

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: LUMARK

Report Number: P968943

Luminaire Tested: **NAV-SB5C-830-U-T2**

Issue Date: 1/21/2025

Test Information

Test Method: LM-79-08
Report Number: P968943
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2405-108-3)
Test Lab: INNOVATION CENTER
Issue Date: 1/21/2025
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: LUMARK
Catalog Number: NAV-SB5C-830-U-T2
Description: NAVION ROADWAY AND AREA HIGH DENSITY LED LUMINAIRE
(5) 80 CRI, 3000K, 615mA LIGHTSQUARES WITH 26 LEDS EACH AND TYPE II OPTICS
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 34524 lumens
Efficiency: N/A
Efficacy: 138.4 lumens/watt
Luminous Opening: Rectangular (W 1.5' x L: 1' x H: 0')
IES Classification: Type II - Medium
BUG Rating: B4 - U0 - G4

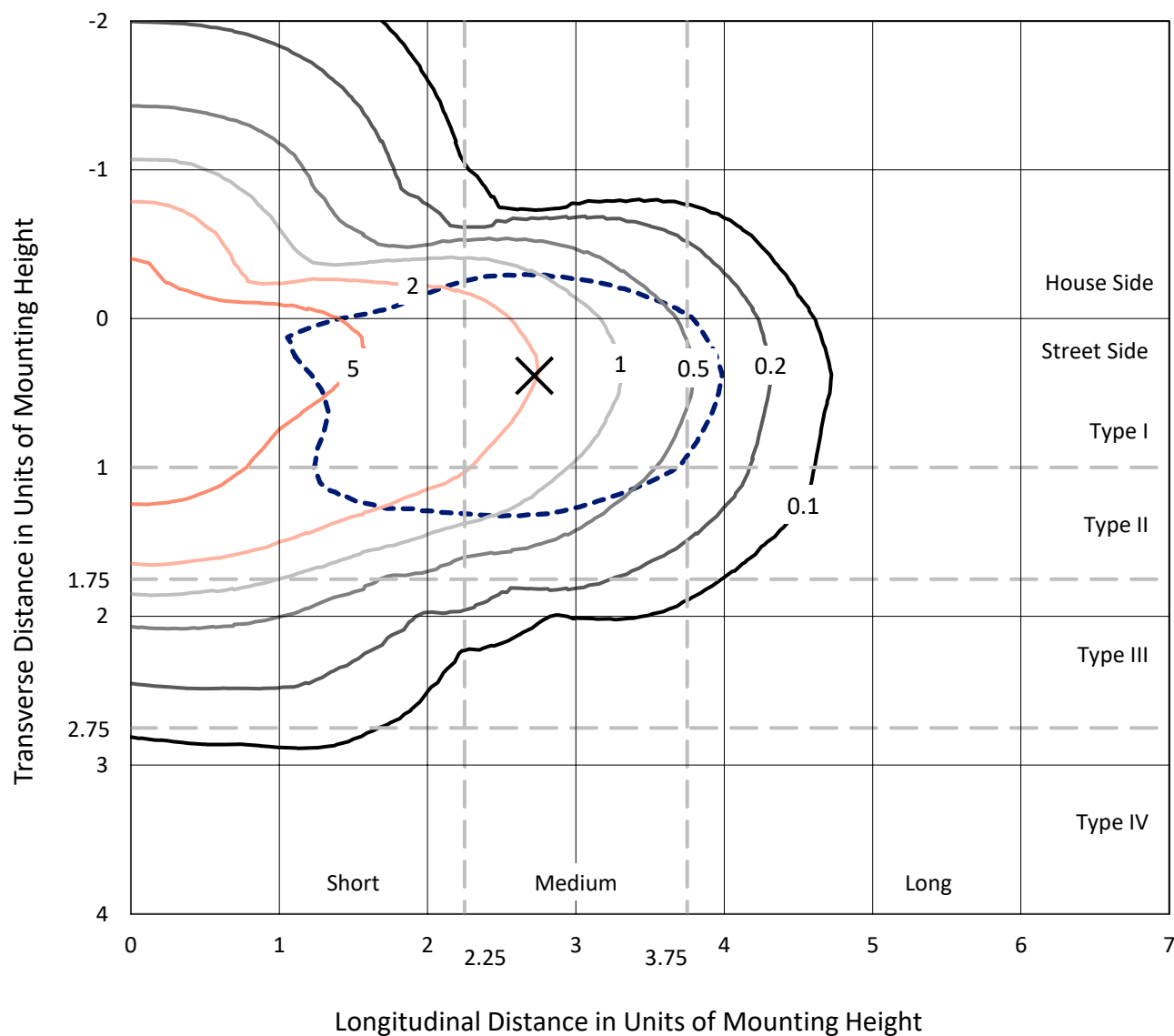
Input Watts (W): 249.5
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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Iso-Footcandle Lines of Horizontal Illumination

