

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: P836171

Luminaire Tested: **ARCH3-150-727-U-T2R-HSS**

Issue Date: 5/16/2024

Test Information

Test Method: LM-79-08
Report Number: P836171
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2403-329-2)
Test Lab: INNOVATION CENTER
Issue Date: 5/16/2024
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: ARCH3-150-727-U-T2R-HSS
Description: ARCHEON CONTEMPORARY ROADWAY AND AREA LUMINAIRE
(1) 70 CRI, 2700K, 1170mA LIGHTSQUARE WITH 40 LEDS AND TYPE II ROADWAY
OPTICS WITH HOUSE SIDE SHIELD
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 14464 lumens
Efficiency: N/A
Efficacy: 96.0 lumens/watt
Luminous Opening: Rectangular (W 0.58' x L: 0.58' x H: 0')
IES Classification: Type II - Short
BUG Rating: B2 - U0 - G2

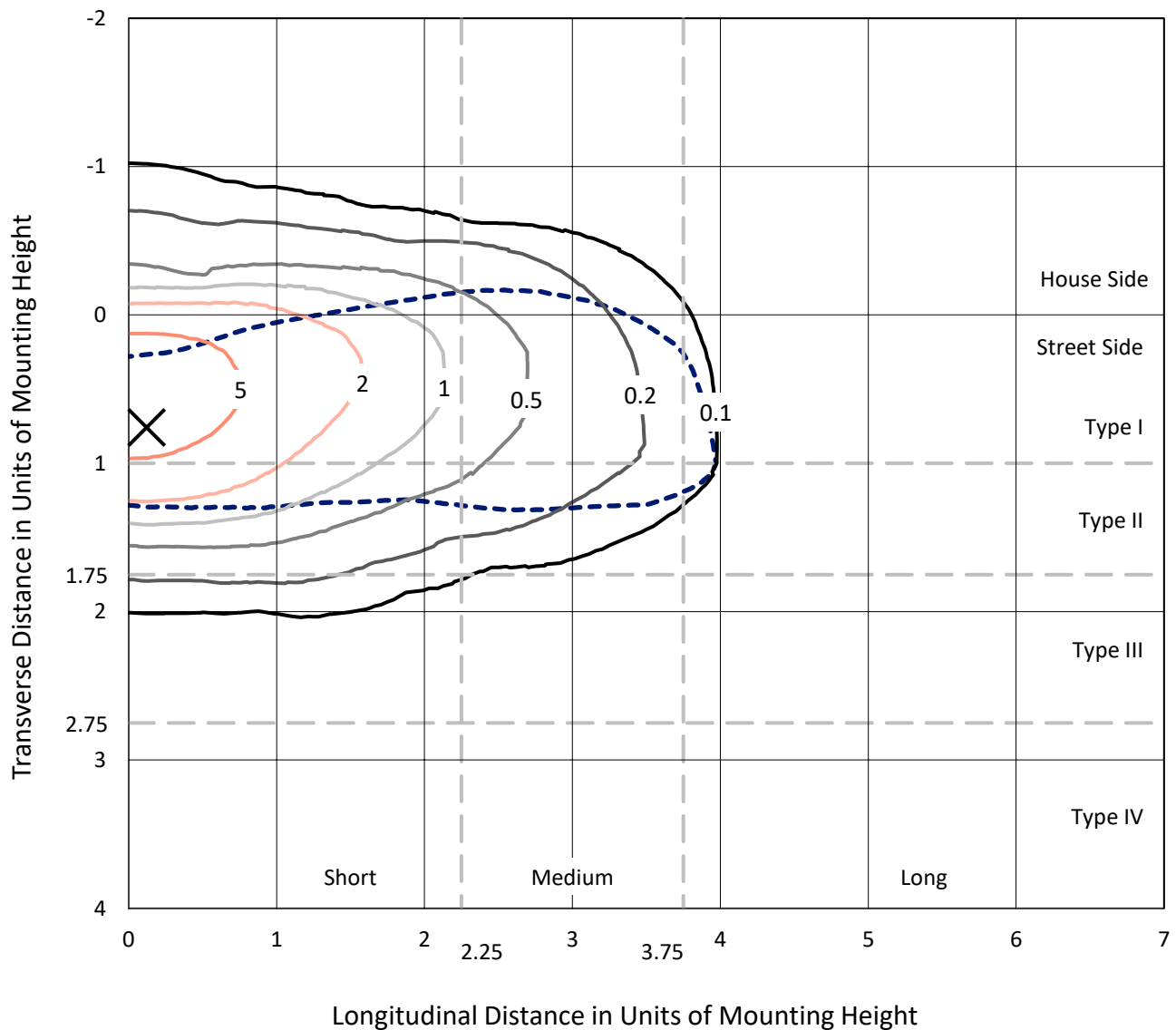
Input Watts (W): 150.7
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



