

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: P158009

Luminaire Tested: **VST-E05-LED-E-U-RW-7030**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P158009
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (P33711)
Test Lab: INNOVATION CENTER-P3
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: VST-E05-LED-E-U-RW-7030
Description: VENTUS LED SITE/ROADWAY LUMINAIRE
(5) LIGHTBARS WITH AccuLED OPTICS - RECTANGULAR WIDE
Light Source: (105) 3000K CCT, 70 CRI LEDs
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 14227.3 lumens
Efficiency: N/A
Efficacy: 111.8 lumens/watt
Luminous Opening: Rectangular (W 0.83' x L: 1' x H: 0')
IES Classification: Type I - Medium - Full Cutoff
BUG Rating: B4 - U0 - G4

Input Watts (W): 127.3
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



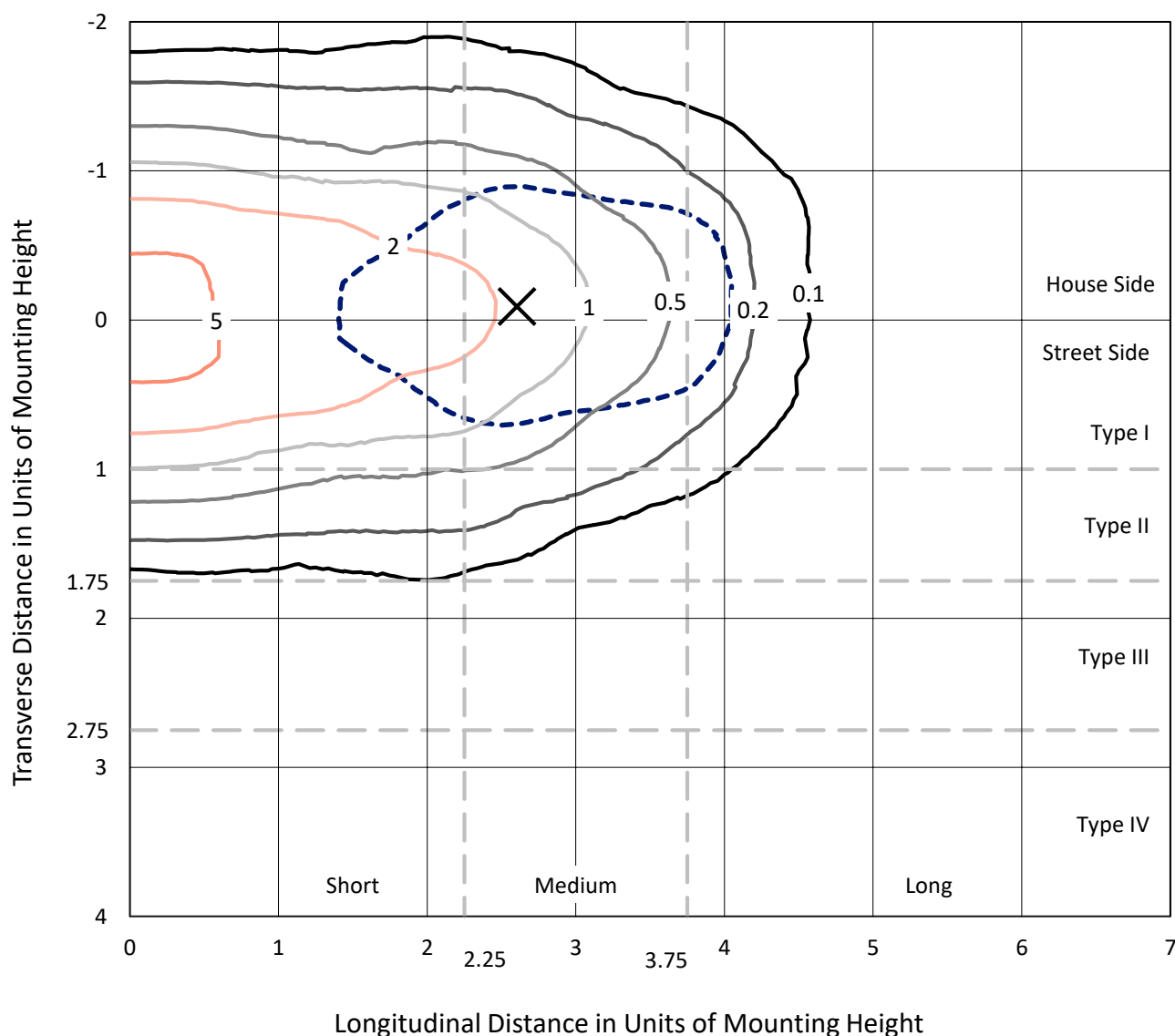
REPORT NUMBER: P158009

CATALOG NUMBER: VST-E05-LED-E-U-RW-7030

