

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: McGRAW-EDISON

Report Number: P579390

Luminaire Tested: **CTN-CA10-630-722-U-T5-HSS-HM-EX90**

Issue Date: 11/18/2021

**Test Information**

Test Method: LM-79-08  
Report Number: P579390  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2110-429-1)  
Test Lab: COOPER LIGHTING SOLUTIONS  
Issue Date: 11/18/2021  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: McGRAW-EDISON  
Catalog Number: CTN-CA10-630-722-U-T5-HSS-HM-EX90  
Description: CELESTEON HIGH MAST LUMINAIRE WITH FIELD INSTALLED SHIELD  
Light Source: (10) 2200K CCT, 70 CRI LEDS  
Ballast/Driver: -

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 60710 lumens  
Efficiency: N/A  
Efficacy: 96.2 lumens/watt  
Luminous Opening: Circular (Dia: 2.08' x H: 0')  
IES Classification: Type IV - Short  
BUG Rating: B5 - U2 - G5

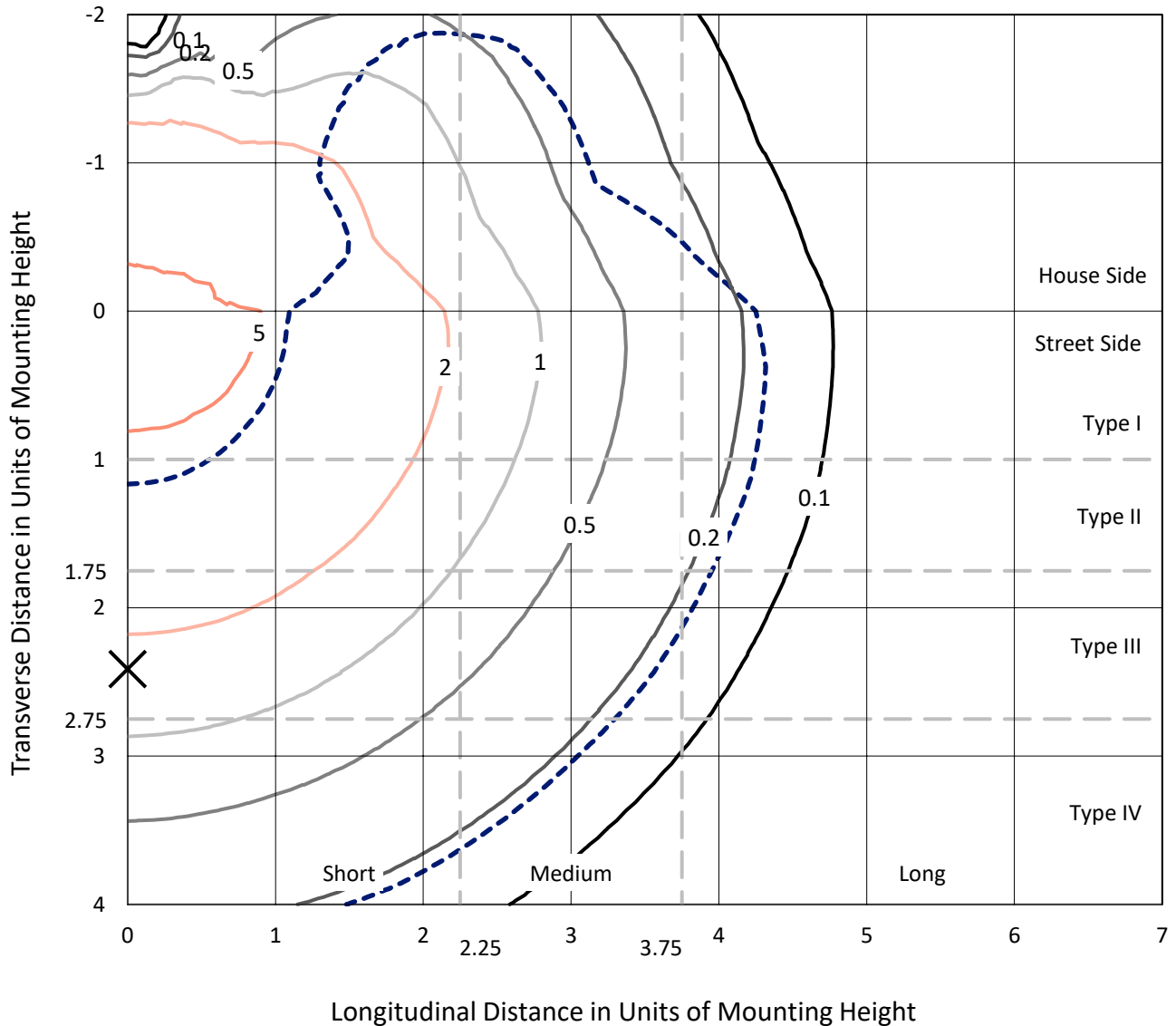
Input Watts (W): 631.4  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 24 FT