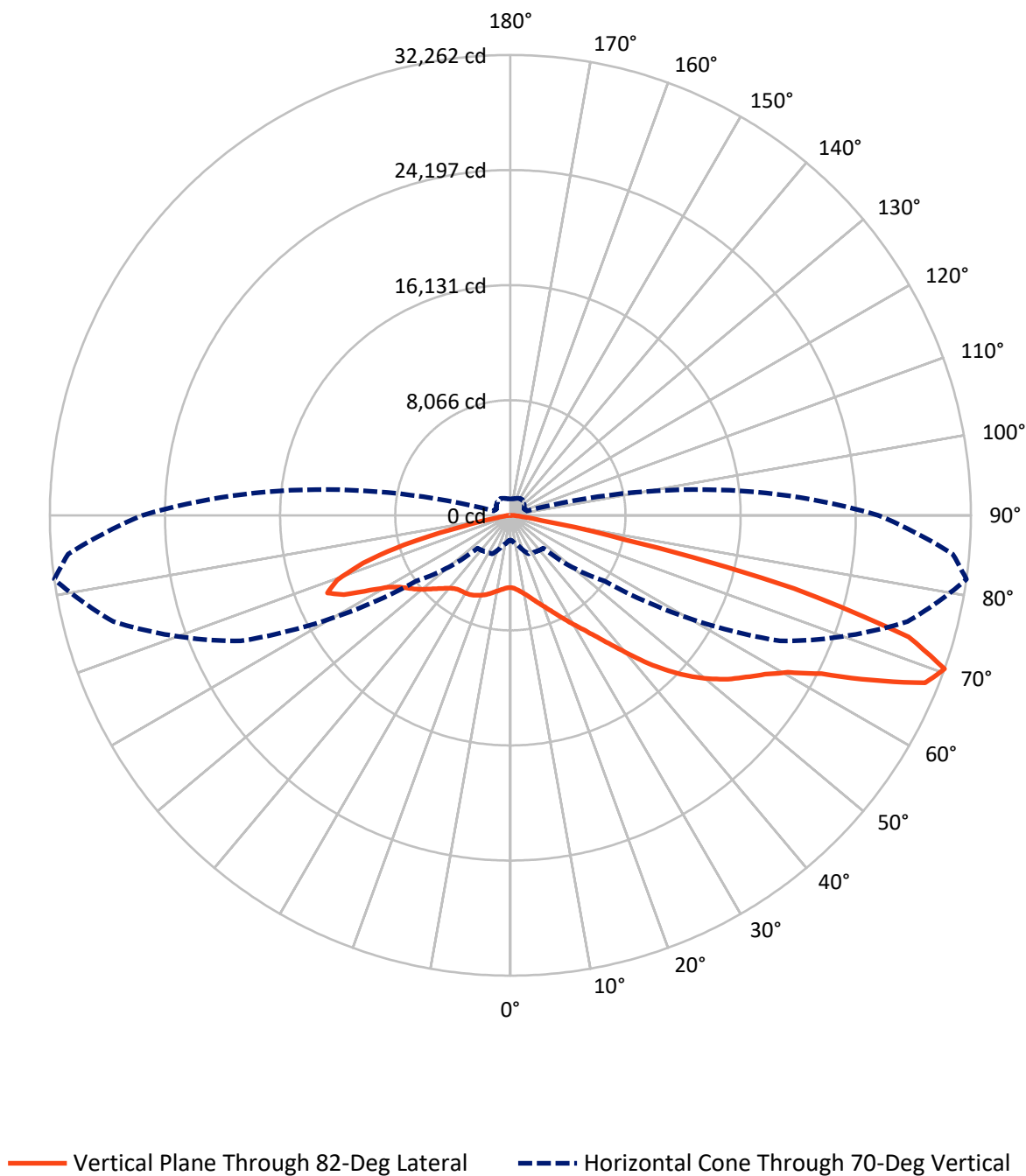
× Max cd
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 9.2 fc
 Type II - Medium - N/A