Iso-Footcandle Lines of Horizontal Illumination

× Max cd

--- 1/2 Max cd

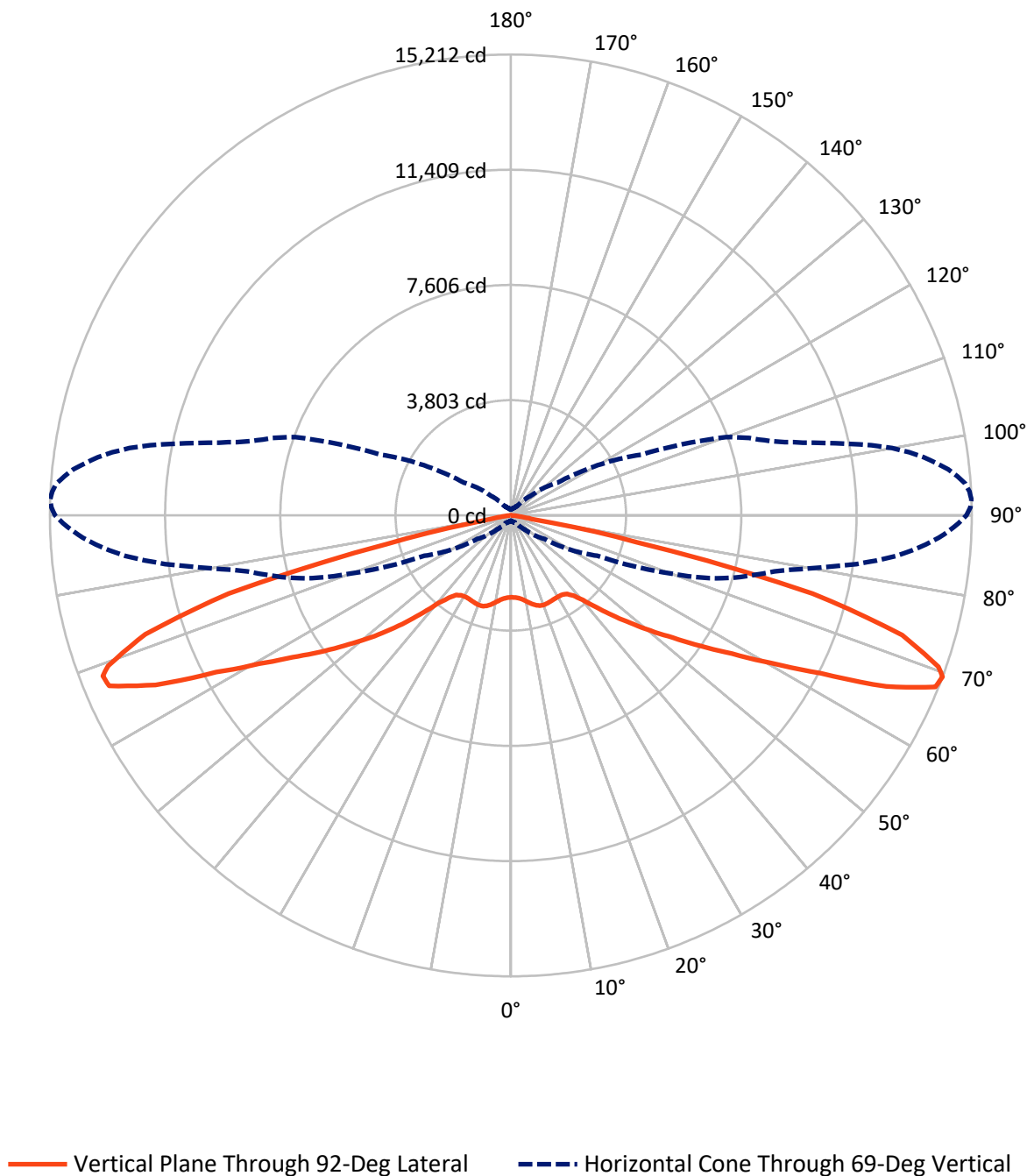


Based on 20 foot mounting height. Maximum calculated value = 6.9 fc
 Type I - Medium - Full Cutoff

REPORT NUMBER: P158009

CATALOG NUMBER: VST-E05-LED-E-U-RW-7030

Luminous Intensity Polar Plot



REPORT NUMBER: P158009

CATALOG NUMBER: VST-E05-LED-E-U-RW-7030

FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	7545.5	0.0	7545.5
	% Fixture	53.0	0.0	53.0
Street Side	Lumens	6681.8	0.0	6681.8
	% Fixture	47.0	0.0	47.0
Total	Lumens	14227.3	0.0	14227.3
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	264.5	1.9
10°-20°	835.4	5.9
20°-30°	1355.4	9.5
30°-40°	1689.2	11.9
40°-50°	2103.2	14.8
50°-60°	2593.7	18.2
60°-70°	3221.3	22.6
70°-80°	1979.3	13.9
80°-90°	185.5	1.3
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°	14227.3	100.0
0°-180°	14227.3	100.0