REPORT NUMBER: P579390  
 CATALOG NUMBER: CTN-CA10-630-722-U-T5-HSS-HM-EX90

### Iso-Footcandle Lines of Horizontal Illumination

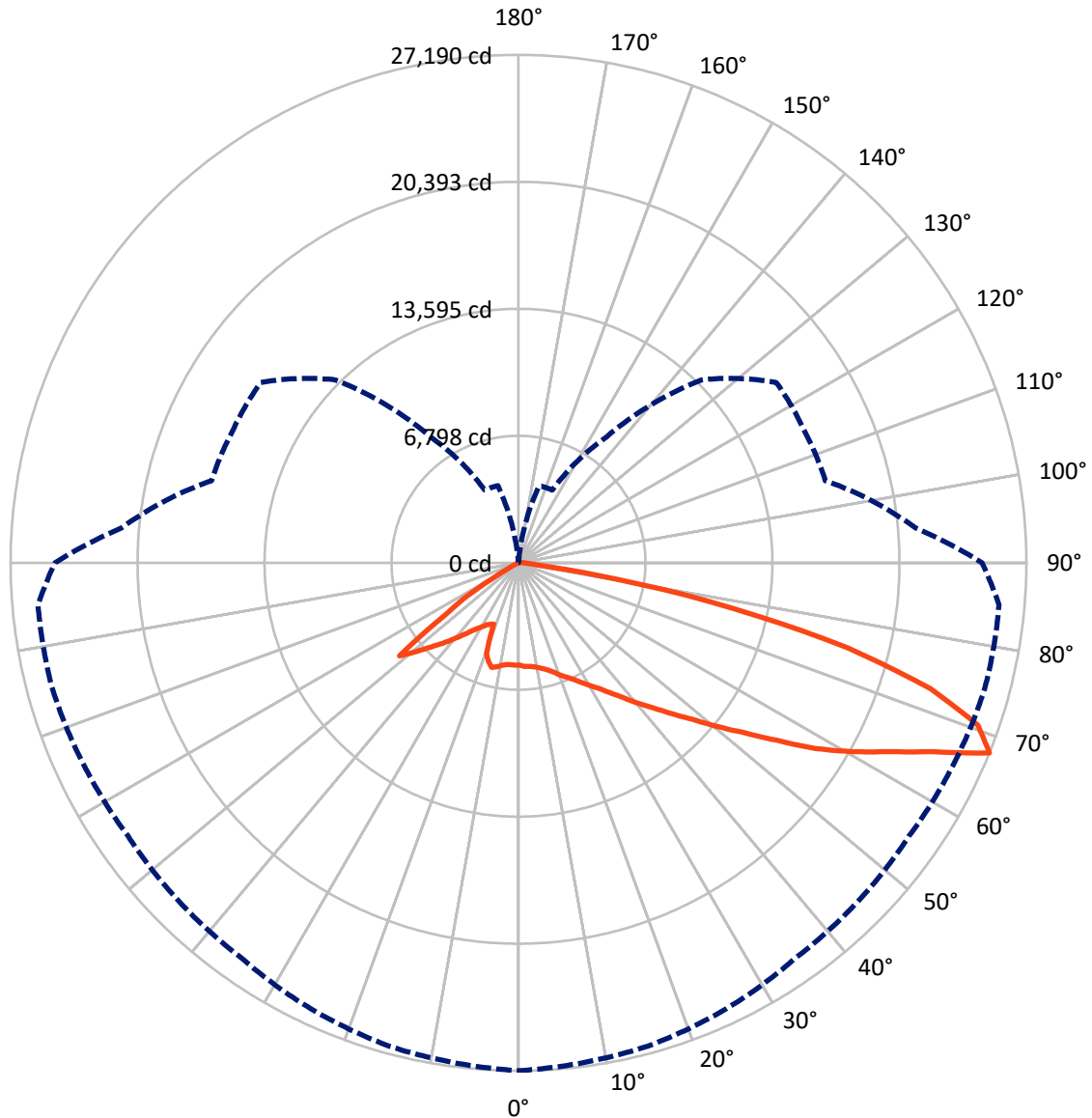
× Max cd  
 - - - 1/2 Max cd



Based on 30 foot mounting height. Maximum calculated value = 6.1 fc  
 Type IV - Short - N/A

