

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: P212884

Luminaire Tested: **NFFLD-C25-D-UNV-33-7050**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P212884  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-16-1196-4)  
Test Lab: INNOVATION CENTER-P2  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: LUMARK  
Catalog Number: NFFLD-C25-D-UNV-33-7050  
Description: NIGHT FALCON LED FLOOD LIGHT  
Light Source: (8) 5000K CCT, 72 CRI LEDS  
CLU028-1204C4-40ALK3  
Ballast/Driver: OSRAM  
OT100/UNV/800C/2DIMLT2

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 10234.7 lumens  
Efficiency: N/A  
Efficacy: 109.8 lumens/watt  
Luminous Opening: Rectangular (W 0.67' x L: 1.33' x H: 0')  
IES Classification: Type V - Short - Full Cutoff  
BUG Rating: B4 - U0 - G1

Input Watts (W): 93.2  
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: 25 FT

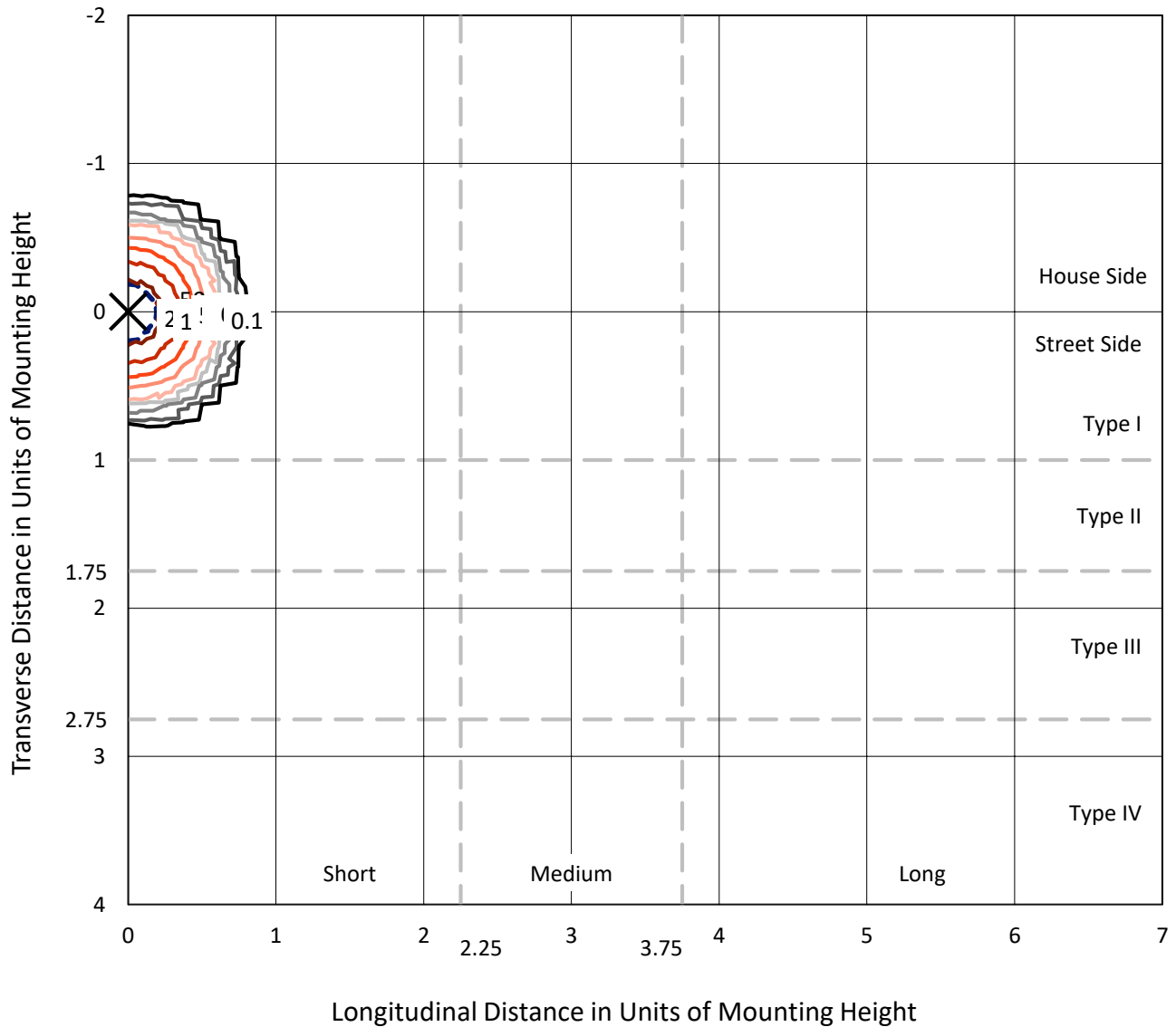


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### Iso-Footcandle Lines of Horizontal Illumination