Coefficient of Utilization



REPORT NUMBER: P158009

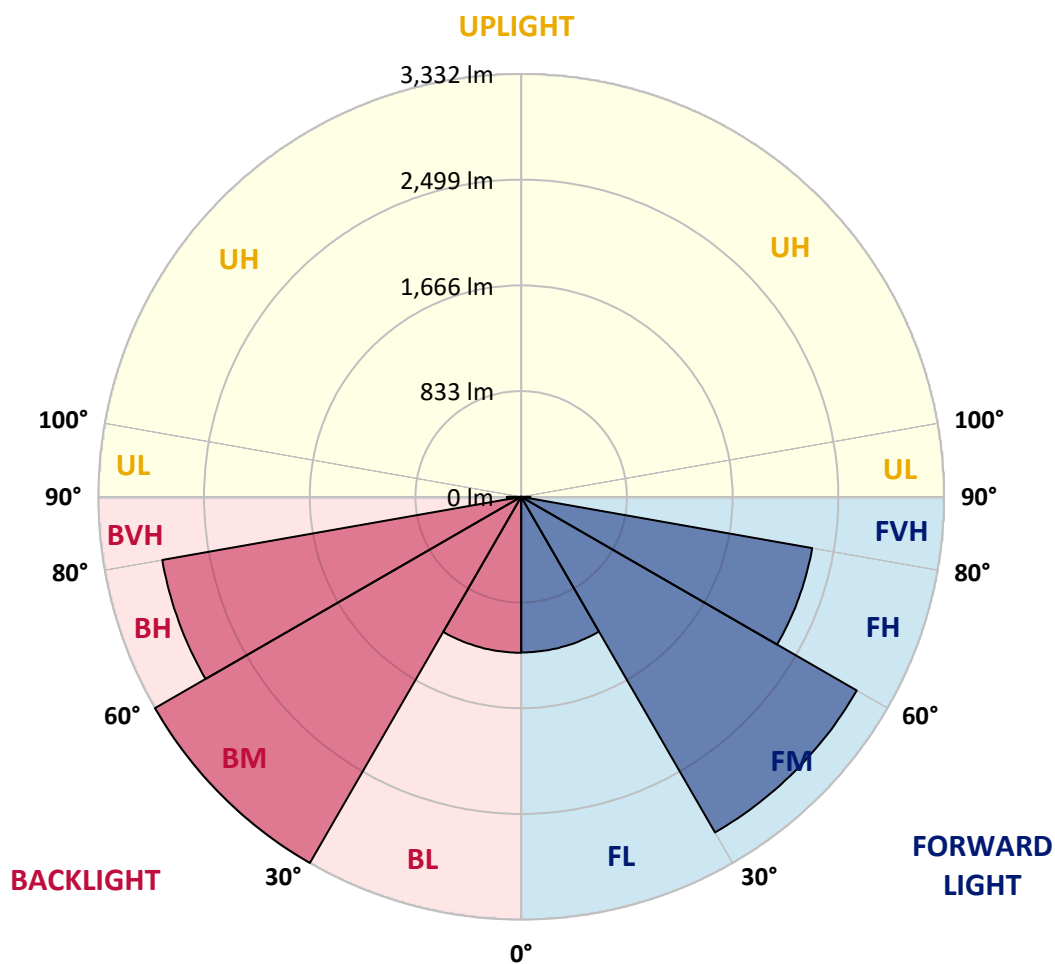
CATALOG NUMBER: VST-E05-LED-E-U-RW-7030

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	1226.3	8.6			
FM	(30°-60°)	3054.1	21.5			
FH	(60°-80°)	2328.8	16.4			G2/5000
FVH	(80°-90°)	72.6	0.5			G1/100
BL	(0°-30°)	1228.9	8.6	B3/2500		
BM	(30°-60°)	3332.0	23.4	B3/5000		
BH	(60°-80°)	2871.7	20.2	B4/5000		G4/5000
BVH	(80°-90°)	112.9	0.8			G2/225
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B4-U0-G4

