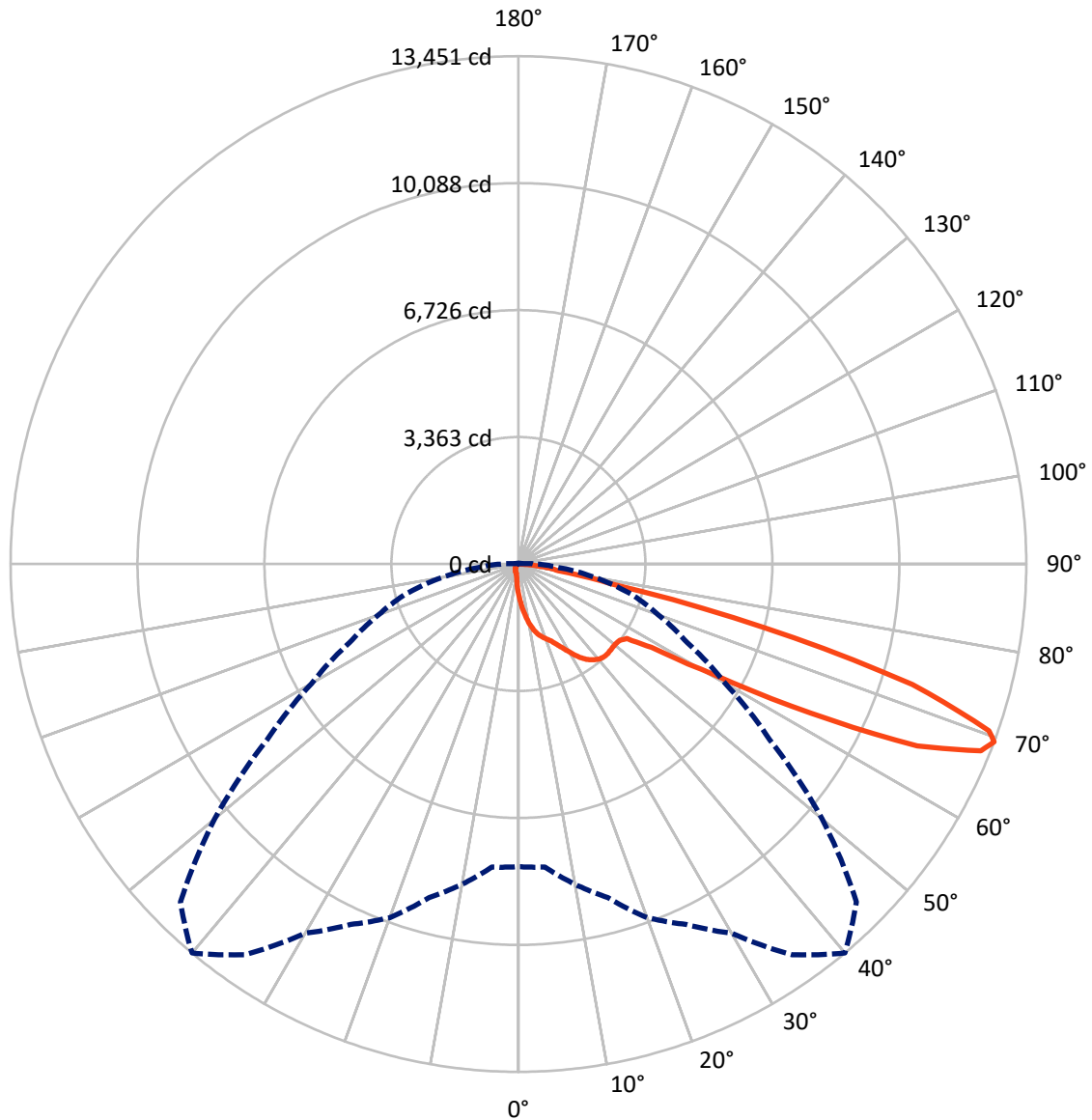
✕ Max cd
 - - - 1/2 Max cd



Based on 20 foot mounting height. Maximum calculated value = 5.9 fc
 Type IV - Short - Semi-Cutoff

