

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: INVUE

Report Number: P180873

Luminaire Tested: **ICM-F02-LED-E1-SL4**

Issue Date: 03/03/2020

Test Information

Test Method: LM-79-08
Report Number: P180873
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (P33680)
Test Lab: INNOVATION CENTER-P3
Issue Date: 03/03/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: INVUE
Catalog Number: ICM-F02-LED-E1-SL4
Description: ICON SITE MEDIUM LED LUMINAIRE
(2) LIGHTBARS WITH AccuLED OPTICS - TYPE 4 W/ SPILL LIGHT CONTROL
Light Source: (14) 4000K CCT, 70 CRI LEDs
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 4537.1 lumens
Efficiency: N/A
Efficacy: 82.5 lumens/watt
Luminous Opening: Rectangular w/ Sides (W: 0.33' x L: 1' x H: 0.1')
IES Classification: Type IV - Short - Full Cutoff
BUG Rating: B1 - U0 - G1

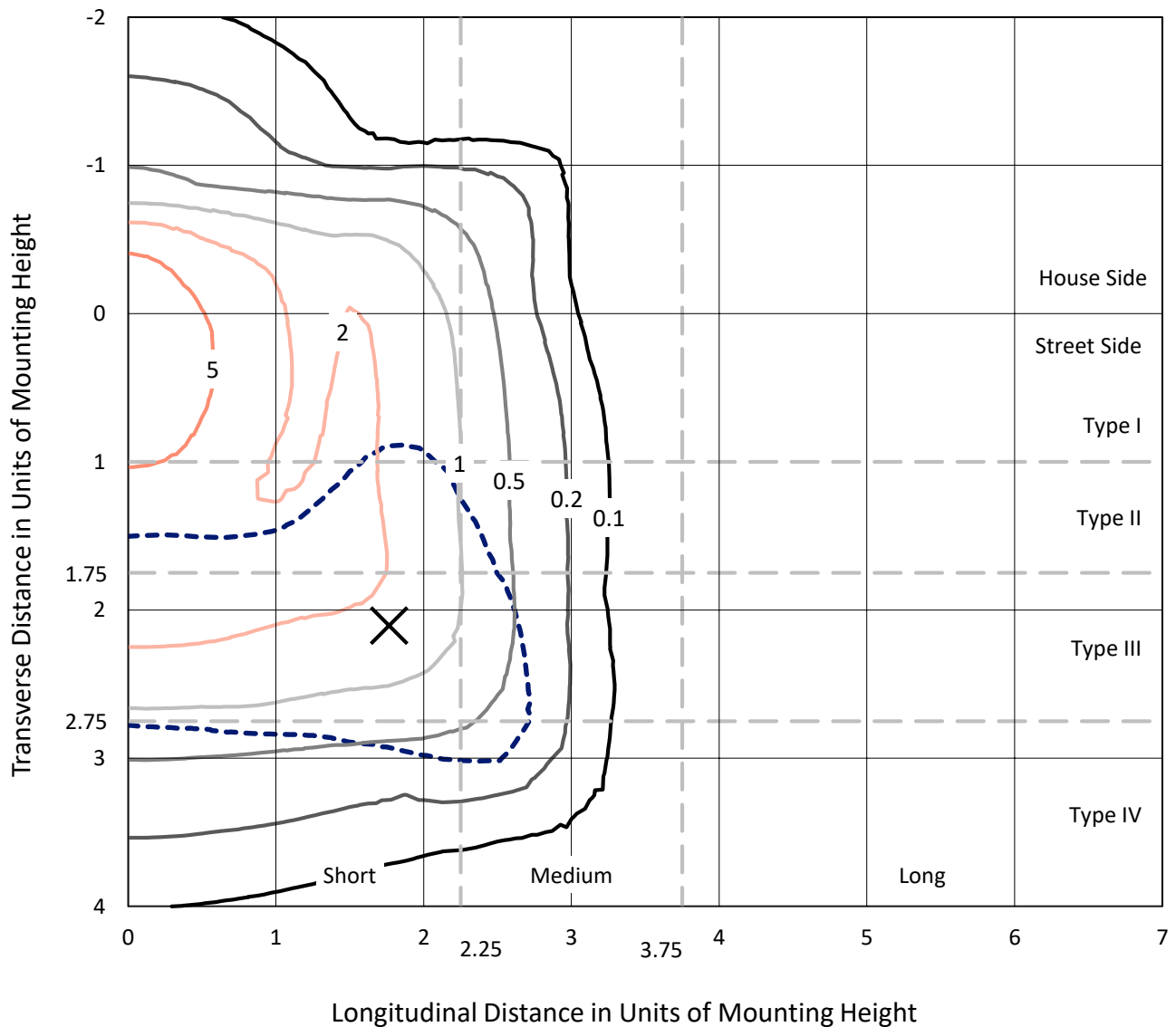
Input Watts (W): 55
Input Voltage (V): NR
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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Iso-Footcandle Lines of Horizontal Illumination