Type I Medium





REPORT NUMBER: P158009

CATALOG NUMBER: VST-E05-LED-E-U-RW-7030

CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	70°	71°	72°
0°	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6
2.5°	2745.5	2738.2	2744.6	2745.5	2744.6	2744.6	2736.4	2734.6	2723.6	2726.4	2725.4
5°	2783.0	2780.2	2784.8	2786.6	2788.5	2784.8	2778.4	2775.7	2768.4	2765.6	2764.7
7.5°	2817.7	2813.1	2820.4	2826.8	2831.4	2832.3	2833.2	2828.6	2828.6	2825.0	2825.0
10°	2846.9	2843.3	2855.1	2863.4	2878.0	2886.2	2895.3	2901.7	2905.4	2906.3	2905.4
12.5°	2859.7	2857.0	2876.1	2900.8	2928.2	2947.4	2970.2	2986.7	2991.2	2990.3	2994.9
15°	2837.8	2839.6	2868.8	2917.2	2975.7	3024.1	3056.1	3069.8	3073.4	3075.3	3076.2
17.5°	2778.4	2782.1	2824.1	2902.6	3004.9	3092.6	3140.1	3140.1	3132.8	3132.8	3131.9
20°	2683.4	2687.1	2741.9	2855.1	3005.8	3140.1	3207.7	3194.0	3166.6	3161.1	3155.6
22.5°	2551.9	2566.5	2626.8	2758.3	2966.6	3153.8	3249.7	3229.6	3186.7	3174.8	3166.6
25°	2403.0	2401.2	2473.4	2621.3	2871.6	3120.9	3261.6	3257.9	3212.3	3199.5	3184.9
27.5°	2233.1	2238.6	2305.3	2455.1	2726.4	3025.9	3241.5	3289.9	3252.4	3239.7	3226.0
30°	2058.7	2064.2	2127.2	2301.6	2561.0	2889.8	3200.4	3320.9	3306.3	3296.3	3287.1
32.5°	1883.3	1885.2	1960.0	2147.3	2421.3	2727.3	3138.3	3349.3	3369.3	3364.8	3361.1
35°	1718.9	1720.8	1802.0	1992.0	2283.4	2588.4	3063.4	3390.4	3455.2	3460.7	3464.3
37.5°	1559.1	1561.8	1644.9	1844.1	2147.3	2483.4	2980.3	3453.4	3575.8	3595.9	3599.5
40°	1400.2	1402.9	1482.4	1693.4	2009.4	2391.2	2916.3	3542.0	3738.3	3765.7	3794.1
42.5°	1248.5	1258.6	1326.2	1528.0	1855.9	2277.0	2888.9	3649.7	3931.1	3974.0	4006.0
45°	1107.0	1107.9	1184.6	1373.7	1674.2	2122.6	2870.7	3772.1	4146.6	4211.5	4255.3
47.5°	955.4	966.3	1046.7	1230.3	1504.3	1931.7	2812.2	3915.5	4381.3	4457.1	4545.7
50°	808.3	823.8	901.5	1083.2	1349.0	1734.5	2655.1	4083.6	4645.3	4743.9	4846.2
52.5°	666.7	665.8	748.0	937.1	1192.8	1567.3	2400.3	4259.9	4950.4	5056.3	5166.8
55°	504.2	504.2	585.5	758.1	1023.9	1418.4	2127.2	4369.5	5233.5	5361.4	5481.9
57.5°	346.2	355.3	432.0	580.9	847.6	1282.3	1918.0	4306.4	5450.0	5608.9	5752.3
60°	256.7	265.8	322.4	417.4	663.1	1121.6	1760.9	4009.6	5580.6	5791.6	5977.9
62.5°	221.9	228.3	282.2	334.3	477.7	950.8	1622.1	3632.4	5768.7	6057.3	6316.7
65°	198.2	204.6	258.5	288.6	373.6	764.5	1544.5	3416.8	5993.4	6434.6	6810.9
67.5°	183.6	190.9	236.6	258.5	326.1	691.4	1484.2	3366.6	5991.6	6526.8	7007.2
69°	176.3	181.8	219.2	243.0	315.1	669.5	1353.6	3148.3	5596.1	6170.6	6652.8
70°	171.7	177.2	209.2	232.9	311.5	630.2	1233.0	2859.7	5145.8	5724.0	6213.5
72.5°	157.1	162.6	186.3	208.2	259.4	421.1	859.5	1830.4	3677.1	4090.0	4649.9
75°	138.8	145.2	163.5	181.8	196.4	243.9	495.9	949.9	2102.5	2415.8	2914.5
77.5°	113.3	119.6	138.8	168.1	166.2	185.4	322.4	583.6	984.6	1221.1	1405.6
80°	93.2	97.7	114.2	169.9	136.1	155.3	261.2	478.6	693.2	766.3	810.1
82.5°	62.1	68.5	88.6	133.3	104.1	110.5	195.5	447.5	586.4	643.0	696.0
85°	29.2	32.0	53.9	71.2	63.0	59.4	111.4	316.0	436.6	463.1	483.2
87.5°	0.0	0.0	2.7	5.5	8.2	8.2	20.1	66.7	122.4	148.0	146.1
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: P158009

CATALOG NUMBER: VST-E05-LED-E-U-RW-7030

CANDELA DISTRIBUTION (continued):