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Luminous Intensity Polar Plot



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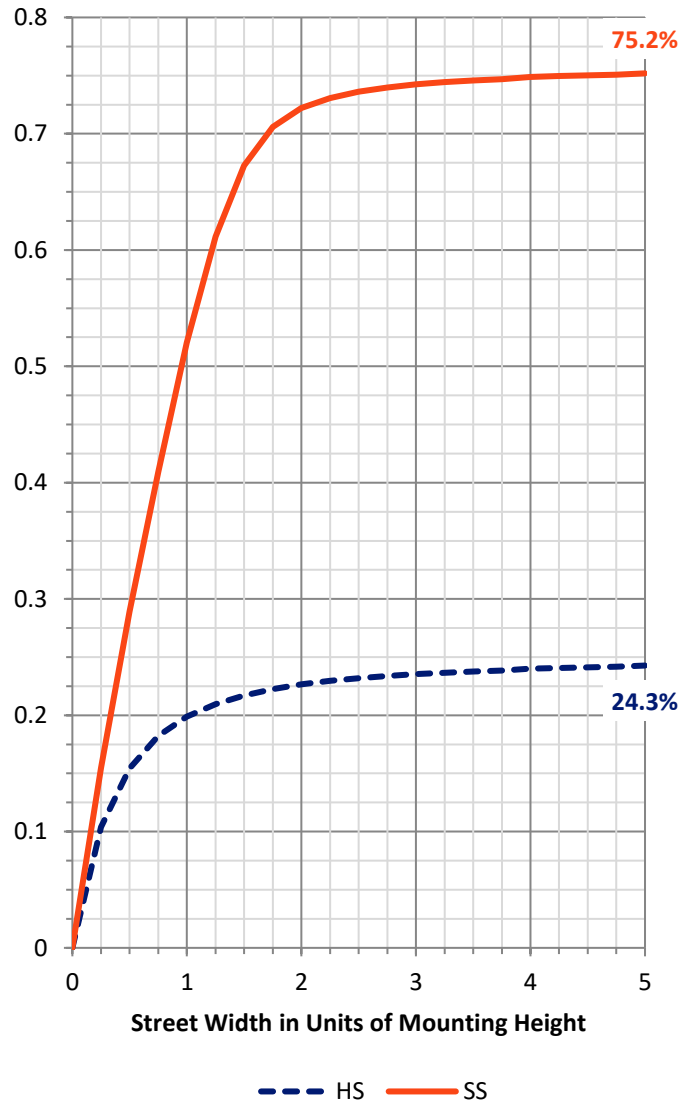
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	8511.0	0.0	8511.0
	% Fixture	24.7	0.0	24.7
Street Side	Lumens	26013.0	0.0	26013.0
	% Fixture	75.3	0.0	75.3
Total	Lumens	34524.0	0.0	34524.0
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	477.9	1.4
10°-20°	1373.1	4.0
20°-30°	2297.0	6.7
30°-40°	3588.5	10.4
40°-50°	5715.1	16.6
50°-60°	7953.3	23.0
60°-70°	8319.5	24.1
70°-80°	4348.2	12.6
80°-90°	451.5	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°	34524.0	100.0
0°-180°	34524.0	100.0