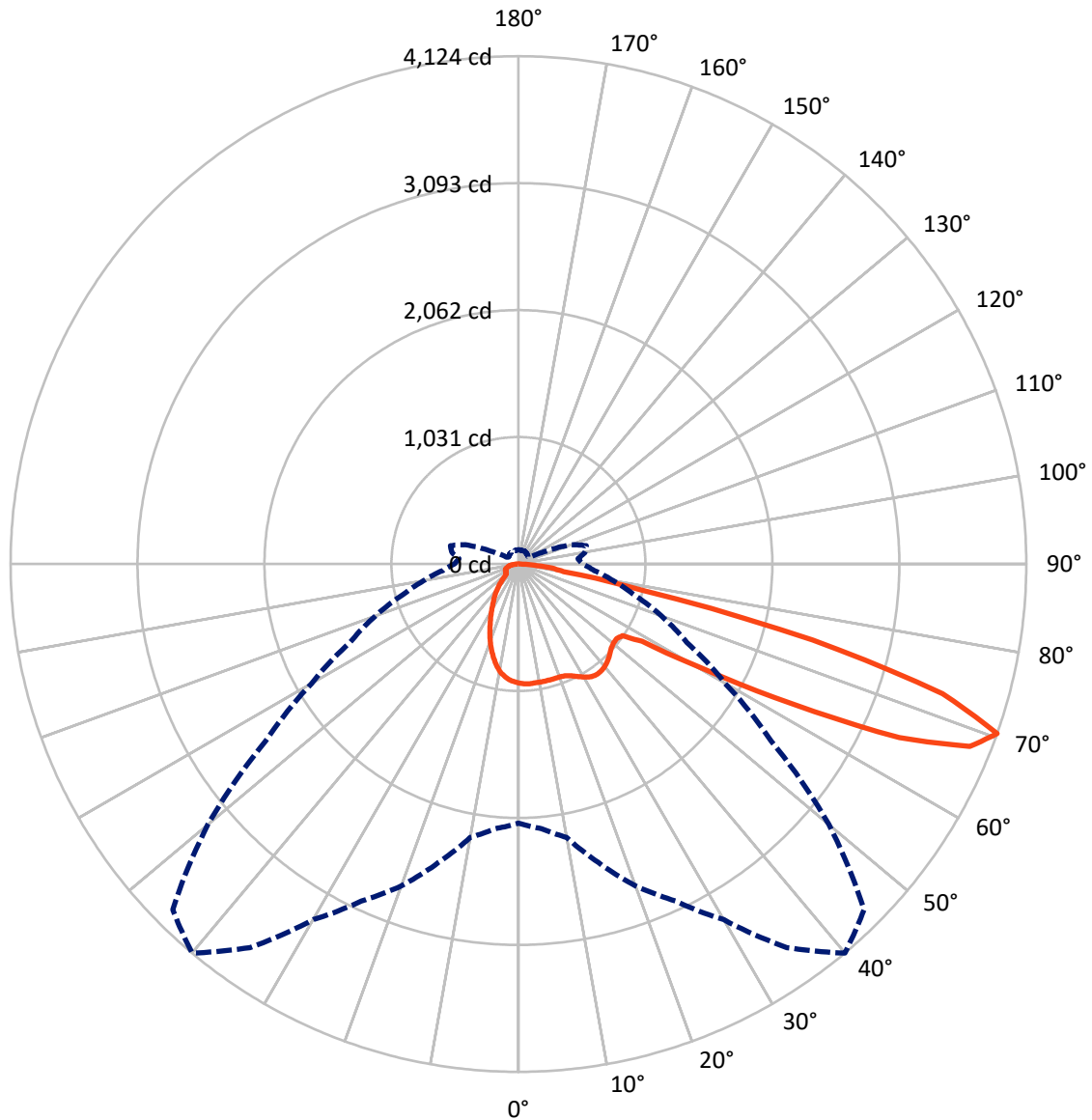
× Max cd
 - - - 1/2 Max cd



Based on 10 foot mounting height. Maximum calculated value = 9.7 fc
 Type IV - Short - Full Cutoff