	73°	74°	75°	76°	77°	78°	79°	80°	81°	82°	83°
0°	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6
2.5°	2721.8	2722.7	2721.8	2721.8	2720.9	2719.0	2719.0	2717.2	2718.1	2717.2	2719.0
5°	2763.8	2763.8	2761.1	2759.2	2762.0	2759.2	2760.1	2755.6	2755.6	2752.8	2749.2
7.5°	2824.1	2824.1	2825.0	2819.5	2823.2	2824.1	2821.3	2819.5	2817.7	2813.1	2814.0
10°	2904.5	2904.5	2907.2	2899.9	2903.5	2905.4	2906.3	2906.3	2904.5	2896.2	2897.1
12.5°	2994.0	2992.1	2993.0	2989.4	2993.0	2994.9	2996.7	2994.9	2994.9	2993.0	2992.1
15°	3075.3	3074.3	3076.2	3073.4	3074.3	3076.2	3081.6	3080.7	3079.8	3074.3	3074.3
17.5°	3131.0	3128.2	3126.4	3125.5	3125.5	3124.6	3125.5	3125.5	3122.7	3121.8	3121.8
20°	3152.0	3144.7	3140.1	3137.4	3133.7	3131.9	3130.1	3131.0	3129.1	3126.4	3127.3
22.5°	3155.6	3145.6	3136.4	3128.2	3120.9	3116.4	3111.8	3110.0	3105.4	3102.7	3102.7
25°	3173.0	3157.5	3142.8	3129.1	3118.2	3108.1	3098.1	3090.8	3085.3	3078.9	3077.1
27.5°	3211.3	3194.9	3177.5	3160.2	3145.6	3125.5	3111.8	3097.2	3084.4	3074.3	3067.0
30°	3270.7	3254.3	3236.9	3216.8	3197.6	3176.6	3153.8	3136.4	3118.2	3098.1	3087.1
32.5°	3349.3	3338.3	3320.9	3301.8	3284.4	3262.5	3235.1	3208.6	3191.2	3167.5	3150.1
35°	3461.6	3448.8	3443.3	3435.1	3417.8	3404.1	3373.9	3349.3	3332.8	3299.9	3287.1
37.5°	3615.0	3614.1	3618.7	3616.0	3618.7	3601.3	3587.6	3586.7	3563.0	3531.0	3500.0
40°	3824.2	3835.2	3859.8	3877.2	3893.6	3895.4	3914.6	3894.5	3897.3	3892.7	3860.7
42.5°	4062.6	4100.0	4129.3	4180.4	4219.7	4256.2	4280.9	4314.7	4340.2	4363.1	4368.6
45°	4328.4	4384.1	4451.7	4497.3	4574.1	4635.3	4719.3	4784.1	4851.7	4918.4	4942.1
47.5°	4617.0	4686.4	4761.3	4846.2	4943.1	5039.0	5168.6	5268.2	5376.9	5467.3	5547.7
50°	4935.7	5007.9	5108.4	5206.1	5339.4	5450.0	5619.8	5750.5	5925.8	6046.4	6150.5
52.5°	5268.2	5358.6	5471.0	5578.7	5714.8	5856.4	6045.5	6238.2	6449.2	6631.8	6783.5
55°	5593.4	5704.8	5812.6	5938.6	6089.3	6253.7	6467.4	6721.3	6984.4	7193.5	7394.5
57.5°	5882.9	6011.7	6138.6	6266.5	6420.9	6611.7	6852.0	7126.0	7427.4	7705.9	7981.8
60°	6151.4	6305.8	6461.0	6620.9	6798.1	7033.7	7322.3	7659.4	8049.4	8430.2	8791.0
62.5°	6576.1	6778.9	6971.6	7178.0	7391.7	7668.5	8009.2	8451.2	8898.8	9374.6	9744.5
65°	7151.5	7436.5	7688.6	7956.2	8232.9	8602.8	9010.2	9539.0	10180.2	10667.9	11261.6
67.5°	7437.4	7812.8	8137.0	8434.8	8777.3	9150.9	9634.9	10260.6	10944.7	11651.6	12313.8
69°	7101.3	7488.6	7847.5	8180.9	8527.0	8889.6	9395.6	10037.7	10761.1	11525.6	12172.2
70°	6665.6	7052.9	7435.6	7815.5	8131.6	8485.0	8992.8	9655.0	10377.5	11172.1	11813.3
72.5°	5106.5	5572.4	5918.5	6274.7	6641.0	6940.5	7526.9	8085.0	8837.6	9644.1	10350.1
75°	3267.1	3695.4	4073.5	4376.8	4734.8	5093.8	5526.7	6146.8	6618.1	7280.3	7853.0
77.5°	1678.7	1805.7	2170.1	2278.8	2527.2	2722.7	2961.1	3116.4	3500.0	3581.2	3919.2
80°	795.5	717.0	675.0	636.6	647.6	643.0	623.8	598.2	630.2	616.5	611.0
82.5°	693.2	618.3	493.2	419.2	362.6	307.8	264.9	243.0	245.7	253.0	255.7
85°	485.9	456.7	356.2	270.4	211.0	163.5	131.5	126.0	129.7	139.7	136.1
87.5°	140.7	147.0	129.7	90.4	63.0	45.7	35.6	40.2	38.4	37.4	39.3
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: P158009

CATALOG NUMBER: VST-E05-LED-E-U-RW-7030

CANDELA DISTRIBUTION (continued):