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Luminous Intensity Polar Plot



— Vertical Plane Through 40-Deg Lateral - - - Horizontal Cone Through 69-Deg Vertical



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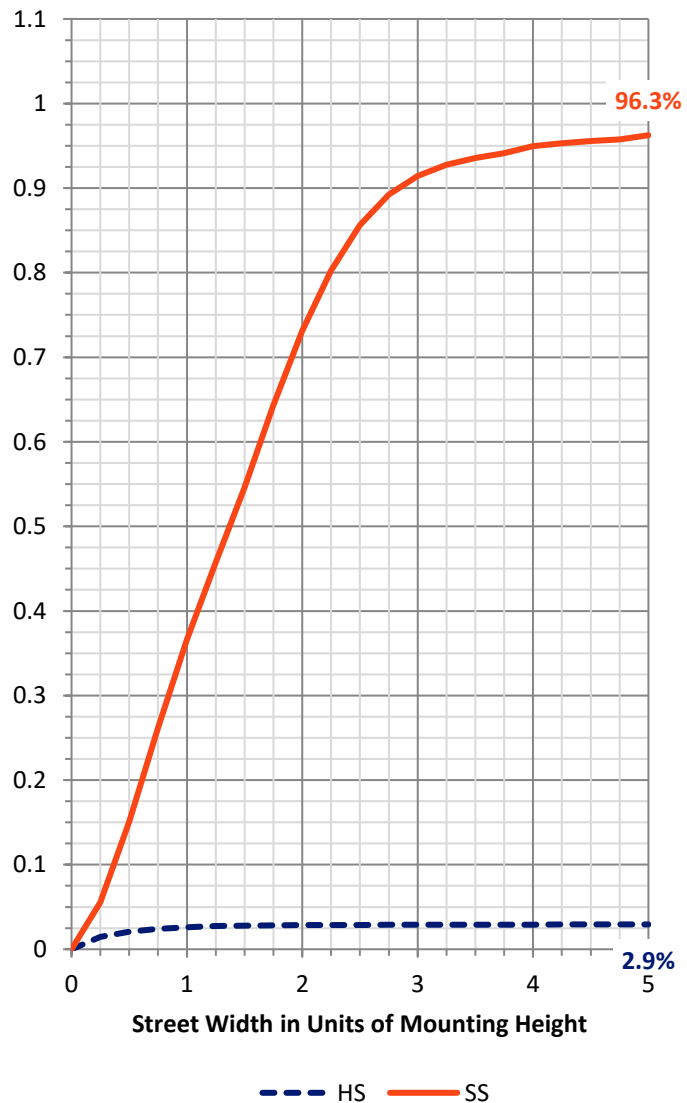
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	316.0	0.0	316.0
	% Fixture	3.0	0.0	3.0
Street Side	Lumens	10295.3	0.0	10295.3
	% Fixture	97.0	0.0	97.0
Total	Lumens	10611.3	0.0	10611.3
	% Fixture	100.0	0.0	100.0

Coefficient of Utilization

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	82.4	0.8
10°-20°	284.0	2.7
20°-30°	543.5	5.1
30°-40°	903.9	8.5
40°-50°	1223.1	11.5
50°-60°	1912.8	18.0
60°-70°	3932.7	37.1
70°-80°	1582.5	14.9
80°-90°	146.4	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°-90°	10611.3	100.0
0°-180°	10611.3	100.0