REPORT NUMBER: P836171
CATALOG NUMBER: ARCH3-150-727-U-T2R-HSS

Iso-Footcandle Lines of Horizontal Illumination

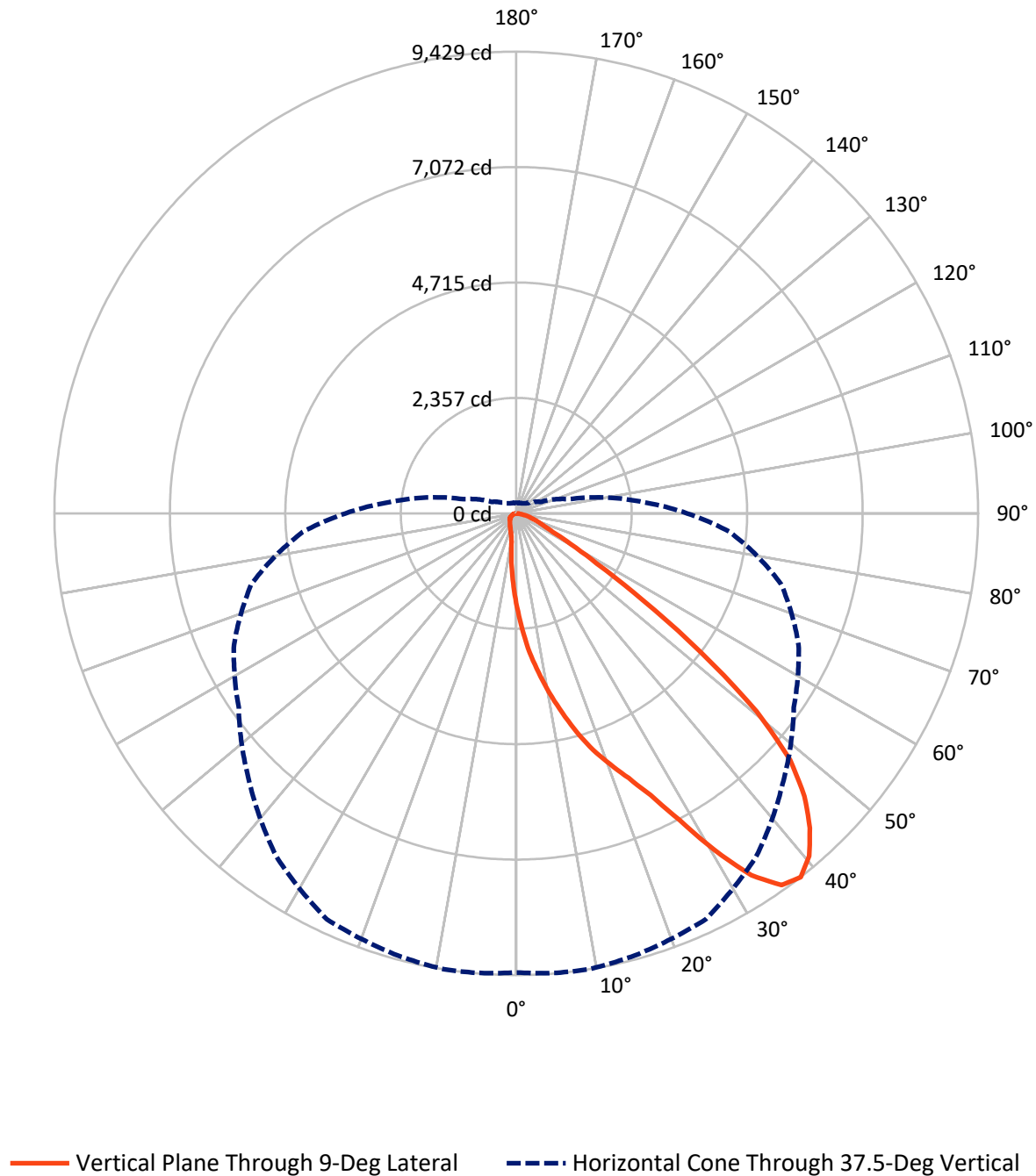
× Max cd
- - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 8.5 fc
Type II - Short - N/A