	84°	85°	86°	87°	88°	89°	90°	91°	92°	93°	94°
0°	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6
2.5°	2719.0	2718.1	2715.4	2712.7	2712.7	2710.8	2712.7	2713.6	2712.7	2712.7	2710.8
5°	2750.1	2751.0	2753.8	2748.3	2747.4	2748.3	2744.6	2743.7	2743.7	2743.7	2740.1
7.5°	2809.5	2812.2	2812.2	2808.6	2807.6	2810.4	2804.9	2803.1	2800.3	2799.4	2798.5
10°	2898.1	2900.8	2896.2	2893.5	2890.8	2894.4	2889.8	2889.8	2887.1	2884.4	2883.4
12.5°	2996.7	2994.9	2993.0	2994.9	2992.1	2992.1	2989.4	2987.6	2986.7	2985.7	2983.9
15°	3073.4	3079.8	3079.8	3081.6	3079.8	3079.8	3076.2	3077.1	3075.3	3074.3	3075.3
17.5°	3122.7	3124.6	3129.1	3131.9	3131.9	3132.8	3131.0	3132.8	3131.0	3131.0	3134.6
20°	3129.1	3131.0	3135.5	3140.1	3142.8	3144.7	3144.7	3147.4	3149.2	3151.1	3155.6
22.5°	3103.6	3106.3	3111.8	3120.0	3124.6	3126.4	3130.1	3134.6	3139.2	3142.8	3149.2
25°	3077.1	3078.0	3083.5	3091.7	3097.2	3101.7	3108.1	3113.6	3120.0	3127.3	3134.6
27.5°	3062.5	3061.6	3066.1	3074.3	3078.9	3085.3	3090.8	3099.0	3106.3	3115.4	3121.8
30°	3075.3	3067.9	3068.9	3072.5	3076.2	3080.7	3087.1	3094.4	3102.7	3110.9	3118.2
32.5°	3131.9	3115.4	3104.5	3101.7	3102.7	3103.6	3107.2	3111.8	3118.2	3124.6	3127.3
35°	3254.3	3226.0	3211.3	3199.5	3189.4	3181.2	3183.0	3182.1	3182.1	3187.6	3181.2
37.5°	3487.2	3451.6	3436.0	3415.0	3403.1	3373.0	3364.8	3363.0	3351.1	3351.1	3337.4
40°	3852.5	3831.5	3819.6	3800.5	3742.9	3750.2	3709.1	3710.0	3676.2	3679.9	3656.1
42.5°	4372.2	4374.9	4360.3	4347.5	4302.8	4282.7	4244.3	4189.5	4146.6	4145.7	4098.2
45°	4973.2	5006.1	4959.5	4975.9	4936.7	4882.8	4838.0	4767.7	4701.0	4680.0	4631.6
47.5°	5601.6	5655.5	5619.8	5626.2	5607.1	5530.3	5470.1	5383.3	5296.5	5238.1	5208.8
50°	6272.9	6308.5	6307.6	6290.2	6281.1	6206.2	6109.4	6043.6	5979.7	5901.2	5875.6
52.5°	6881.2	6964.3	7020.0	7007.2	6980.7	6936.0	6850.1	6793.5	6699.4	6688.5	6699.4
55°	7532.4	7640.2	7696.8	7765.3	7766.2	7758.0	7722.4	7701.4	7613.7	7623.7	7610.9
57.5°	8148.9	8306.9	8393.7	8539.8	8590.1	8656.7	8632.1	8659.5	8606.5	8641.2	8631.2
60°	8984.6	9203.8	9348.1	9548.2	9641.3	9808.5	9841.3	9861.4	9890.7	9961.9	9921.7
62.5°	10035.9	10357.4	10657.0	10929.2	11018.7	11269.8	11310.9	11468.0	11476.2	11524.7	11436.1
65°	11756.6	12148.5	12478.2	12804.3	12992.4	13286.5	13405.2	13710.3	13617.1	13656.4	13467.4
67.5°	12883.7	13339.5	13781.5	14090.3	14402.6	14703.1	14919.6	15116.9	15115.0	15076.7	14908.6
69°	12784.2	13292.0	13727.7	14141.4	14470.2	14778.9	15039.2	15167.1	15211.8	15156.1	15036.5
70°	12439.8	12961.4	13494.8	13835.4	14193.5	14532.3	14800.8	14940.6	14971.6	14932.4	14829.2
72.5°	10848.8	11349.3	11937.5	12247.1	12680.0	12924.8	13294.7	13475.6	13507.5	13457.3	13389.7
75°	8466.8	8557.2	9156.3	9353.6	9667.8	9950.0	10180.2	10121.7	10285.2	10253.3	10227.7
77.5°	3988.6	3747.5	4135.7	4316.5	4221.5	3968.5	4336.6	4070.8	4247.1	4476.3	4417.9
80°	657.6	655.8	673.1	711.5	665.8	706.9	706.0	685.9	687.8	737.1	711.5
82.5°	253.0	258.5	261.2	268.5	268.5	269.4	274.0	279.5	274.9	284.1	282.2
85°	137.0	146.1	137.9	131.5	136.1	138.8	142.5	147.0	142.5	156.2	148.9
87.5°	35.6	37.4	32.9	32.9	32.0	29.2	29.2	31.1	33.8	40.2	43.8
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: P158009

CATALOG NUMBER: VST-E05-LED-E-U-RW-7030

CANDELA DISTRIBUTION (continued):