REPORT NUMBER: P165511

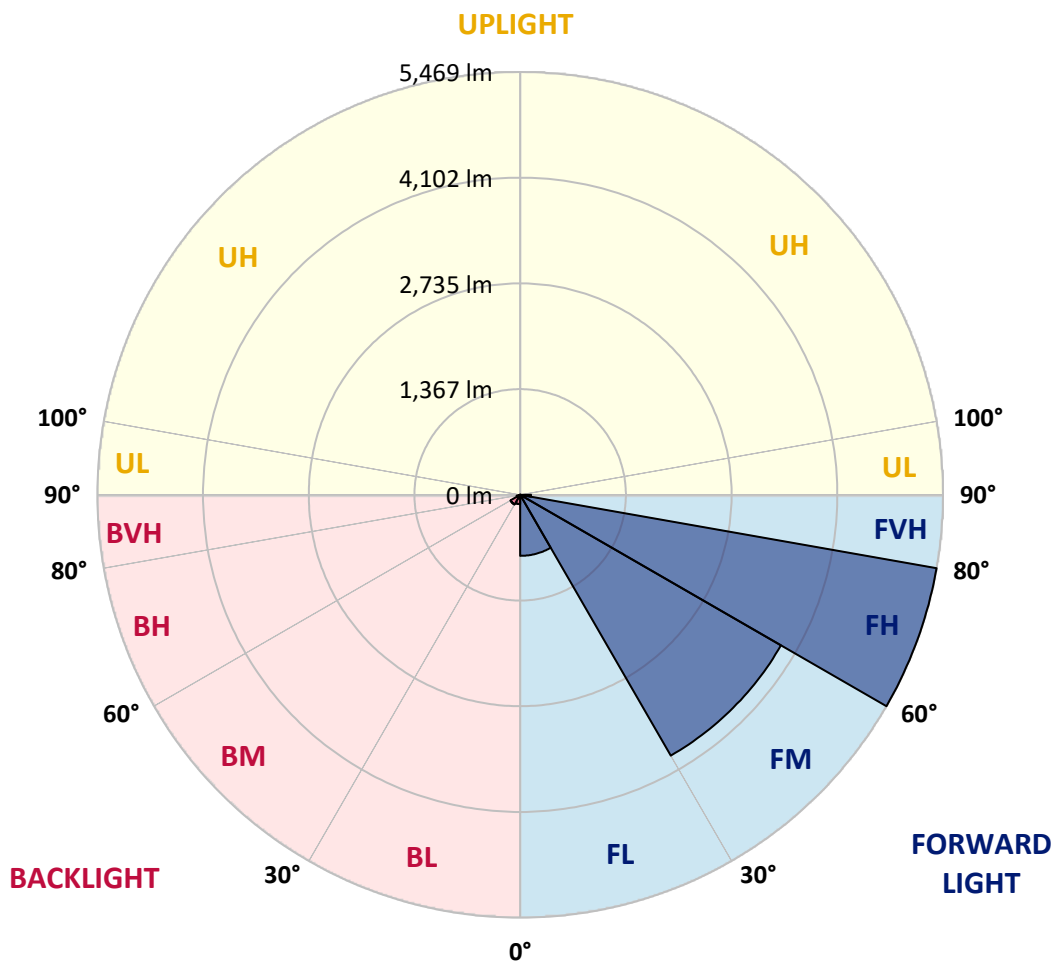
CATALOG NUMBER: VST-F07-LED-E-U-SL4-HSS-7030

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	789.7	7.4			
FM	(30°-60°)	3895.6	36.7			
FH	(60°-80°)	5469.1	51.5			G3/7500
FVH	(80°-90°)	140.9	1.3			G2/225
BL	(0°-30°)	120.2	1.1	B1/500		
BM	(30°-60°)	144.3	1.4	B0/220		
BH	(60°-80°)	46.1	0.4	B0/110		G0/110
BVH	(80°-90°)	5.4	0.1			G0/10
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B1-U0-G3