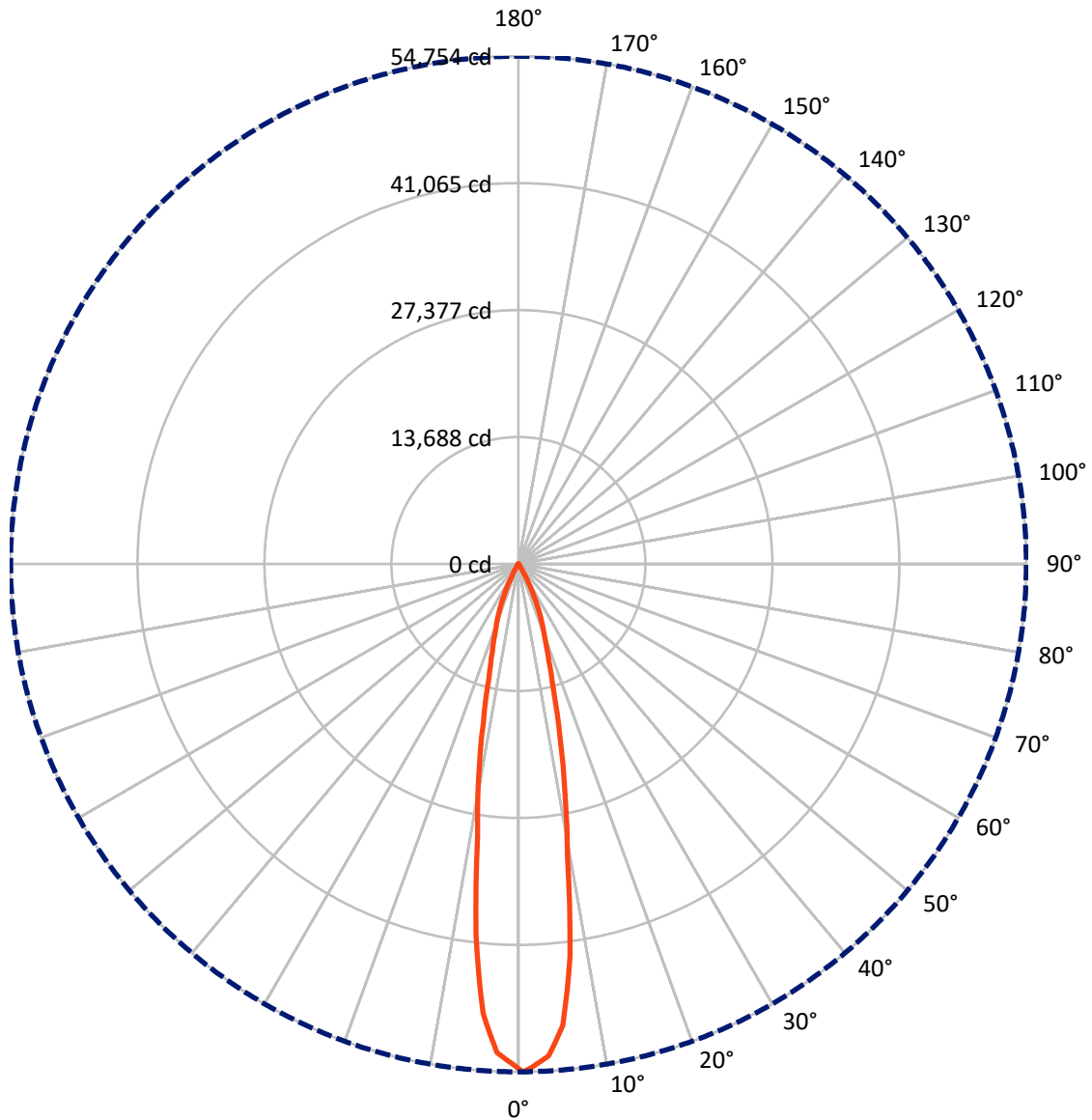
× Max cd  
 - - - 1/2 Max cd



Based on 20 foot mounting height. Maximum calculated value = 136.9 fc  
 Type V - Short - Full Cutoff

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### Luminous Intensity Polar Plot