	95°	96°	97°	98°	99°	100°	101°	102°	103°	104°	105°
0°	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6
2.5°	2707.2	2708.1	2709.0	2706.3	2704.4	2704.4	2703.5	2701.7	2700.8	2700.8	2700.8
5°	2738.2	2740.1	2735.5	2734.6	2732.7	2730.9	2730.9	2729.1	2730.0	2730.0	2725.4
7.5°	2800.3	2797.6	2792.1	2788.5	2792.1	2785.7	2783.0	2784.8	2783.0	2783.9	2782.1
10°	2883.4	2883.4	2877.1	2880.7	2876.1	2868.8	2871.6	2868.8	2867.0	2860.6	2864.3
12.5°	2986.7	2983.9	2980.3	2972.0	2969.3	2968.4	2960.2	2961.1	2958.3	2956.5	2953.8
15°	3077.1	3076.2	3067.9	3063.4	3062.5	3058.8	3055.2	3053.3	3048.8	3047.9	3046.0
17.5°	3137.4	3134.6	3131.0	3126.4	3126.4	3120.9	3119.1	3114.5	3113.6	3110.9	3108.1
20°	3157.5	3158.4	3154.7	3151.1	3149.2	3145.6	3142.8	3139.2	3137.4	3133.7	3131.0
22.5°	3152.9	3152.9	3149.2	3148.3	3144.7	3139.2	3135.5	3131.0	3126.4	3121.8	3116.4
25°	3138.3	3137.4	3134.6	3130.1	3125.5	3117.3	3110.0	3102.7	3096.3	3090.8	3082.6
27.5°	3125.5	3123.7	3118.2	3111.8	3102.7	3093.5	3079.8	3069.8	3061.6	3054.2	3045.1
30°	3120.9	3114.5	3106.3	3096.3	3085.3	3071.6	3057.0	3044.2	3035.1	3027.8	3024.1
32.5°	3126.4	3118.2	3105.4	3092.6	3078.9	3062.5	3047.9	3036.9	3028.7	3026.8	3026.8
35°	3176.6	3162.9	3145.6	3127.3	3110.0	3096.3	3086.2	3085.3	3079.8	3086.2	3096.3
37.5°	3323.7	3311.8	3285.3	3261.6	3249.7	3243.3	3234.2	3236.0	3223.2	3243.3	3259.7
40°	3636.0	3621.4	3590.4	3571.2	3547.5	3524.6	3542.9	3537.4	3546.5	3542.9	3560.2
42.5°	4091.8	4077.2	4027.9	4020.6	4010.5	4001.4	4001.4	3994.1	3990.4	4003.2	3988.6
45°	4646.2	4617.0	4598.7	4620.6	4590.5	4599.6	4631.6	4588.7	4598.7	4539.4	4484.6
47.5°	5221.6	5218.9	5214.3	5240.8	5245.4	5259.1	5276.4	5232.6	5153.1	5108.4	4996.9
50°	5883.8	5912.1	5923.1	5948.7	5959.6	5969.7	5942.3	5877.4	5743.1	5624.4	5492.9
52.5°	6688.5	6639.1	6706.7	6731.4	6720.4	6680.2	6581.6	6502.1	6316.7	6145.9	5942.3
55°	7625.6	7637.4	7589.9	7570.8	7533.3	7421.9	7285.8	7106.8	6872.0	6649.2	6391.6
57.5°	8580.0	8575.4	8501.5	8397.3	8270.4	8136.1	7933.4	7676.7	7402.7	7103.1	6791.7
60°	9740.9	9736.3	9586.5	9408.4	9227.6	9011.1	8693.3	8384.6	8017.4	7623.7	7252.9
62.5°	11266.2	11069.8	10922.8	10657.0	10377.5	10094.3	9664.2	9254.1	8763.6	8266.7	7833.8
65°	13220.7	12897.4	12730.3	12344.8	11911.9	11469.9	11032.4	10493.5	9833.1	9232.1	8703.3
67.5°	14666.6	14370.7	14064.7	13680.2	13205.2	12712.0	12112.9	11434.2	10684.4	10010.3	9434.0
69°	14793.5	14516.8	14149.6	13764.2	13314.8	12778.7	12124.7	11364.8	10604.9	9922.6	9355.4
70°	14600.8	14306.7	13920.4	13519.4	13017.1	12511.1	11826.1	11034.2	10273.4	9589.3	9035.8
72.5°	13163.2	12876.4	12465.4	11985.9	11470.8	11037.8	10387.5	9561.9	8734.4	8102.3	7671.2
75°	10009.4	9946.4	9655.0	9375.5	8970.0	8486.9	7892.3	7336.9	6658.3	5989.8	5587.9
77.5°	4270.8	4416.0	4567.7	4589.6	4604.2	4455.3	4363.1	4223.3	3769.4	3563.0	3350.2
80°	789.1	705.1	752.6	758.1	789.1	805.6	865.9	1026.6	1044.9	1084.1	1132.6
82.5°	280.4	285.0	292.3	295.0	297.8	308.7	349.8	419.2	482.2	564.5	674.1
85°	158.9	161.7	168.1	173.5	177.2	188.2	211.0	252.1	314.2	408.3	553.5
87.5°	48.4	54.8	58.5	65.8	68.5	70.3	80.4	107.8	138.8	205.5	299.6
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: P158009

CATALOG NUMBER: VST-E05-LED-E-U-RW-7030

CANDELA DISTRIBUTION (continued):