Coefficient of Utilization



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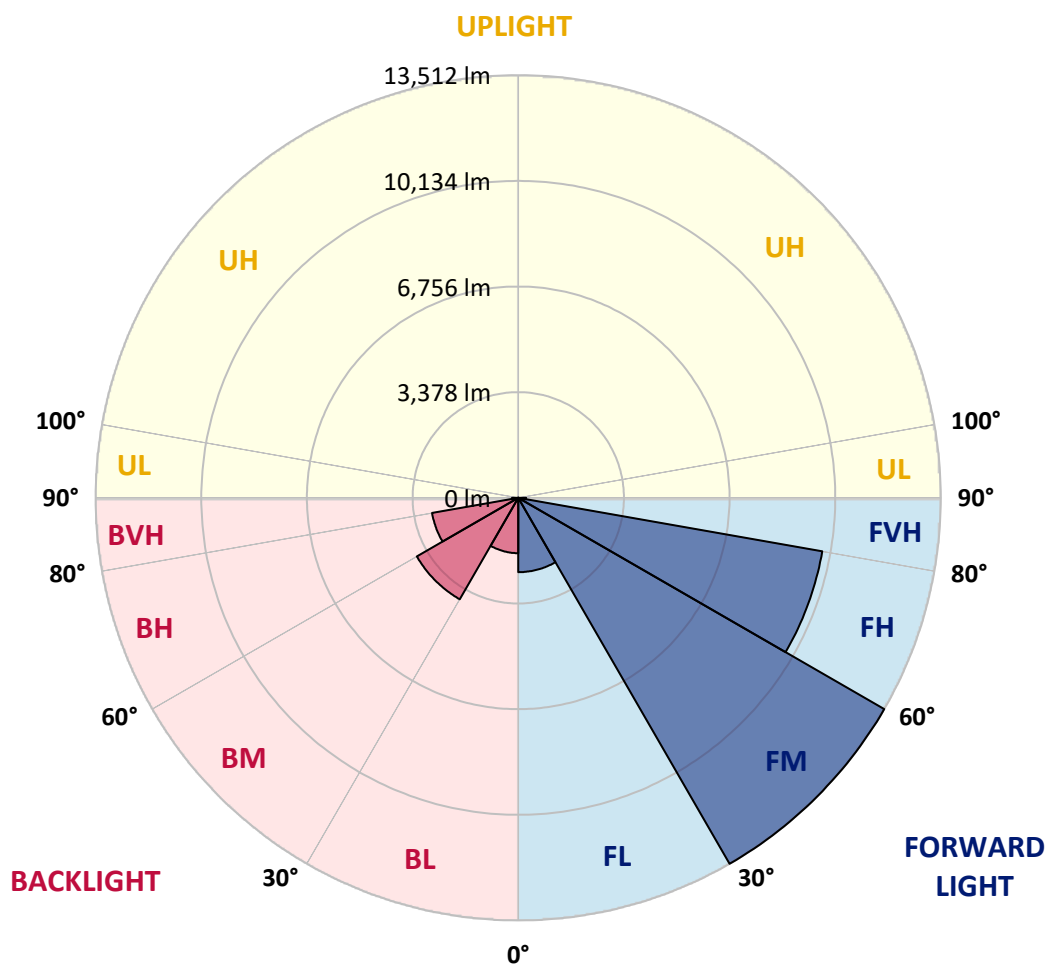
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	2377.4	6.9			
FM	(30°-60°)	13512.4	39.1			
FH	(60°-80°)	9870.5	28.6			G4/12000
FVH	(80°-90°)	252.8	0.7			G3/500
BL	(0°-30°)	1770.6	5.1	B3/2500		
BM	(30°-60°)	3744.5	10.8	B3/5000		
BH	(60°-80°)	2797.2	8.1	B4/5000		G4/5000
BVH	(80°-90°)	198.8	0.6			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 II Medium