REPORT NUMBER: P579390  
CATALOG NUMBER: CTN-CA10-630-722-U-T5-HSS-HM-EX90

### Luminous Intensity Polar Plot



— Vertical Plane Through 0-Deg Lateral      - - - Horizontal Cone Through 67.5-Deg Vertical

REPORT NUMBER: P579390  
 CATALOG NUMBER: CTN-CA10-630-722-U-T5-HSS-HM-EX90

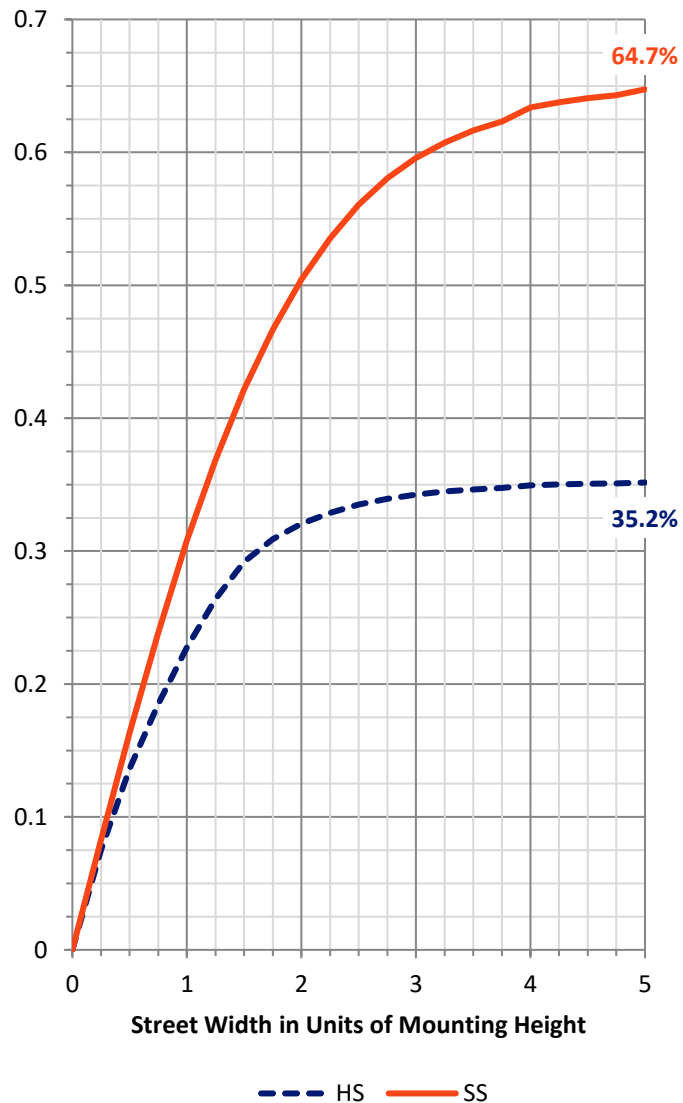
**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	21369.8	1.3	21371.1
	% Fixture	35.2	0.0	35.2
<b>Street Side</b>	Lumens	39296.1	42.8	39338.9
	% Fixture	64.7	0.1	64.8
<b>Total</b>	Lumens	60665.9	44.1	60710.0
	% Fixture	99.9	0.1	100.0

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	526.3	0.9
10°-20°	1635.0	2.7
20°-30°	2834.8	4.7
30°-40°	4651.5	7.7
40°-50°	7758.7	12.8
50°-60°	12556.5	20.7
60°-70°	17332.0	28.5
70°-80°	12504.3	20.6
80°-90°	866.7	1.4
90°-100°	37.6	0.1
100°-110°	6.3	0.0
110°-120°	0.2	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°	60665.9	99.9
0°-180°	60710.0	100.0