Type IV Short





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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	801.4	801.4	801.4	801.4	801.4	801.4	801.4	801.4	801.4	801.4	801.4
2.5°	1069.1	1056.9	1042.9	1042.9	1025.6	1025.6	1015.2	987.4	983.9	968.2	952.6
5°	1364.6	1354.1	1336.8	1321.1	1307.2	1282.9	1265.4	1232.4	1196.0	1161.1	1129.9
7.5°	1653.2	1647.9	1616.6	1611.4	1588.8	1548.9	1514.0	1465.4	1402.8	1354.1	1296.8
10°	1920.9	1908.6	1901.6	1872.1	1839.2	1795.7	1741.7	1682.7	1609.7	1533.1	1451.4
12.5°	2132.9	2126.0	2094.6	2082.5	2047.7	2004.3	1936.5	1860.0	1787.0	1687.9	1592.3
15°	2291.1	2278.9	2258.0	2238.9	2197.2	2159.0	2096.4	2012.9	1924.3	1816.6	1701.8
17.5°	2423.2	2400.6	2395.3	2365.8	2322.4	2277.1	2207.7	2131.1	2026.8	1919.1	1793.9
20°	2600.4	2569.2	2558.8	2515.3	2464.9	2402.3	2322.4	2226.8	2117.2	1999.1	1870.4
22.5°	2809.0	2786.4	2763.9	2725.6	2661.4	2572.7	2456.3	2352.0	2212.8	2082.5	1943.4
25°	3104.6	3085.5	3049.0	2996.8	2916.8	2810.8	2670.0	2517.1	2353.7	2186.8	2023.4
27.5°	3391.4	3374.0	3347.9	3308.0	3217.5	3101.1	2927.3	2732.6	2525.7	2324.1	2143.3
30°	3660.9	3645.2	3619.1	3579.2	3499.2	3384.4	3188.0	2979.4	2722.2	2487.5	2270.3
32.5°	3951.2	3945.9	3916.3	3859.0	3789.5	3634.8	3421.0	3196.8	2936.0	2664.8	2411.0
35°	4279.7	4239.7	4211.9	4154.5	4036.4	3871.2	3620.9	3375.8	3101.1	2823.0	2539.6
37.5°	4557.8	4519.6	4484.8	4411.8	4267.5	4057.2	3773.8	3504.4	3221.0	2937.7	2649.1
40°	4761.1	4742.0	4700.3	4604.7	4443.1	4192.8	3886.8	3593.0	3308.0	3022.9	2737.8
42.5°	4912.4	4882.8	4836.0	4736.9	4545.7	4260.6	3932.0	3629.5	3347.9	3075.0	2795.2
45°	4968.0	4943.8	4900.3	4792.5	4585.6	4279.7	3930.3	3619.1	3349.7	3090.7	2833.4
47.5°	4935.0	4910.7	4872.4	4771.6	4568.3	4257.1	3899.0	3589.5	3332.3	3095.9	2868.1
50°	4825.5	4811.6	4782.0	4696.9	4514.3	4213.6	3871.2	3573.9	3328.8	3122.0	2916.8
52.5°	4815.1	4806.4	4769.9	4684.7	4498.7	4199.7	3867.7	3582.7	3358.4	3155.1	2951.6
55°	5884.1	5760.7	5484.3	5249.7	4863.7	4404.9	4043.2	3723.4	3483.6	3285.4	3142.8
57.5°	8362.9	8178.7	7815.4	7368.7	6482.1	5611.2	4914.2	4410.0	4161.5	4071.1	4124.9
60°	9524.1	9491.1	9433.7	9221.6	8767.9	8018.8	7184.4	6282.2	5920.6	5889.4	5998.8
62.5°	10075.2	10054.3	10071.7	10045.6	9904.8	9685.8	9445.8	9056.5	8698.4	8467.2	7977.0
65°	10329.0	10342.9	10441.9	10520.1	10537.5	10594.9	10770.5	11255.4	11610.0	11013.8	9652.7
67.5°	9684.0	9765.7	9993.5	10278.5	10612.3	10935.6	11457.1	12479.2	13207.6	12507.1	10574.1
69°	8017.0	8057.0	8613.2	9150.4	9965.6	10535.9	11292.0	12632.2	13451.0	12660.0	10501.0
70°	6311.7	6348.2	6944.5	7674.6	9053.1	9786.6	10775.7	12373.2	13223.2	12456.6	10125.5
72.5°	2847.4	2795.2	3005.5	3396.6	4895.0	6059.7	7789.3	10024.7	10909.5	9979.6	7575.4
75°	1988.6	1966.0	1988.6	1990.3	2223.3	2868.1	3619.1	5433.9	6720.2	5799.0	3619.1
77.5°	1540.1	1524.5	1508.9	1491.4	1519.3	1701.8	1774.8	1927.7	2503.1	2367.6	1380.2
80°	1218.6	1204.6	1242.9	1230.7	1230.7	1251.6	1237.7	1180.3	1072.5	994.3	890.0
82.5°	566.6	570.1	570.1	618.8	745.8	870.9	910.9	853.6	757.9	644.9	519.8
85°	53.8	60.8	102.6	158.2	314.7	354.6	356.4	295.5	295.5	233.0	187.7
87.5°	0.0	1.7	1.7	1.7	15.6	43.5	36.5	10.5	5.2	5.2	8.7
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