REPORT NUMBER: P836171
CATALOG NUMBER: ARCH3-150-727-U-T2R-HSS

Luminous Intensity Polar Plot



REPORT NUMBER: P836171

CATALOG NUMBER: ARCH3-150-727-U-T2R-HSS

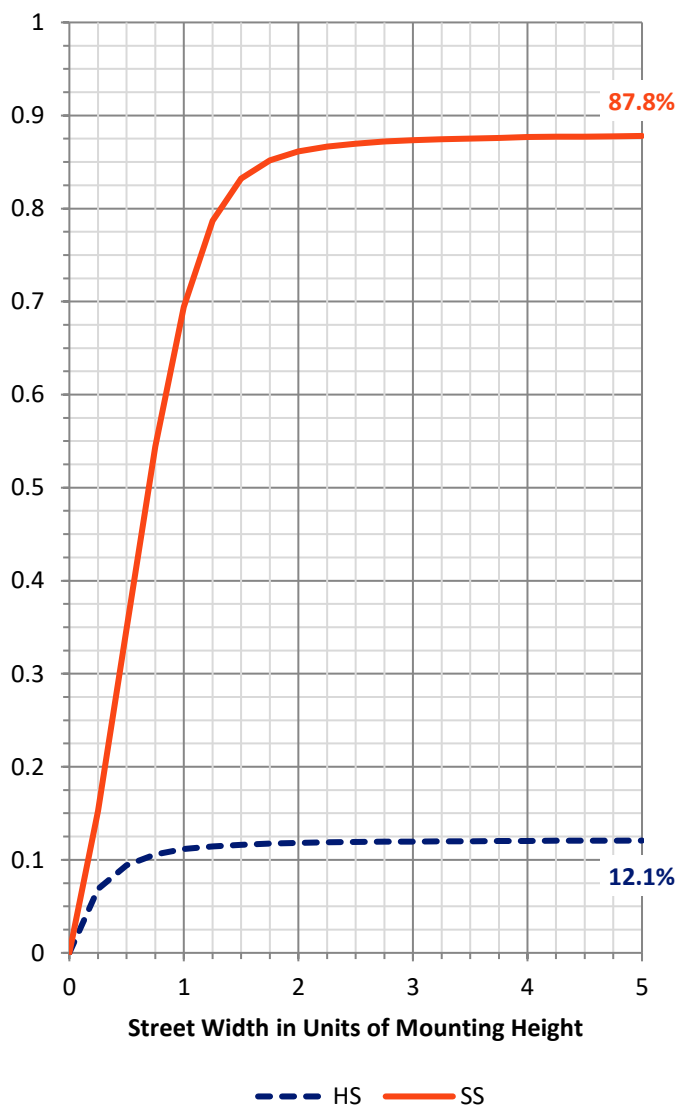
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	1759.1	0.0	1759.1
	% Fixture	12.2	0.0	12.2
Street Side	Lumens	12704.9	0.0	12704.9
	% Fixture	87.8	0.0	87.8
Total	Lumens	14464.0	0.0	14464.0
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	192.2	1.3
10°-20°	668.0	4.6
20°-30°	1372.5	9.5
30°-40°	2426.0	16.8
40°-50°	3222.7	22.3
50°-60°	3056.6	21.1
60°-70°	2331.9	16.1
70°-80°	1130.5	7.8
80°-90°	63.6	0.4
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°	14464.0	100.0
0°-180°	14464.0	100.0