**Coefficient of Utilization**

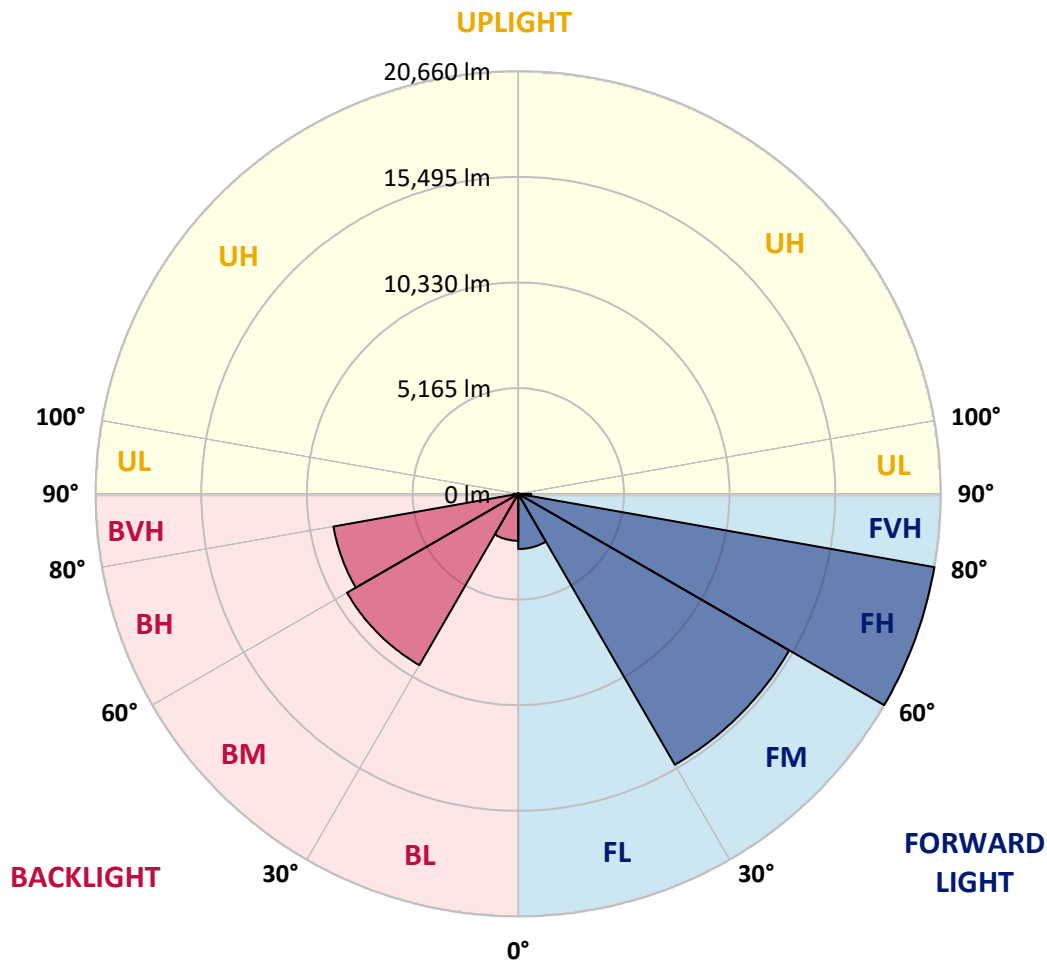


REPORT NUMBER: P579390  
 CATALOG NUMBER: CTN-CA10-630-722-U-T5-HSS-HM-EX90

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

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	2699.7	4.4			
FM (30°-60°)	15297.4	25.2			
FH (60°-80°)	20660.4	34.0			G5
FVH (80°-90°)	638.6	1.1			G4/750
BL (0°-30°)	2296.5	3.8	B3/2500		
BM (30°-60°)	9669.3	15.9	B5		
BH (60°-80°)	9175.9	15.1	B5		G5
BVH (80°-90°)	228.1	0.4			G3/500
UL (90°-100°)	37.6	0.1		U2/50	
UH (100°-180°)	6.5	0.0		U1/10	