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CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
0°	801.4	801.4	801.4	801.4	801.4	801.4	801.4	801.4	801.4	801.4	801.4
2.5°	924.8	919.5	898.7	877.8	858.7	837.8	818.7	799.6	778.7	763.1	744.0
5°	1081.2	1042.9	999.5	957.8	916.0	872.7	827.5	787.5	745.8	707.5	670.9
7.5°	1239.4	1164.6	1105.5	1030.8	963.0	895.2	832.7	768.4	709.3	653.6	601.5
10°	1373.2	1282.9	1190.7	1095.2	997.7	907.4	820.5	744.0	665.8	598.0	533.7
12.5°	1482.8	1368.0	1255.1	1135.1	1025.6	910.9	803.1	710.9	618.8	542.4	476.3
15°	1581.8	1449.7	1314.1	1175.1	1036.1	905.7	785.7	670.9	577.1	490.2	415.5
17.5°	1661.8	1510.6	1357.6	1201.2	1051.7	898.7	763.1	643.2	533.7	443.2	370.3
20°	1731.4	1573.1	1408.1	1232.4	1062.1	896.9	744.0	608.4	495.4	399.9	328.5
22.5°	1795.7	1637.4	1460.2	1272.4	1077.8	895.2	726.6	582.4	462.3	366.8	295.5
25°	1868.7	1701.8	1515.8	1314.1	1105.5	902.2	716.2	561.5	432.8	335.5	269.4
27.5°	1950.4	1774.8	1581.8	1366.3	1142.0	916.0	712.7	538.9	406.7	305.9	248.6
30°	2065.1	1861.7	1647.9	1418.4	1175.1	931.8	709.3	524.9	380.6	283.3	227.7
32.5°	2166.0	1946.9	1720.9	1472.3	1211.6	947.4	707.5	505.8	356.4	260.7	212.1
35°	2271.9	2025.2	1783.5	1524.5	1242.9	964.7	705.8	491.9	333.8	238.1	196.4
37.5°	2364.1	2091.1	1832.2	1569.7	1277.7	980.4	707.5	479.8	312.9	219.0	182.5
40°	2442.3	2159.0	1886.0	1611.4	1314.1	1004.7	709.3	467.6	292.1	201.6	170.4
42.5°	2511.9	2223.3	1943.4	1658.3	1355.9	1032.6	719.7	457.2	274.7	186.0	158.2
45°	2565.7	2282.4	2005.9	1724.4	1423.7	1077.8	738.8	450.2	257.2	172.1	147.8
47.5°	2621.3	2369.3	2112.0	1828.7	1522.8	1149.0	771.8	448.5	243.3	161.6	139.0
50°	2697.9	2456.3	2205.9	1934.7	1613.2	1222.1	811.7	450.2	226.0	151.3	130.4
52.5°	2753.5	2544.8	2327.6	2119.0	1828.7	1444.5	966.5	481.5	217.2	142.5	119.9
55°	3082.0	3045.5	3050.7	3085.5	2861.3	2457.9	1616.6	695.3	255.6	161.6	118.2
57.5°	4345.8	4474.3	4549.1	4547.4	4177.1	3464.4	2171.1	893.5	285.1	187.7	140.8
60°	6007.6	5910.3	5772.9	5433.9	4942.0	3954.7	2428.4	961.3	246.8	149.5	128.7
62.5°	7476.4	6906.2	6400.4	5851.1	5206.2	4124.9	2480.5	956.0	215.6	112.9	90.4
65°	8392.5	7366.9	6549.9	5861.5	5101.9	3982.4	2346.7	877.8	182.5	92.2	74.7
67.5°	8611.5	7118.3	5962.4	5084.5	4262.3	3099.4	1722.6	660.6	142.5	76.5	66.1
69°	8133.4	6327.4	4940.3	3944.2	3101.1	2056.4	1065.6	417.2	109.5	69.6	60.8
70°	7481.6	5503.4	4024.1	3165.4	2296.3	1444.5	745.8	293.8	88.7	64.3	55.6
72.5°	4813.4	2890.7	1978.2	1376.7	947.4	575.4	292.1	132.2	67.8	53.8	45.2
75°	1866.9	1069.1	775.3	589.2	460.7	319.8	177.3	85.2	57.3	45.2	34.7
77.5°	919.5	704.0	575.4	394.6	229.5	142.5	95.6	66.1	47.0	33.0	22.6
80°	726.6	483.2	288.6	179.0	135.5	102.6	73.0	53.8	34.7	20.9	15.6
82.5°	372.0	203.4	149.5	121.7	100.8	80.0	59.1	38.2	22.6	13.9	12.1
85°	116.4	85.2	76.5	74.7	69.6	57.3	41.7	24.4	13.9	8.7	8.7
87.5°	8.7	12.1	15.6	12.1	13.9	12.1	15.6	10.5	7.0	7.0	5.2
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