Coefficient of Utilization



REPORT NUMBER: P836171

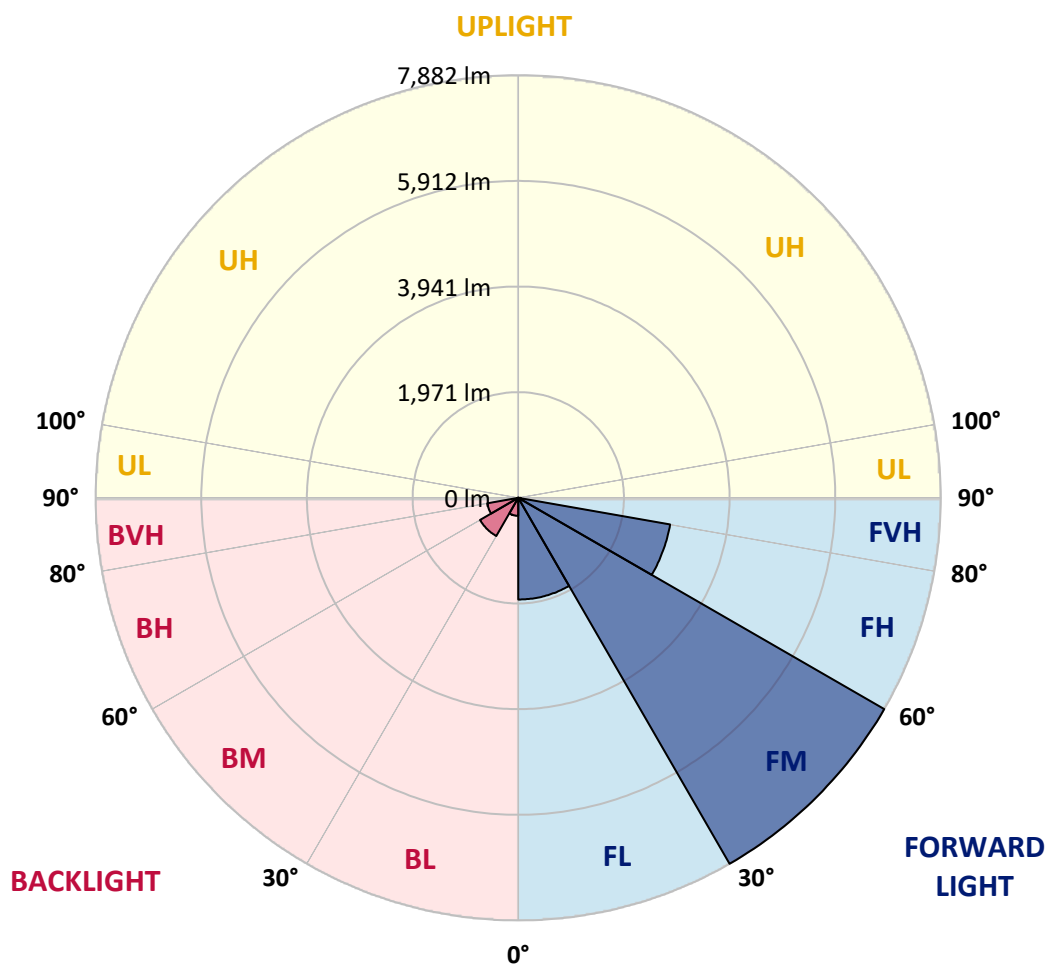
CATALOG NUMBER: ARCH3-150-727-U-T2R-HSS

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	1897.0	13.1			
FM	(30°-60°)	7882.2	54.5			
FH	(60°-80°)	2875.4	19.9			G2/5000
FVH	(80°-90°)	50.4	0.3			G1/100
BL	(0°-30°)	335.7	2.3	B1/500		
BM	(30°-60°)	823.1	5.7	B1/1000		
BH	(60°-80°)	587.0	4.1	B2/1000		G2/1000
BVH	(80°-90°)	13.2	0.1			G1/100
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B2-U0-G2

Type II Short



REPORT NUMBER: P836171

CATALOG NUMBER: ARCH3-150-727-U-T2R-HSS

CANDELA DISTRIBUTION (FULL):