— Vertical Plane Through 0-Deg Lateral      - - - Horizontal Cone Through 0-Deg Vertical

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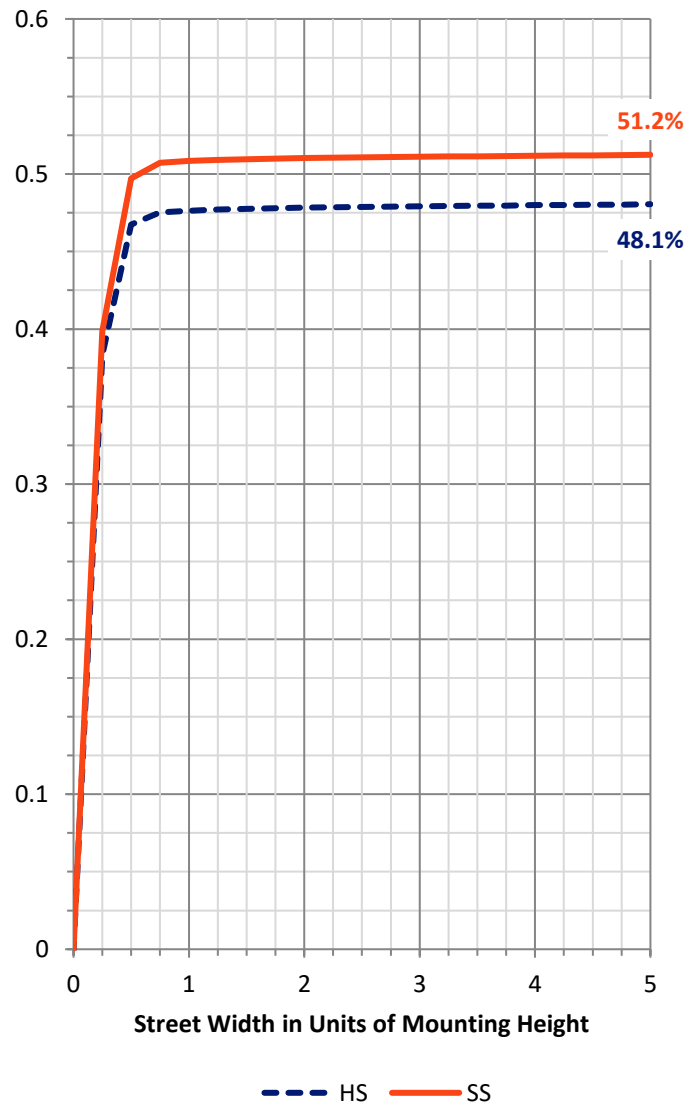
**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	5000.6	0.0	5000.6
	% Fixture	48.9	0.0	48.9
<b>Street Side</b>	Lumens	5234.1	0.0	5234.1
	% Fixture	51.1	0.0	51.1
<b>Total</b>	Lumens	10234.7	0.0	10234.7
	% Fixture	100.0	0.0	100.0

**Coefficient of Utilization**

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	3908.0	38.2
10°-20°	4044.4	39.5
20°-30°	1912.7	18.7
30°-40°	354.7	3.5
40°-50°	41.0	0.4
50°-60°	24.3	0.2
60°-70°	20.7	0.2
70°-80°	38.2	0.4
80°-90°	27.0	0.3
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°	10234.7	100.0
0°-180°	10234.7	100.0