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Luminous Intensity Polar Plot



— Vertical Plane Through 40-Deg Lateral - - - Horizontal Cone Through 70-Deg Vertical

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FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	941.9	0.0	941.9
	% Fixture	20.8	0.0	20.8
Street Side	Lumens	3595.3	0.0	3595.3
	% Fixture	79.2	0.0	79.2
Total	Lumens	4537.1	0.0	4537.1
	% Fixture	100.0	0.0	100.0

Coefficient of Utilization

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	90.4	2.0
10°-20°	247.6	5.5
20°-30°	366.5	8.1
30°-40°	463.2	10.2
40°-50°	523.8	11.5
50°-60°	745.4	16.4
60°-70°	1388.3	30.6
70°-80°	636.3	14.0
80°-90°	75.5	1.7
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°	4537.1	100.0
0°-180°	4537.1	100.0



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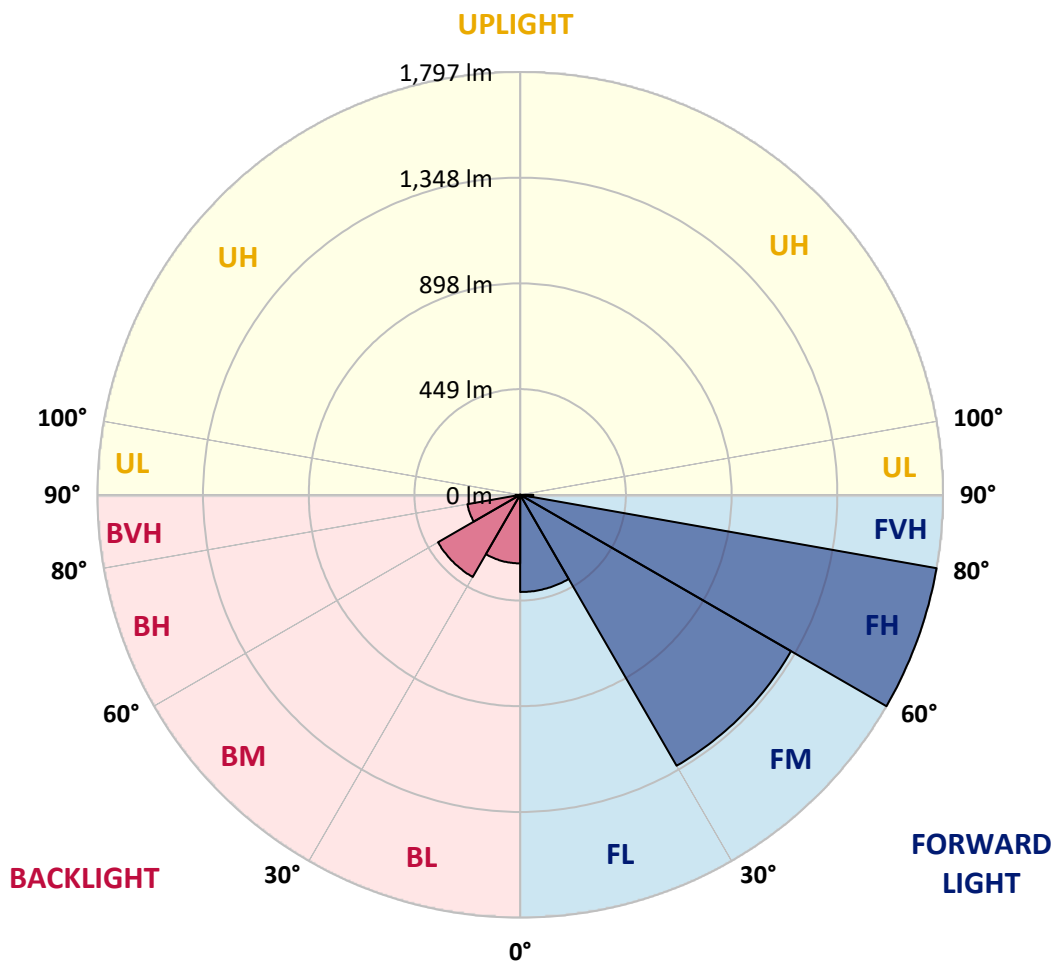
CATALOG NUMBER: ICM-F02-LED-E1-SL4