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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	75°	82°	85°
0°	5061.7	5061.7	5061.7	5061.7	5061.7	5061.7	5061.7	5061.7	5061.7	5061.7	5061.7
2.5°	5182.6	5211.9	5202.7	5193.6	5193.6	5180.8	5178.9	5160.6	5145.9	5122.1	5116.6
5°	5248.5	5279.7	5276.0	5283.4	5307.1	5312.7	5318.1	5307.1	5277.8	5248.5	5235.7
7.5°	5189.9	5224.7	5235.7	5279.7	5353.0	5418.9	5468.4	5488.5	5461.0	5418.9	5398.8
10°	4992.1	5030.5	5069.0	5173.4	5303.5	5459.2	5591.1	5669.9	5664.4	5624.1	5589.2
12.5°	4590.9	4631.2	4713.6	4916.9	5155.1	5429.8	5675.3	5840.2	5897.0	5867.7	5807.2
15°	4270.3	4305.1	4367.3	4576.2	4885.8	5303.5	5706.5	6027.1	6171.8	6155.3	6082.0
17.5°	4261.1	4275.8	4314.2	4413.1	4651.3	5105.6	5673.5	6210.3	6486.9	6485.1	6393.4
20°	4422.3	4427.8	4449.8	4469.9	4605.5	4955.4	5589.2	6362.4	6840.4	6840.4	6741.5
22.5°	4645.8	4642.1	4664.2	4645.8	4711.7	4942.5	5536.1	6496.0	7234.3	7263.7	7139.1
25°	4981.1	4962.7	4957.2	4915.1	4927.9	5061.7	5594.8	6648.2	7701.4	7761.9	7606.2
27.5°	5428.1	5398.8	5378.6	5281.5	5248.5	5307.1	5774.2	6831.3	8221.7	8326.2	8128.4
30°	6010.6	5957.5	5928.2	5759.6	5640.6	5649.7	6045.4	7075.0	8765.8	8934.4	8683.4
32.5°	6805.7	6723.2	6644.5	6367.8	6149.8	6078.4	6395.3	7412.1	9355.7	9625.1	9302.6
35°	7696.0	7630.0	7545.7	7118.9	6783.7	6618.8	6867.9	7882.9	10046.3	10473.2	10053.7
37.5°	8553.3	8496.5	8536.8	7961.6	7529.2	7289.3	7487.1	8514.9	10898.2	11528.4	10995.3
40°	9440.0	9396.1	9401.5	8851.9	8348.1	8078.8	8238.2	9308.1	11874.6	12783.3	12127.5
42.5°	10403.6	10370.6	10260.7	9773.4	9207.4	8956.3	9102.9	10224.1	12922.5	14212.2	13369.5
45°	11482.7	11462.5	11359.9	10801.1	10152.6	9870.5	10068.4	11235.3	13975.9	15556.8	14617.1
47.5°	12415.1	12431.6	12418.7	11947.9	11275.6	10861.6	11097.9	12290.5	14956.0	16820.9	15813.3
50°	12863.9	12950.0	13076.4	12929.9	12512.2	12090.8	12136.6	13309.1	15890.3	18006.2	16960.2
52.5°	12629.4	12792.4	13136.8	13371.3	13532.6	13444.6	13321.9	14320.3	16769.6	19076.0	18044.6
55°	11755.6	11984.6	12556.1	13122.3	13944.7	14584.1	14745.3	15441.4	17626.9	20017.6	19070.5
57.5°	10163.6	10535.5	11048.5	12193.4	13578.4	15135.6	16405.0	16996.8	18535.6	21023.4	20144.0
60°	7434.0	7932.3	8569.8	10273.6	12296.0	14840.6	17817.5	19385.6	19827.1	22325.9	21541.8
62.5°	4757.5	5065.3	5651.5	7256.3	9581.1	13329.2	18249.8	22371.6	22016.3	24461.9	23637.5
65°	3257.2	3455.1	3991.8	4893.1	6193.8	9921.8	17092.0	24610.4	25493.3	27847.4	27220.8
67.5°	2366.8	2517.1	2975.1	3764.6	4035.7	5871.4	13263.3	24507.7	28873.2	31335.4	30360.8
70°	1725.7	1832.0	2216.7	2975.1	3105.1	3266.4	8034.9	20832.8	28799.9	32262.4	31095.4
72.5°	1278.7	1352.0	1610.3	2308.2	2513.4	2205.7	3977.1	15141.0	24747.7	29181.0	28244.9
75°	925.2	980.1	1170.7	1766.0	2011.5	1679.9	1984.0	8848.3	17262.4	20527.0	20691.8
77.5°	707.1	749.3	873.8	1293.3	1610.3	1260.3	1231.0	4070.6	8185.1	8225.4	8687.1
80°	568.0	595.4	663.2	910.5	1234.7	943.4	802.4	1643.3	2586.7	2189.2	2297.2
82.5°	417.7	463.5	560.6	639.4	883.0	650.4	489.1	829.8	983.8	846.3	853.7
85°	238.1	269.3	338.9	458.0	564.3	397.5	280.3	368.2	458.0	375.6	335.3
87.5°	84.3	109.9	119.1	179.6	245.5	164.9	108.0	106.3	150.3	111.7	93.5