	0°	5°	9°	15°	25°	35°	45°	55°	65°	75°	85°
0°	1912.0	1912.0	1912.0	1912.0	1912.0	1912.0	1912.0	1912.0	1912.0	1912.0	1912.0
2.5°	2369.2	2327.6	2375.1	2369.2	2327.6	2300.9	2217.8	2191.0	2093.1	2021.8	1959.5
5°	2856.1	2814.5	2856.1	2844.2	2784.8	2719.5	2582.9	2493.9	2318.7	2164.3	2024.8
7.5°	3259.8	3259.8	3277.7	3280.6	3209.4	3108.4	2939.2	2805.6	2559.2	2321.7	2099.0
10°	3696.3	3699.2	3737.8	3711.1	3616.1	3479.5	3265.8	3096.6	2799.7	2487.9	2170.3
12.5°	4162.4	4165.4	4177.2	4165.4	4052.5	3877.4	3619.1	3396.4	3055.0	2677.9	2268.2
15°	4628.5	4631.5	4646.3	4625.5	4500.8	4296.0	4002.1	3728.9	3325.2	2891.7	2387.0
17.5°	5064.9	5070.9	5082.7	5056.0	4925.4	4681.9	4382.1	4052.5	3613.1	3120.3	2520.6
20°	5456.8	5462.8	5471.7	5436.0	5305.4	5062.0	4738.4	4394.0	3907.1	3354.8	2666.1
22.5°	5851.7	5857.6	5872.5	5825.0	5679.5	5400.4	5082.7	4726.5	4218.8	3613.1	2835.3
25°	6356.4	6362.3	6374.2	6305.9	6107.0	5780.4	5444.9	5079.8	4557.2	3904.1	3043.1
27.5°	7095.6	7089.7	7089.7	6965.0	6623.6	6199.0	5810.1	5439.0	4922.4	4215.8	3271.7
30°	8010.1	7995.2	7986.3	7817.1	7330.2	6671.1	6184.2	5774.5	5272.8	4545.4	3518.1
32.5°	8829.5	8829.5	8811.7	8633.5	8116.9	7306.4	6582.0	6101.1	5611.2	4877.9	3773.5
35°	9313.4	9334.2	9325.3	9191.7	8814.6	7989.3	7119.4	6493.0	5967.5	5225.2	4079.3
37.5°	9378.7	9420.3	9429.2	9349.0	9150.1	8547.4	7716.1	6917.5	6359.4	5599.3	4376.1
40°	9114.5	9203.6	9203.6	9191.7	9120.4	8811.7	8217.9	7410.4	6763.1	5988.3	4676.0
42.5°	8707.8	8799.8	8787.9	8832.5	8814.6	8749.3	8499.9	7870.5	7166.9	6389.1	4949.1
45°	8176.3	8271.3	8247.6	8327.7	8363.4	8434.6	8470.2	8191.2	7564.7	6825.5	5254.9
47.5°	7324.3	7484.6	7520.2	7662.7	7811.2	8033.8	8203.0	8307.0	7935.8	7294.6	5587.5
50°	6065.4	6291.1	6362.3	6662.2	7068.9	7529.1	7802.2	8164.5	8197.1	7775.5	5946.7
52.5°	4343.5	4604.7	4714.6	5207.4	6044.7	6846.3	7339.1	7849.7	8298.1	8235.7	6335.6
55°	2808.6	3031.2	3138.1	3601.3	4714.6	5973.4	6792.8	7443.0	8241.6	8657.3	6780.9
57.5°	1730.9	1858.5	1929.8	2327.6	3351.9	4854.1	6077.3	7068.9	8069.4	9022.5	7244.1
60°	1166.8	1241.0	1276.6	1463.7	2277.1	3628.0	5094.6	6677.0	7843.8	9268.9	7665.7
62.5°	774.9	798.6	834.3	950.0	1502.3	2547.3	3913.0	5976.4	7674.6	9283.7	7977.4
65°	599.7	611.6	626.4	676.9	926.3	1781.3	2752.2	4842.3	7422.2	8969.0	8075.4
67.5°	472.1	483.9	501.7	528.5	671.0	1208.3	1873.4	3547.8	6905.6	8476.2	7915.1
70°	371.1	380.0	391.9	415.6	522.5	875.8	1238.0	2357.3	5863.6	8007.1	7410.4
72.5°	293.9	302.8	314.7	338.5	424.6	641.3	849.1	1469.6	4521.6	7434.1	6439.5
75°	231.6	237.5	246.4	270.2	341.4	498.8	576.0	878.8	3072.8	6386.1	5017.4
77.5°	115.8	142.5	163.3	187.0	249.4	344.4	383.0	486.9	1297.4	3277.7	2392.9
80°	68.3	83.1	89.1	103.9	163.3	207.8	207.8	195.9	409.7	1258.8	976.8
82.5°	38.6	53.4	56.4	59.4	98.0	118.8	95.0	71.3	83.1	421.6	285.0
85°	11.9	17.8	20.8	23.8	32.7	35.6	32.7	29.7	23.8	41.6	26.7
87.5°	0.0	0.0	0.0	0.0	3.0	5.9	5.9	5.9	8.9	8.9	8.9
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: P836171