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CANDELA DISTRIBUTION (continued):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
0°	801.4	801.4	801.4	801.4	801.4	801.4	801.4	801.4	801.4	801.4	801.4
2.5°	730.0	709.3	690.1	677.9	655.3	646.7	638.0	634.5	618.8	622.3	608.4
5°	638.0	601.5	573.6	545.8	519.8	500.7	484.9	465.8	450.2	443.2	429.3
7.5°	554.5	507.6	471.1	441.6	410.2	385.9	365.0	351.1	337.3	323.3	316.4
10°	481.5	431.1	389.4	359.9	330.3	309.4	293.8	283.3	274.7	269.4	267.7
12.5°	413.7	365.0	326.8	300.7	278.1	267.7	260.7	255.6	253.8	252.1	252.1
15°	361.5	312.9	283.3	264.2	253.8	248.6	246.8	243.3	239.9	238.1	238.1
17.5°	312.9	276.4	255.6	245.1	239.9	236.5	233.0	229.5	226.0	224.2	224.2
20°	279.8	250.3	239.9	233.0	227.7	224.2	219.0	215.6	213.9	212.1	210.4
22.5°	253.8	234.7	227.7	222.5	215.6	210.4	206.9	203.4	199.9	198.1	196.4
25°	234.7	222.5	217.2	210.4	203.4	198.1	193.0	187.7	184.3	182.5	179.0
27.5°	220.7	212.1	205.1	196.4	189.5	184.3	179.0	173.9	170.4	166.9	165.1
30°	208.6	199.9	191.2	184.3	175.5	170.4	163.4	158.2	156.4	153.0	149.5
32.5°	196.4	187.7	179.0	170.4	161.6	154.7	151.3	144.3	140.8	139.0	135.5
35°	182.5	173.9	163.4	156.4	147.8	140.8	135.5	130.4	126.9	123.4	121.7
37.5°	170.4	159.9	149.5	140.8	133.8	126.9	121.7	116.4	112.9	109.5	107.8
40°	156.4	146.0	135.5	126.9	119.9	114.7	109.5	104.3	100.8	99.1	99.1
42.5°	144.3	132.2	121.7	114.7	109.5	102.6	97.3	92.2	90.4	88.7	90.4
45°	132.2	119.9	111.3	104.3	99.1	92.2	86.9	83.4	81.7	83.4	85.2
47.5°	121.7	109.5	100.8	95.6	90.4	85.2	80.0	76.5	76.5	80.0	83.4
50°	111.3	99.1	92.2	88.7	83.4	78.2	71.3	69.6	71.3	74.7	78.2
52.5°	100.8	86.9	81.7	80.0	74.7	69.6	64.3	62.6	64.3	67.8	66.1
55°	90.4	76.5	74.7	73.0	67.8	60.8	55.6	55.6	55.6	53.8	50.5
57.5°	86.9	67.8	66.1	64.3	59.1	52.1	48.7	45.2	43.5	38.2	36.5
60°	90.4	60.8	60.8	57.3	52.1	45.2	40.0	34.7	31.2	27.8	27.8
62.5°	73.0	55.6	53.8	50.5	43.5	36.5	31.2	26.1	24.4	22.6	22.6
65°	59.1	50.5	47.0	41.7	36.5	29.6	24.4	20.9	19.1	19.1	20.9
67.5°	53.8	45.2	40.0	34.7	29.6	22.6	19.1	17.4	17.4	19.1	19.1
69°	50.5	41.7	36.5	31.2	26.1	20.9	17.4	17.4	17.4	17.4	19.1
70°	47.0	40.0	34.7	29.6	22.6	17.4	15.6	15.6	17.4	17.4	19.1
72.5°	36.5	31.2	29.6	24.4	17.4	15.6	13.9	15.6	15.6	17.4	17.4
75°	27.8	22.6	22.6	19.1	13.9	12.1	12.1	13.9	13.9	15.6	15.6
77.5°	19.1	15.6	15.6	13.9	12.1	10.5	10.5	12.1	13.9	13.9	15.6
80°	13.9	12.1	10.5	12.1	10.5	8.7	10.5	12.1	12.1	13.9	13.9
82.5°	10.5	10.5	10.5	10.5	8.7	8.7	10.5	10.5	12.1	13.9	13.9
85°	8.7	8.7	8.7	8.7	8.7	8.7	8.7	10.5	10.5	12.1	12.1
87.5°	5.2	5.2	5.2	7.0	7.0	8.7	8.7	8.7	8.7	10.5	10.5
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