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	413.1	9.1			
FM	(30°-60°)	1329.2	29.3			
FH	(60°-80°)	1796.9	39.6			G1/1800
FVH	(80°-90°)	56.0	1.2			G1/100
BL	(0°-30°)	291.4	6.4	B1/500		
BM	(30°-60°)	403.2	8.9	B1/1000		
BH	(60°-80°)	227.7	5.0	B1/500		G1/500
BVH	(80°-90°)	19.5	0.4			G1/100
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B1-U0-G1

Type IV Short





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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	968.1	968.1	968.1	968.1	968.1	968.1	968.1	968.1	968.1	968.1	968.1
2.5°	983.0	985.5	982.4	982.0	982.0	981.4	978.3	977.9	973.8	974.2	975.3
5°	990.1	991.2	989.1	988.6	987.5	985.5	983.0	979.9	976.8	973.8	971.2
7.5°	997.3	996.3	994.7	994.7	993.2	990.1	985.0	980.9	974.2	970.7	966.1
10°	1007.5	1006.0	1003.9	1002.9	1000.4	995.7	988.6	983.0	974.8	967.6	959.9
12.5°	1017.2	1016.8	1013.7	1012.1	1008.0	1003.4	994.7	986.1	975.3	964.0	953.8
15°	1034.7	1032.7	1029.6	1026.5	1019.8	1013.7	1000.4	990.1	974.8	959.9	944.0
17.5°	1064.8	1061.3	1058.2	1051.5	1043.4	1032.7	1013.1	995.7	974.8	953.3	935.4
20°	1120.2	1112.5	1108.4	1099.7	1085.3	1065.9	1035.7	1007.5	976.3	948.7	924.6
22.5°	1182.6	1177.5	1171.9	1166.2	1143.7	1115.5	1074.6	1032.7	985.5	946.6	915.9
25°	1252.8	1246.1	1243.0	1233.3	1212.3	1180.1	1124.3	1065.9	1006.5	954.8	915.9
27.5°	1315.2	1313.1	1312.7	1301.4	1281.4	1243.5	1177.5	1107.4	1035.2	971.7	923.5
30°	1372.0	1370.0	1368.9	1362.8	1339.8	1294.7	1223.1	1144.2	1066.4	995.3	937.9
32.5°	1432.5	1425.8	1422.7	1411.0	1384.8	1332.1	1250.2	1168.3	1091.0	1018.2	953.8
35°	1481.6	1476.0	1469.9	1452.9	1416.1	1353.6	1262.0	1176.5	1100.8	1031.1	962.0
37.5°	1517.4	1511.8	1503.1	1481.6	1436.0	1360.8	1261.5	1174.0	1097.1	1029.0	963.5
40°	1533.3	1527.6	1518.4	1491.4	1439.6	1356.7	1251.7	1162.1	1086.3	1018.2	957.4
42.5°	1527.2	1523.1	1511.3	1485.2	1428.4	1338.2	1232.3	1140.1	1065.9	1000.8	943.5
45°	1503.6	1500.6	1489.3	1461.6	1402.8	1308.6	1203.6	1112.5	1041.3	979.4	925.1
47.5°	1468.3	1467.3	1456.0	1428.8	1370.5	1278.9	1174.0	1085.3	1016.8	958.4	909.8
50°	1429.4	1424.3	1418.6	1393.6	1340.3	1253.3	1152.4	1068.5	1002.9	950.7	903.1
52.5°	1404.8	1403.3	1398.1	1375.6	1324.5	1238.4	1142.7	1062.3	1001.9	949.1	899.5
55°	1622.9	1626.5	1579.4	1481.6	1395.6	1279.4	1171.9	1093.5	1027.0	973.8	937.4
57.5°	2400.6	2384.7	2303.8	2109.8	1890.6	1601.4	1393.0	1266.6	1184.2	1193.4	1211.8
60°	2796.9	2793.8	2778.9	2703.6	2557.7	2337.6	2093.4	1813.3	1724.3	1734.0	1741.1
62.5°	2974.0	2978.5	2989.8	2961.7	2923.3	2859.3	2737.4	2624.8	2505.5	2460.9	2341.7
65°	3055.8	3064.0	3089.7	3105.5	3120.4	3131.6	3179.7	3311.8	3398.9	3236.1	2857.2