**BUG Rating: B5-U2-G5**  
 Type IV Short





REPORT NUMBER: P579390

CATALOG NUMBER: CTN-CA10-630-722-U-T5-HSS-HM-EX90

**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	45°	55°	65°	75°	85°	90°
0°	5471.0	5471.0	5471.0	5471.0	5471.0	5471.0	5471.0	5471.0	5471.0	5471.0	5471.0
2.5°	5554.7	5522.2	5524.5	5557.0	5468.7	5501.2	5464.1	5496.6	5480.3	5492.0	5505.9
5°	5571.0	5531.5	5536.1	5575.6	5505.9	5531.5	5487.3	5505.9	5492.0	5505.9	5508.2
7.5°	5612.8	5573.3	5575.6	5605.8	5533.8	5552.4	5510.5	5519.8	5496.6	5522.2	5515.2
10°	5701.1	5663.9	5650.0	5675.6	5612.8	5615.1	5566.3	5575.6	5540.8	5575.6	5561.7
12.5°	5819.7	5768.5	5773.2	5787.1	5710.4	5715.1	5657.0	5670.9	5612.8	5661.6	5645.3
15°	5963.8	5901.0	5908.0	5931.2	5856.8	5849.9	5796.4	5796.4	5745.3	5782.5	5766.2
17.5°	6163.6	6093.9	6089.3	6105.5	6045.1	6045.1	5984.7	5977.7	5926.6	5956.8	5952.1
20°	6423.9	6344.9	6331.0	6361.2	6284.5	6293.8	6217.1	6210.1	6154.3	6172.9	6175.2
22.5°	6658.7	6595.9	6593.6	6640.1	6549.4	6561.1	6491.3	6472.7	6426.3	6451.8	6458.8
25°	6928.3	6919.0	6912.0	6928.3	6837.6	6837.6	6788.8	6772.6	6742.3	6760.9	6779.5
27.5°	7267.6	7262.9	7244.4	7246.7	7170.0	7181.6	7128.1	7118.9	7104.9	7102.6	7093.3
30°	7641.8	7620.9	7595.3	7611.6	7576.7	7588.3	7541.8	7511.6	7507.0	7509.3	7495.4
32.5°	8057.8	8029.9	8013.6	8041.5	8055.5	8088.0	8085.7	8002.0	8002.0	8036.9	7974.1
35°	8573.8	8529.6	8543.5	8580.7	8608.6	8692.3	8678.4	8620.2	8638.8	8655.1	8580.7
37.5°	9180.4	9150.2	9212.9	9282.6	9285.0	9403.5	9375.6	9389.5	9387.2	9366.3	9317.5
40°	9907.8	9859.0	9924.1	9977.5	9945.0	10086.8	10082.1	10144.9	10186.7	10258.8	10230.9
42.5°	10630.6	10593.4	10656.2	10772.4	10753.8	10916.5	10939.7	11037.4	11095.5	11207.0	11141.9
45°	11520.8	11499.9	11558.0	11648.6	11711.4	11927.5	12013.5	12055.3	12201.8	12336.6	12185.5
47.5°	12517.8	12545.7	12536.4	12701.4	12840.9	13103.5	13138.4	13273.2	13401.0	13549.8	13403.3