CATALOG NUMBER: ARCH3-150-727-U-T2R-HSS

CANDELA DISTRIBUTION (continued):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	1912.0	1912.0	1912.0	1912.0	1912.0	1912.0	1912.0	1912.0	1912.0	1912.0	1912.0
2.5°	1923.8	1885.2	1811.0	1742.7	1677.4	1629.9	1585.4	1543.8	1514.1	1490.4	1487.4
5°	1950.6	1873.4	1730.9	1597.3	1475.5	1374.6	1288.5	1220.2	1169.7	1134.1	1131.1
7.5°	1986.2	1867.4	1650.7	1451.8	1270.7	1125.2	1000.5	908.5	843.2	816.4	795.7
10°	2015.9	1861.5	1570.5	1306.3	1068.8	884.7	736.3	644.2	596.7	578.9	570.0
12.5°	2066.3	1867.4	1502.3	1172.7	893.6	676.9	564.1	513.6	492.8	478.0	475.0
15°	2140.6	1894.2	1436.9	1042.1	715.5	546.3	481.0	448.3	427.5	424.6	421.6
17.5°	2214.8	1917.9	1377.6	908.5	593.8	475.0	430.5	403.8	388.9	386.0	386.0
20°	2300.9	1947.6	1312.2	780.8	507.7	427.5	391.9	371.1	353.3	350.3	350.3
22.5°	2401.8	1989.2	1249.9	668.0	451.3	391.9	362.2	338.5	323.6	320.6	320.6
25°	2538.4	2051.5	1199.4	584.9	412.7	362.2	335.5	314.7	302.8	296.9	296.9
27.5°	2689.8	2137.6	1163.8	534.4	386.0	338.5	311.7	293.9	282.0	276.1	276.1
30°	2859.0	2232.6	1140.1	513.6	371.1	317.7	293.9	276.1	261.3	258.3	258.3
32.5°	3046.1	2342.5	1125.2	516.6	368.1	302.8	276.1	258.3	246.4	240.5	240.5
35°	3253.9	2464.2	1116.3	534.4	374.1	291.0	261.3	243.4	231.6	225.6	225.6
37.5°	3485.5	2606.7	1116.3	552.2	388.9	288.0	246.4	228.6	219.7	213.8	213.8
40°	3702.2	2758.1	1128.2	573.0	403.8	288.0	234.5	219.7	207.8	201.9	201.9
42.5°	3871.4	2844.2	1137.1	593.8	412.7	285.0	222.7	207.8	198.9	193.0	193.0
45°	4064.4	2936.2	1119.3	602.7	412.7	279.1	213.8	198.9	190.0	184.1	184.1
47.5°	4278.2	3049.1	1116.3	608.6	403.8	267.2	204.9	190.0	184.1	178.1	178.1
50°	4494.9	3173.7	1122.2	605.7	391.9	249.4	193.0	184.1	175.2	169.2	169.2
52.5°	4741.3	3304.4	1134.1	599.7	365.2	228.6	184.1	175.2	166.3	160.3	157.4
55°	5014.5	3446.9	1157.9	587.8	329.5	207.8	175.2	166.3	154.4	148.4	145.5
57.5°	5329.2	3622.0	1184.6	564.1	291.0	190.0	166.3	154.4	136.6	127.7	124.7
60°	5629.0	3821.0	1214.3	507.7	252.4	172.2	157.4	139.5	121.7	115.8	112.8
62.5°	5911.1	4016.9	1229.1	406.7	213.8	157.4	148.4	127.7	109.8	103.9	100.9
65°	6092.2	4230.7	1196.5	276.1	175.2	145.5	136.6	118.8	100.9	92.0	92.0
67.5°	6104.0	4331.6	1083.6	181.1	142.5	130.6	124.7	106.9	89.1	83.1	80.2
70°	5804.2	4180.2	828.3	142.5	118.8	112.8	112.8	95.0	77.2	71.3	68.3
72.5°	5115.4	3702.2	528.5	115.8	100.9	95.0	95.0	80.2	68.3	59.4	56.4
75°	4037.7	2856.1	282.0	95.0	83.1	80.2	74.2	65.3	56.4	50.5	47.5
77.5°	1855.6	1258.8	130.6	68.3	62.3	62.3	56.4	47.5	44.5	38.6	38.6
80°	733.3	427.5	65.3	44.5	41.6	41.6	41.6	32.7	32.7	26.7	23.8
82.5°	201.9	89.1	32.7	26.7	26.7	26.7	23.8	20.8	20.8	17.8	17.8
85°	20.8	14.8	14.8	14.8	14.8	11.9	11.9	8.9	5.9	5.9	5.9
87.5°	8.9	8.9	8.9	8.9	8.9	5.9	3.0	0.0	0.0	0.0	0.0
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)