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):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	5061.7	5061.7	5061.7	5061.7	5061.7	5061.7	5061.7	5061.7	5061.7	5061.7	5061.7
2.5°	5098.2	5089.1	5052.5	5003.0	4951.8	4902.3	4885.8	4851.0	4827.1	4814.3	4829.0
5°	5200.8	5171.5	5085.4	4975.6	4860.1	4735.6	4647.7	4567.0	4508.4	4453.4	4475.5
7.5°	5347.4	5296.2	5147.8	4955.4	4750.3	4543.2	4389.4	4272.1	4193.3	4142.0	4153.0
10°	5517.8	5439.1	5211.9	4924.3	4607.4	4310.5	4129.2	4028.5	3978.9	3951.5	3958.9
12.5°	5713.9	5602.0	5277.8	4852.9	4389.4	4050.4	3925.9	3896.5	3898.4	3900.2	3903.9
15°	5955.7	5800.0	5330.9	4697.1	4105.4	3850.7	3828.8	3876.3	3925.9	3949.6	3947.8
17.5°	6228.6	6008.8	5340.1	4440.6	3826.9	3722.5	3792.1	3894.7	3969.8	4002.8	4010.1
20°	6521.7	6221.2	5274.1	4077.9	3598.0	3618.0	3742.7	3874.6	3957.0	3999.1	4010.1
22.5°	6856.9	6448.5	5116.6	3696.9	3411.1	3504.5	3651.0	3779.3	3865.4	3907.5	3918.6
25°	7239.9	6703.1	4869.3	3376.2	3249.9	3376.2	3522.8	3629.1	3698.7	3737.2	3748.1
27.5°	7664.8	6968.7	4539.5	3121.6	3108.8	3244.3	3365.3	3447.7	3484.4	3513.7	3524.7
30°	8091.7	7210.6	4140.2	2929.2	2986.0	3114.3	3200.4	3237.1	3248.0	3253.6	3266.4
32.5°	8553.3	7419.4	3720.6	2769.9	2868.9	2987.9	3039.2	3055.7	3004.4	2969.6	2980.6
35°	9112.0	7642.9	3310.3	2643.5	2753.5	2856.0	2872.5	2857.8	2797.3	2725.9	2729.6
37.5°	9802.7	7921.3	2982.4	2553.7	2645.3	2713.1	2693.0	2689.3	2694.8	2610.5	2616.0
40°	10649.0	8284.0	2742.4	2484.1	2557.4	2572.0	2515.2	2546.4	2573.9	2445.6	2449.3
42.5°	11588.9	8721.9	2590.4	2436.5	2484.1	2449.3	2361.4	2396.1	2392.6	2223.9	2222.1
45°	12547.0	9198.1	2537.3	2401.7	2416.3	2346.7	2249.7	2258.8	2181.8	2029.8	2035.2
47.5°	13499.6	9709.3	2570.2	2372.4	2332.1	2253.3	2178.2	2137.8	2024.3	1910.7	1910.7
50°	14433.8	10246.1	2691.1	2313.7	2216.7	2170.8	2115.9	2044.5	1923.5	1826.4	1819.2
52.5°	15300.4	10786.5	2826.6	2216.7	2071.9	2099.4	2064.6	1982.1	1863.0	1764.1	1766.0
55°	16121.1	11326.9	2879.8	2082.9	1936.3	2037.1	2017.0	1864.9	1722.0	1641.4	1634.1
57.5°	17015.1	11977.2	2821.2	1912.5	1826.4	1965.6	1888.8	1720.2	1637.7	1577.3	1571.8
60°	18253.5	12997.6	2694.8	1701.9	1722.0	1859.5	1727.5	1657.9	1568.1	1500.4	1496.7
62.5°	20310.8	14901.0	2491.5	1493.0	1599.3	1701.9	1650.6	1581.0	1489.3	1423.4	1423.4
65°	23351.8	17546.4	2108.5	1330.0	1461.9	1548.0	1568.1	1498.6	1403.2	1333.6	1337.3
67.5°	25916.5	19206.0	1595.6	1194.4	1320.8	1423.4	1480.2	1412.4	1311.7	1243.9	1245.7
70°	25775.5	18000.6	1218.2	1060.7	1196.3	1300.7	1373.9	1320.8	1212.8	1148.6	1154.1
72.5°	22893.8	15058.6	985.5	925.2	1069.9	1172.4	1260.3	1220.1	1110.2	1047.9	1047.9
75°	16819.0	10689.4	787.7	787.7	912.4	1038.7	1135.8	1110.2	1009.4	965.4	952.6
77.5°	7089.6	4484.6	617.4	654.1	758.4	892.2	1013.1	1022.2	934.3	989.2	897.7
80°	1885.1	1236.6	470.8	514.8	595.4	736.5	881.2	877.5	782.3	730.9	679.7
82.5°	718.1	487.3	335.3	362.7	430.5	564.3	697.9	720.0	624.7	540.4	540.4
85°	276.6	208.8	207.0	218.0	251.0	373.7	527.6	545.9	470.8	399.3	412.2
87.5°	71.4	62.3	77.0	73.3	115.4	199.7	302.3	313.2	287.6	166.7	238.1
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)