67.5°	2886.4	2925.8	3010.3	3092.8	3166.4	3271.4	3434.2	3740.9	3954.3	3754.2	3204.9
70°	2104.1	2157.9	2254.6	2509.6	2782.0	3020.0	3335.4	3802.3	4124.3	3969.7	3290.8
72.5°	1319.4	1334.1	1377.1	1470.9	1673.0	1978.7	2530.1	3230.4	3602.2	3478.7	2781.5
75°	837.0	842.1	840.7	862.1	896.5	963.0	1181.1	1908.1	2467.6	2275.2	1550.2
77.5°	498.6	506.3	509.4	516.1	532.5	556.0	573.9	649.1	1034.7	1004.5	562.6
80°	417.8	423.9	418.8	417.2	407.0	399.8	408.6	399.8	371.2	357.3	329.2
82.5°	221.2	220.7	219.1	234.0	264.2	287.7	305.7	301.6	272.8	232.5	197.1
85°	121.3	125.4	125.4	130.5	126.0	126.4	130.5	137.7	127.4	106.5	87.1
87.5°	10.2	15.9	12.8	15.9	21.5	15.3	14.9	14.9	12.8	9.2	8.2
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):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
0°	968.1	968.1	968.1	968.1	968.1	968.1	968.1	968.1	968.1	968.1	968.1
2.5°	972.8	971.7	969.7	968.1	968.1	965.6	964.0	963.0	962.5	960.5	960.5
5°	969.7	966.1	962.5	959.9	958.4	955.8	951.7	949.7	947.1	945.0	944.0
7.5°	963.0	956.4	950.7	946.6	941.5	937.4	932.3	927.6	923.1	921.0	920.0
10°	952.8	944.0	935.4	927.6	920.5	913.3	906.7	900.0	894.4	890.3	886.2
12.5°	943.0	929.7	918.4	907.2	895.9	887.3	878.1	868.3	860.1	852.4	850.3
15°	929.7	914.3	900.0	886.2	872.4	858.1	846.8	836.0	822.7	814.1	807.4
17.5°	917.4	899.0	881.6	865.2	848.3	833.5	816.6	802.2	788.9	775.6	765.9
20°	904.1	884.2	865.7	847.3	828.8	810.0	790.4	772.0	755.6	739.8	723.9
22.5°	892.4	871.8	854.0	834.0	813.5	792.0	769.5	746.4	727.4	707.0	688.6
25°	885.2	862.6	844.2	824.7	802.2	778.7	753.1	726.0	702.9	679.4	657.3
27.5°	885.2	856.0	837.0	817.6	794.5	769.5	741.3	711.6	685.5	659.4	632.3
30°	892.8	857.0	831.4	811.0	787.4	760.3	729.0	697.8	669.1	638.4	612.3
32.5°	900.0	859.1	827.4	801.2	774.1	747.4	715.7	682.4	650.7	621.5	593.9
35°	904.7	859.1	819.6	786.3	755.6	729.5	698.3	665.0	632.7	604.1	578.5
37.5°	905.1	855.0	807.4	769.5	737.2	710.1	680.4	649.1	618.4	591.8	570.3
40°	900.0	846.8	795.1	751.5	717.8	690.1	663.0	634.8	607.2	585.1	566.7
42.5°	890.8	838.1	783.3	737.2	701.9	673.2	648.1	624.1	600.0	581.0	565.7
45°	876.9	826.3	772.6	728.5	693.7	663.5	638.9	619.0	598.5	582.6	567.3
47.5°	864.7	822.2	776.1	734.1	697.8	666.6	641.5	624.6	608.7	598.0	576.9
50°	862.1	820.2	777.7	738.8	701.9	670.1	648.1	639.4	634.8	628.2	595.9
52.5°	855.0	819.6	788.9	767.4	743.9	729.0	706.0	714.1	709.0	685.5	627.2
55°	930.2	940.5	969.1	1010.1	1048.0	1056.7	1054.1	1044.4	992.7	854.0	702.4
57.5°	1278.9	1336.8	1391.0	1415.1	1412.0	1384.8	1365.4	1326.0	1251.3	1082.2	850.9
60°	1763.2	1772.4	1743.7	1701.2	1629.6	1569.7	1505.7	1431.9	1323.4	1158.1	942.0