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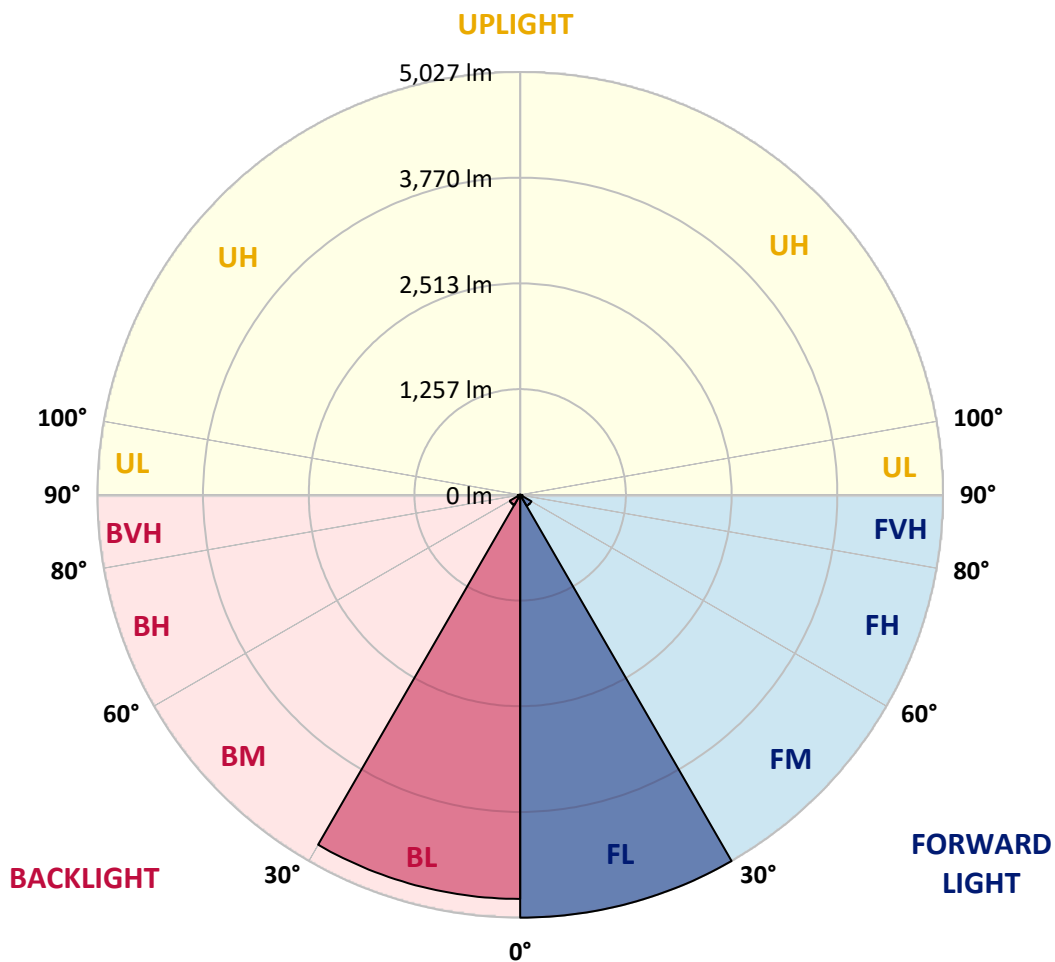
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**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	5026.5	49.1			
FM	(30°-60°)	154.6	1.5			
FH	(60°-80°)	26.1	0.3			G0/660
FVH	(80°-90°)	26.2	0.3			G1/100
BL	(0°-30°)	4804.1	46.9	B4/5000		
BM	(30°-60°)	141.9	1.4	B0/220		
BH	(60°-80°)	26.9	0.3	B0/110		G0/660
BVH	(80°-90°)	26.9	0.3			G1/100
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

**BUG Rating: B4-U0-G1**

Type V Short





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**CANDELA DISTRIBUTION (FULL):**

	0°	10°	20°	30°	40°	50°	60°	70°	80°	90°	100°
0°	54753.5	54753.5	54753.5	54753.5	54753.5	54753.5	54753.5	54753.5	54753.5	54753.5	54753.5
1°	54290.8	54291.3	54306.5	54336.4	54380.4	54437.4	54505.7	54583.1	54666.7	54753.5	54621.2
3°	53127.1	53066.8	53053.5	52810.4	52659.2	52605.2	52650.1	52792.0	52765.6	52789.5	52675.4
5°	49960.7	49926.8	49441.2	49219.8	49150.5	48991.4	48796.6	48770.4	49060.3	49083.8	48908.6
7°	42648.7	42576.3	42101.0	41854.8	41843.9	41748.7	41415.4	41296.1	41428.9	41382.7	40951.8
9°	31975.8	32094.7	32484.9	32343.4	32192.1	32299.4	32293.3	32150.4	31590.1	31488.0	31212.5
11°	25242.5	25138.3	25182.9	25021.4	25267.2	25142.6	24965.4	24976.2	24813.0	24720.3	24491.9
13°	19291.6	19235.0	19303.8	19354.8	19306.3	19242.3	19211.3	19111.7	18893.8	18817.4	18544.9
15°	14144.7	14253.7	14324.4	14221.4	14280.2	14232.6	14026.3	14073.7	13780.2	13584.7	13510.8
17°	10844.6	10913.7	10913.9	10871.9	10850.7	10747.5	10721.1	10644.2	10523.3	10358.9	10363.6
19.5°	8141.6	8172.3	8247.6	8239.7	8243.3	8199.2	8117.7	8098.1	7976.4	8060.1	7867.0
22.5°	5927.2	5918.6	5924.3	6012.9	6028.8	6016.3	5976.6	5920.7	5887.3	6083.2	5804.4
25.5°	3730.0	3758.7	3859.1	4000.5	4057.9	4060.2	4035.0	4010.1	3964.5	3926.7	3889.9
29°	1522.0	1598.9	1782.3	1838.5	1935.6	1928.3	1953.3	1978.4	1843.5	1744.5	1774.2
33°	228.2	294.6	462.5	376.6	468.1	460.8	503.2	535.3	407.7	298.3	391.8
37.5°	55.1	74.8	95.9	86.8	87.9	86.1	94.1	84.8	82.8	68.7	82.2
42.5°	52.2	64.5	67.8	70.1	68.2	59.4	57.3	52.5	56.8	60.8	52.8
47.5°	23.6	45.7	47.8	54.6	49.0	45.6	40.2	38.4	42.2	46.5	35.7
55°	2.9	31.4	29.4	28.0	19.6	14.5	10.5	11.2	9.7	8.6	12.6
65°	2.9	31.5	35.3	20.8	16.0	16.2	14.6	13.1	16.3	15.7	15.3
75°	0.0	29.1	24.5	24.2	16.3	22.3	30.8	28.7	39.7	30.8	40.5
85°	2.9	17.0	33.9	77.3	81.1	90.2	90.7	98.3	100.8	108.0	95.5
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):**