REPORT NUMBER: P165511

CATALOG NUMBER: VST-F07-LED-E-U-SL4-HSS-7030

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°
0°	801.4	801.4	801.4	801.4
2.5°	605.0	603.2	596.2	598.0
5°	424.1	413.7	420.7	419.0
7.5°	311.2	309.4	307.7	311.2
10°	266.0	266.0	264.2	266.0
12.5°	250.3	250.3	250.3	250.3
15°	238.1	238.1	236.5	236.5
17.5°	224.2	224.2	224.2	222.5
20°	210.4	208.6	208.6	208.6
22.5°	194.7	193.0	193.0	193.0
25°	179.0	177.3	177.3	177.3
27.5°	163.4	161.6	159.9	159.9
30°	147.8	146.0	144.3	144.3
32.5°	132.2	130.4	128.7	128.7
35°	118.2	118.2	116.4	114.7
37.5°	106.1	106.1	106.1	106.1
40°	97.3	99.1	99.1	99.1
42.5°	92.2	93.8	95.6	97.3
45°	88.7	92.2	93.8	93.8
47.5°	86.9	88.7	90.4	90.4
50°	80.0	78.2	78.2	78.2
52.5°	64.3	60.8	59.1	57.3
55°	47.0	45.2	41.7	41.7
57.5°	33.0	33.0	31.2	31.2
60°	26.1	26.1	24.4	26.1
62.5°	22.6	22.6	22.6	22.6
65°	20.9	20.9	20.9	20.9
67.5°	20.9	20.9	20.9	20.9
69°	19.1	19.1	19.1	19.1
70°	19.1	19.1	19.1	19.1
72.5°	17.4	17.4	17.4	17.4
75°	15.6	17.4	17.4	17.4
77.5°	15.6	15.6	15.6	15.6
80°	13.9	13.9	15.6	15.6
82.5°	13.9	13.9	13.9	13.9
85°	12.1	12.1	13.9	13.9
87.5°	10.5	10.5	12.1	12.1
90°	0.0	0.0	0.0	0.0

(END OF REPORT)