50°	13758.9	13712.4	13754.3	13912.3	14140.1	14330.7	14509.6	14702.5	14828.0	14981.4	14711.8
52.5°	15095.3	15134.8	15227.8	15471.8	15639.2	15864.6	16027.3	16257.4	16380.6	16513.0	16162.1
55°	16780.3	16812.9	16915.1	17166.1	17284.7	17540.3	17651.9	17882.0	18000.5	18058.6	17610.0
57.5°	18755.8	18646.6	18730.3	18860.4	19044.0	19320.6	19350.8	19567.0	19567.0	19641.3	19069.6
60°	20519.9	20445.5	20533.8	20719.7	20791.8	21042.8	21017.2	21193.9	21240.3	21184.6	20501.3
62.5°	22258.3	22272.3	22386.1	22446.6	22418.7	22567.4	22627.9	22813.8	22737.1	22755.7	21967.8
65°	24368.6	24401.2	24389.6	24278.0	24027.0	24319.8	24303.6	24598.7	24617.3	24784.7	23868.9
67.5°	27190.1	27046.1	26783.4	26334.9	25837.5	25665.5	25514.4	25660.9	25849.1	25818.9	24814.9
70°	26093.2	25858.4	25721.3	25330.8	24666.1	24322.2	24008.4	24034.0	24308.2	24333.8	23306.5
72.5°	23067.1	22948.6	22421.0	22079.4	21623.8	21358.9	20980.0	21066.0	21424.0	21484.4	20666.3
75°	18195.7	18086.5	17610.0	17498.5	17273.0	17403.2	17310.2	17345.1	17633.3	17368.3	16877.9
77.5°	11776.4	11802.0	11727.6	11981.0	11971.7	11978.6	12318.0	12352.8	12634.0	12471.4	11997.2
80°	5280.5	5357.1	5538.4	5905.6	5682.5	5803.4	5933.5	5894.0	6177.6	5536.1	5766.2
82.5°	1069.1	1106.3	1043.5	1090.0	1018.0	1055.2	1108.6	1027.3	1018.0	943.6	876.2
85°	550.8	557.8	555.5	543.8	478.8	441.6	425.3	357.9	323.1	316.1	292.8
87.5°	357.9	362.6	350.9	348.6	306.8	281.2	251.0	211.5	176.6	123.2	102.3
90°	218.5	218.5	206.8	195.2	174.3	155.7	125.5	90.6	53.5	20.9	11.6
92.5°	146.4	146.4	141.8	134.8	120.9	104.6	81.3	53.5	25.6	9.3	4.6
95°	93.0	93.0	90.6	88.3	79.0	67.4	51.1	32.5	16.3	7.0	2.3
97.5°	60.4	60.4	60.4	58.1	53.5	46.5	34.9	20.9	11.6	4.6	2.3
100°	37.2	39.5	37.2	37.2	34.9	30.2	23.2	13.9	9.3	4.6	2.3
102.5°	20.9	20.9	23.2	23.2	20.9	18.6	13.9	11.6	7.0	4.6	2.3
105°	9.3	9.3	11.6	11.6	11.6	9.3	9.3	7.0	4.6	4.6	2.3
107.5°	2.3	2.3	2.3	4.6	7.0	7.0	7.0	7.0	4.6	2.3	2.3
110°	0.0	0.0	0.0	2.3	2.3	4.6	4.6	4.6	4.6	2.3	2.3