	110°	120°	130°	140°	150°	160°	170°	180°	190°	200°	210°
0°	54753.5	54753.5	54753.5	54753.5	54753.5	54753.5	54753.5	54753.5	54753.5	54753.5	54753.5
1°	54493.4	54374.4	54268.3	54178.3	54107.2	54057.0	54028.9	54023.3	54028.9	54057.0	54107.2
3°	52604.4	52315.6	52162.9	52156.7	52297.1	52573.8	52625.2	52737.2	52625.2	52573.8	52297.1
5°	48386.0	48167.1	48097.6	47922.9	47796.9	47953.4	48450.7	48584.5	48450.7	47953.4	47796.9
7°	40440.7	40320.5	40478.0	40242.7	39579.1	39384.5	39912.2	40268.4	39912.2	39384.5	39579.1
9°	31352.8	31091.1	30740.2	30554.9	30520.0	30044.9	29667.6	29717.8	29667.6	30044.9	30520.0
11°	24328.0	24071.9	23912.8	23724.6	23663.5	23345.2	23341.5	23603.8	23341.5	23345.2	23663.5
13°	18436.6	18256.6	18055.5	17863.2	17732.4	17601.2	17315.4	17487.8	17315.4	17601.2	17732.4
15°	13542.5	13285.3	13270.8	13148.3	12893.9	13042.6	12795.8	12680.6	12795.8	13042.6	12893.9
17°	10334.3	10247.5	10132.1	10116.0	10058.3	10052.3	10000.6	9907.6	10000.6	10052.3	10058.3
19.5°	7908.8	7846.3	7790.1	7712.9	7670.5	7686.3	7633.9	7571.6	7633.9	7686.3	7670.5
22.5°	5768.3	5760.9	5773.2	5694.8	5663.6	5603.4	5590.4	5551.7	5590.4	5603.4	5663.6
25.5°	3868.2	3815.5	3783.5	3757.6	3660.6	3640.3	3524.5	3471.1	3524.5	3640.3	3660.6
29°	1862.6	1766.6	1702.2	1702.6	1611.0	1632.5	1467.8	1374.7	1467.8	1632.5	1611.0
33°	488.2	430.8	381.5	385.5	303.3	395.2	251.1	168.8	251.1	395.2	303.3
37.5°	85.4	79.1	77.1	79.3	80.4	93.3	79.5	75.8	79.5	93.3	80.4
42.5°	51.6	48.5	57.9	70.3	71.9	70.7	63.4	52.2	63.4	70.7	71.9
47.5°	36.5	31.2	42.4	51.3	59.7	51.2	44.2	29.3	44.2	51.2	59.7
55°	5.5	10.1	16.7	26.9	26.9	33.7	30.1	8.6	30.1	33.7	26.9
65°	9.9	12.3	22.0	18.5	24.5	30.7	31.4	2.9	31.4	30.7	24.5
75°	26.0	29.7	30.3	18.7	29.7	21.8	30.8	0.0	30.8	21.8	29.7
85°	98.4	92.0	92.3	86.2	72.4	40.1	30.4	0.0	30.4	40.1	72.4
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):**