	106°	107°	108°	109°	110°	115°	125°	135°	145°	155°	165°
0°	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6	2702.6
2.5°	2700.8	2699.9	2698.0	2696.2	2697.1	2695.3	2689.8	2688.0	2681.6	2677.0	2673.4
5°	2725.4	2724.5	2720.9	2721.8	2720.9	2711.7	2705.3	2694.4	2688.0	2677.9	2674.3
7.5°	2776.6	2775.7	2769.3	2772.0	2770.2	2756.5	2745.5	2728.2	2719.0	2706.3	2696.2
10°	2853.3	2853.3	2846.0	2846.9	2846.9	2828.6	2809.5	2780.2	2759.2	2739.1	2721.8
12.5°	2946.5	2942.8	2941.9	2937.3	2933.7	2913.6	2884.4	2845.1	2805.8	2772.9	2749.2
15°	3040.5	3035.1	3032.3	3026.8	3022.3	3004.0	2964.7	2916.3	2863.4	2810.4	2771.1
17.5°	3101.7	3098.1	3092.6	3090.8	3084.4	3066.1	3038.7	2990.3	2924.5	2850.6	2791.2
20°	3124.6	3118.2	3114.5	3110.9	3107.2	3094.4	3094.4	3063.4	2990.3	2886.2	2795.8
22.5°	3110.0	3106.3	3100.8	3098.1	3094.4	3096.3	3131.9	3127.3	3043.3	2894.4	2762.9
25°	3076.2	3071.6	3067.0	3067.0	3066.1	3085.3	3171.2	3183.0	3058.8	2854.2	2690.7
27.5°	3041.5	3035.1	3036.9	3037.8	3042.4	3083.5	3214.1	3197.6	3016.8	2757.4	2566.5
30°	3020.4	3020.4	3025.0	3032.3	3041.5	3113.6	3247.9	3164.8	2908.1	2611.3	2402.1
32.5°	3029.6	3038.7	3048.8	3067.0	3080.7	3180.3	3259.7	3079.8	2750.1	2430.4	2230.4
35°	3110.9	3121.8	3141.0	3169.3	3185.8	3276.2	3259.7	2955.6	2566.5	2275.2	2053.2
37.5°	3288.1	3299.0	3321.9	3343.8	3360.2	3396.7	3246.0	2797.6	2413.1	2114.4	1894.3
40°	3573.0	3588.6	3605.0	3601.3	3590.4	3554.8	3218.6	2650.5	2271.5	1973.8	1738.1
42.5°	3974.0	3959.4	3957.5	3921.9	3885.4	3732.9	3198.6	2554.6	2150.0	1825.8	1582.8
45°	4437.1	4377.7	4316.5	4269.0	4213.3	3928.3	3193.1	2477.0	2015.8	1661.4	1413.9
47.5°	4902.9	4807.9	4689.1	4615.2	4524.7	4136.6	3209.5	2372.9	1843.1	1482.4	1255.9
50°	5359.5	5204.3	5057.2	4968.6	4866.3	4375.9	3236.0	2197.5	1636.7	1319.8	1111.5
52.5°	5782.4	5582.4	5431.7	5327.6	5202.4	4654.4	3212.3	1967.4	1457.7	1163.6	974.5
55°	6184.3	5963.3	5807.1	5697.5	5550.4	4933.9	3040.5	1758.2	1286.9	1011.1	820.2
57.5°	6535.9	6324.0	6161.5	6012.6	5888.4	5176.9	2701.7	1585.6	1122.5	836.6	653.0
60°	6946.9	6708.6	6515.8	6356.9	6210.8	5302.0	2321.7	1432.1	947.1	647.6	472.2
62.5°	7501.3	7227.3	7004.5	6822.7	6631.8	5329.4	2062.3	1278.7	751.7	468.5	343.4
65°	8323.4	7985.4	7706.9	7456.6	7198.1	5216.1	1934.5	1111.5	559.0	348.0	287.7
67.5°	8976.4	8625.7	8303.3	7981.8	7651.1	5006.1	1906.2	957.2	429.3	295.9	258.5
69°	8896.9	8562.7	8266.7	7918.7	7552.5	4742.1	1877.8	897.8	391.8	274.9	244.8
70°	8591.0	8274.0	7973.5	7690.4	7242.0	4448.0	1803.0	864.9	377.2	264.9	234.7
72.5°	7259.3	6892.1	6600.8	6248.2	5776.0	3305.4	1367.3	699.6	346.2	242.0	211.9
75°	5294.7	4990.5	4700.1	4310.1	3850.7	1912.6	851.2	400.0	253.9	219.2	191.8
77.5°	3091.7	3023.2	2742.8	2486.1	2031.3	973.6	488.6	239.3	197.3	199.1	169.0
80°	1163.6	1239.4	1267.7	1179.1	1089.6	672.2	355.3	194.5	171.7	196.4	143.4
82.5°	848.5	984.6	1001.0	959.0	892.3	626.6	284.1	156.2	139.7	211.0	123.3
85°	707.8	783.7	795.5	751.7	729.8	530.7	198.2	109.6	102.3	151.6	92.2
87.5°	358.0	377.2	387.3	350.7	352.6	247.5	79.5	46.6	55.7	64.8	51.1
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: P158009

CATALOG NUMBER: VST-E05-LED-E-U-RW-7030

CANDELA DISTRIBUTION (continued):

	175°	180°
0°	2702.6	2702.6
2.5°	2665.2	2670.6
5°	2668.8	2668.8
7.5°	2689.8	2689.8
10°	2712.7	2713.6
12.5°	2733.7	2732.7
15°	2750.1	2747.4
17.5°	2760.1	2757.4
20°	2750.1	2745.5
22.5°	2699.0	2686.2
25°	2605.8	2589.3
27.5°	2482.5	2471.5
30°	2321.7	2305.3
32.5°	2133.6	2125.4
35°	1953.7	1943.6
37.5°	1789.3	1786.5
40°	1650.4	1635.8
42.5°	1487.8	1481.5
45°	1322.5	1318.9
47.5°	1167.3	1163.6
50°	1023.9	1016.6
52.5°	883.2	871.3
55°	727.0	718.8
57.5°	558.1	550.8
60°	392.7	384.5
62.5°	279.5	270.4
65°	232.9	225.6
67.5°	211.0	202.8
69°	200.9	193.6
70°	194.5	189.1
72.5°	180.8	177.2
75°	165.3	162.6
77.5°	145.2	140.7
80°	121.5	116.9
82.5°	102.3	97.7
85°	68.5	62.1
87.5°	31.1	27.4
90°	0.0	0.0

(END OF REPORT)