REPORT NUMBER: P579390  
 CATALOG NUMBER: CTN-CA10-630-722-U-T5-HSS-HM-EX90

**CANDELA DISTRIBUTION (continued):**

	0°	5°	15°	25°	35°	45°	55°	65°	75°	85°	90°
112.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
115°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
117.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
120°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
122.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
125°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
127.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
130°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
132.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
135°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
137.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
140°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
142.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
145°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
147.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
150°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
152.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
155°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
157.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
162.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0





REPORT NUMBER: P579390

CATALOG NUMBER: CTN-CA10-630-722-U-T5-HSS-HM-EX90

**CANDELA DISTRIBUTION (continued):**

	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	5471.0	5471.0	5471.0	5471.0	5471.0	5471.0	5471.0	5471.0	5471.0	5471.0
2.5°	5492.0	5464.1	5485.0	5450.1	5440.8	5410.6	5468.7	5478.0	5473.4	5482.7
5°	5496.6	5461.7	5487.3	5452.4	5450.1	5417.6	5478.0	5480.3	5464.1	5471.0
7.5°	5510.5	5478.0	5496.6	5457.1	5461.7	5422.2	5492.0	5489.6	5480.3	5496.6
10°	5561.7	5524.5	5531.5	5489.6	5501.2	5459.4	5545.4	5550.1	5540.8	5571.0
12.5°	5650.0	5598.9	5615.1	5566.3	5575.6	5533.8	5638.4	5645.3	5645.3	5694.2
15°	5770.8	5717.4	5752.3	5689.5	5691.8	5629.1	5708.1	5708.1	5717.4	5784.8
17.5°	5947.5	5882.4	5928.9	5870.8	5508.2	5371.1	5640.7	5805.7	5531.5	5508.2
20°	6166.0	6135.7	6161.3	6066.0	5478.0	4850.5	4362.4	4336.9	4878.4	5148.0
22.5°	6433.2	6403.0	6414.6	6293.8	4890.0	4448.4	4441.4	4395.0	3718.6	3532.7
25°	6747.0	6730.7	6705.2	5691.8	5055.0	4632.0	4576.2	3969.6	3581.5	3616.4
27.5°	7084.0	7035.2	6172.9	5912.6	5308.3	4815.6	4499.5	3707.0	3693.1	3725.6
30°	7460.5	7202.5	6319.3	6231.0	5603.5	5043.4	3916.2	3869.7	3869.7	3920.8
32.5°	7939.3	6726.1	6726.1	6679.6	5968.4	4427.5	4123.0	4095.1	4127.7	4148.6
35°	7867.2	7235.1	7309.4	7288.5	6463.4	4508.8	4455.4	4408.9	4415.9	4415.9
37.5°	7890.5	7916.0	8004.3	7913.7	5638.4	4862.1	4776.1	4766.8	4773.8	4790.1
40°	8620.2	8634.2	8666.7	8466.9	6059.0	5273.5	5154.9	5131.7	5154.9	5189.8
42.5°	9405.8	9445.3	9482.5	7699.9	6647.0	5740.6	5622.1	5577.9	5619.8	5657.0
45°	10335.5	10395.9	9826.5	8380.9	7311.8	6272.9	6147.4	6093.9	6119.5	6152.0
47.5°	11381.3	11476.6	9266.4	9247.8	8092.7	6902.7	6758.6	6656.3	6695.9	6693.5
50°	12562.0	10967.6	10237.9	10226.2	8964.2	7604.6	7455.9	7362.9	7393.1	7369.9
52.5°	13837.9	11267.4	11290.7	11288.4	9875.3	8359.9	8222.8	8106.6	7867.2	8088.0
55°	15144.1	12304.0	12392.3	12378.4	10830.5	9140.9	8994.4	8885.2	5805.7	4903.9
57.5°	16443.3	13387.1	13415.0	13447.5	11820.6	9893.9	9250.1	8497.1	3311.9	3295.6
60°	17726.2	14419.0	14474.8	14493.4	12355.1	8190.3	3781.4	3851.1	1001.7	1196.9
62.5°	19055.6	15437.0	15488.1	15471.8	12887.4	7616.2	3972.0	3892.9	93.0	86.0
65°	20752.3	16712.9	16640.9	16587.4	13726.4	8127.5	4267.1	4246.2	30.2	20.9
67.5°	21347.3	17003.4	16857.0	16838.4	13847.2	8236.8	4290.4	4274.1	30.2	20.9
70°	19999.3	15899.5	15648.5	15655.4	12885.0	7704.5	4002.2	3978.9	27.9	20.9
72.5°	17514.7	14042.5	13937.9	13384.7	11158.2	6777.2	3549.0	3460.6	27.9	18.6
75°	14379.5	11344.1	11111.7	10491.2	8880.6	5387.4	2786.6	2672.8	25.6	16.3
77.5°	9982.2	7955.5	7511.6	6879.5	5940.5	3572.2	1873.3	1726.8	23.2	16.3
80°	4525.1	3265.4	3281.7	2514.7	2015.0	1210.9	595.0	539.2	20.9	13.9
82.5°	787.9	581.0	546.2	527.6	439.3	297.5	181.3	155.7	18.6	9.3
85°	274.2	220.8	244.0	288.2	255.7	179.0	111.6	106.9	11.6	4.6
87.5°	93.0	97.6	113.9	137.1	120.9	69.7	41.8	30.2	2.3	0.0
90°	9.3	11.6	11.6	11.6	7.0	0.0	0.0	0.0	0.0	0.0
92.5°	2.3	2.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
95°	2.3	2.3	2.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0
97.5°	2.3	2.3	2.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0
100°	2.3	2.3	2.3	2.3	0.0	0.0	0.0	0.0	0.0	0.0
102.5°	2.3	2.3	2.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0
105°	2.3	2.3	2.3	2.3	0.0	0.0	0.0	0.0	0.0	0.0
107.5°	2.3	2.3	2.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0
110°	2.3	2.3	2.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0



REPORT NUMBER: P579390  
 CATALOG NUMBER: CTN-CA10-630-722-U-T5-HSS-HM-EX90

**CANDELA DISTRIBUTION (continued):**

	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
112.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
115°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
117.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
120°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
122.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
125°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
127.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
130°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
132.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
135°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
137.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
140°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
142.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
145°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
147.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
150°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
152.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
155°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
157.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
162.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)