	220°	230°	240°	250°	260°	270°	280°	290°	300°	310°	320°
0°	54753.5	54753.5	54753.5	54753.5	54753.5	54753.5	54753.5	54753.5	54753.5	54753.5	54753.5
1°	54178.3	54268.3	54374.4	54493.4	54621.2	54753.5	54666.7	54583.1	54505.7	54437.4	54380.4
3°	52156.7	52162.9	52315.6	52604.4	52675.4	52789.5	52765.6	52792.0	52650.1	52605.2	52659.2
5°	47922.9	48097.6	48167.1	48386.0	48908.6	49083.8	49060.3	48770.4	48796.6	48991.4	49150.5
7°	40242.7	40478.0	40320.5	40440.7	40951.8	41382.7	41428.9	41296.1	41415.4	41748.7	41843.9
9°	30554.9	30740.2	31091.1	31352.8	31212.5	31488.0	31590.1	32150.4	32293.3	32299.4	32192.1
11°	23724.6	23912.8	24071.9	24328.0	24491.9	24720.3	24813.0	24976.2	24965.4	25142.6	25267.2
13°	17863.2	18055.5	18256.6	18436.6	18544.9	18817.4	18893.8	19111.7	19211.3	19242.3	19306.3
15°	13148.3	13270.8	13285.3	13542.5	13510.8	13584.7	13780.2	14073.7	14026.3	14232.6	14280.2
17°	10116.0	10132.1	10247.5	10334.3	10363.6	10358.9	10523.3	10644.2	10721.1	10747.5	10850.7
19.5°	7712.9	7790.1	7846.3	7908.8	7867.0	8060.1	7976.4	8098.1	8117.7	8199.2	8243.3
22.5°	5694.8	5773.2	5760.9	5768.3	5804.4	6083.2	5887.3	5920.7	5976.6	6016.3	6028.8
25.5°	3757.6	3783.5	3815.5	3868.2	3889.9	3926.7	3964.5	4010.1	4035.0	4060.2	4057.9
29°	1702.6	1702.2	1766.6	1862.6	1774.2	1744.5	1843.5	1978.4	1953.3	1928.3	1935.6
33°	385.5	381.5	430.8	488.2	391.8	298.3	407.7	535.3	503.2	460.8	468.1
37.5°	79.3	77.1	79.1	85.4	82.2	68.7	82.8	84.8	94.1	86.1	87.9
42.5°	70.3	57.9	48.5	51.6	52.8	60.8	56.8	52.5	57.3	59.4	68.2
47.5°	51.3	42.4	31.2	36.5	35.7	46.5	42.2	38.4	40.2	45.6	49.0
55°	26.9	16.7	10.1	5.5	12.6	8.6	9.7	11.2	10.5	14.5	19.6
65°	18.5	22.0	12.3	9.9	15.3	15.7	16.3	13.1	14.6	16.2	16.0
75°	18.7	30.3	29.7	26.0	40.5	30.8	39.7	28.7	30.8	22.3	16.3
85°	86.2	92.3	92.0	98.4	95.5	108.0	100.8	98.3	90.7	90.2	81.1
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):**

	330°	340°	350°	360°
0°	54753.5	54753.5	54753.5	54753.5
1°	54336.4	54306.5	54291.3	54290.8
3°	52810.4	53053.5	53066.8	53127.1
5°	49219.8	49441.2	49926.8	49960.7
7°	41854.8	42101.0	42576.3	42648.7
9°	32343.4	32484.9	32094.7	31975.8
11°	25021.4	25182.9	25138.3	25242.5
13°	19354.8	19303.8	19235.0	19291.6
15°	14221.4	14324.4	14253.7	14144.7
17°	10871.9	10913.9	10913.7	10844.6
19.5°	8239.7	8247.6	8172.3	8141.6
22.5°	6012.9	5924.3	5918.6	5927.2
25.5°	4000.5	3859.1	3758.7	3730.0
29°	1838.5	1782.3	1598.9	1522.0
33°	376.6	462.5	294.6	228.2
37.5°	86.8	95.9	74.8	55.1
42.5°	70.1	67.8	64.5	52.2
47.5°	54.6	47.8	45.7	23.6
55°	28.0	29.4	31.4	2.9
65°	20.8	35.3	31.5	2.9
75°	24.2	24.5	29.1	0.0
85°	77.3	33.9	17.0	2.9
90°	0.0	0.0	0.0	0.0

(END OF REPORT)