62.5°	2209.1	2085.2	1957.7	1838.0	1728.8	1633.7	1544.6	1441.7	1300.4	1127.8	930.2
65°	2523.9	2261.8	2060.7	1888.6	1734.5	1601.4	1490.3	1356.7	1197.5	1041.9	862.1
67.5°	2686.2	2284.4	1975.6	1736.0	1517.4	1333.1	1185.2	1055.2	936.8	868.7	754.6
70°	2505.0	1938.8	1508.8	1237.9	976.3	782.8	618.4	519.2	484.8	549.3	571.4
72.5°	1866.6	1262.0	897.5	694.2	531.9	423.9	325.1	255.4	207.8	218.0	283.1
75°	882.6	544.7	385.0	292.8	232.9	193.0	157.7	144.4	120.8	100.4	94.2
77.5°	343.5	250.3	206.8	151.5	107.5	86.5	73.8	71.2	72.7	70.6	69.6
80°	261.6	177.1	111.1	81.4	70.1	62.0	54.8	52.7	53.8	56.3	58.9
82.5°	145.9	91.2	67.5	58.9	52.7	45.0	40.9	37.9	38.4	41.5	47.1
85°	56.3	44.0	40.5	38.9	36.4	29.2	25.1	25.6	29.2	34.8	34.8
87.5°	6.1	6.1	8.2	6.1	6.1	6.1	5.7	6.7	7.2	9.2	10.8
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°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
0°	968.1	968.1	968.1	968.1	968.1	968.1	968.1	968.1	968.1	968.1	968.1
2.5°	959.4	959.4	959.4	958.4	958.9	956.8	956.8	955.4	957.9	956.4	955.8
5°	944.6	944.0	942.0	942.0	942.0	942.0	943.5	939.4	942.5	942.5	940.9
7.5°	919.4	919.4	913.9	916.9	915.9	917.4	919.4	917.4	920.5	922.5	921.0
10°	884.7	884.7	880.1	883.6	882.1	885.7	889.3	887.3	889.3	892.4	893.4
12.5°	846.2	844.2	840.1	841.7	841.7	843.7	845.2	847.8	850.3	854.4	856.5
15°	801.7	798.6	793.5	793.5	790.4	791.4	794.5	795.5	800.7	806.3	813.0
17.5°	756.2	748.5	742.9	736.2	731.1	735.2	738.8	741.3	745.4	754.1	758.7
20°	713.1	697.8	687.1	678.3	672.7	675.3	679.9	683.0	686.5	688.6	690.1
22.5°	670.7	653.2	638.4	627.6	618.4	621.0	619.0	617.4	620.0	613.3	612.8
25°	633.8	613.3	593.4	580.6	569.3	565.7	555.0	552.4	545.2	539.6	535.5
27.5°	607.2	580.6	558.5	543.7	525.8	512.5	498.6	484.8	477.1	467.9	463.4
30°	586.2	558.0	531.9	506.8	483.3	462.8	444.4	426.4	414.1	400.8	392.2
32.5°	566.7	540.7	508.8	474.6	442.9	419.8	395.7	375.3	355.8	338.4	325.6
35°	553.4	524.3	483.8	441.9	406.0	378.9	353.2	324.1	300.6	278.0	264.2
37.5°	546.2	510.4	460.7	414.1	374.2	343.5	311.8	278.0	249.3	228.4	207.4
40°	540.7	496.6	440.3	389.6	347.6	310.8	273.9	234.0	202.2	180.2	163.8
42.5°	534.5	481.2	422.3	370.1	323.5	280.6	236.0	193.5	163.3	148.0	140.7
45°	527.8	467.9	405.5	351.7	300.0	247.8	196.6	157.2	139.3	134.1	134.1
47.5°	526.3	459.3	393.2	333.8	273.4	209.9	160.3	135.6	130.5	131.5	133.6
50°	532.5	456.7	382.4	312.8	238.0	170.0	135.6	127.4	128.5	131.5	134.6
52.5°	547.3	458.7	371.2	283.6	196.1	140.3	125.4	124.9	128.0	132.6	135.6
55°	572.4	458.7	349.7	240.1	156.7	126.0	121.9	123.9	128.0	132.1	134.6
57.5°	626.1	454.1	311.8	192.0	131.1	120.8	120.8	123.3	127.0	131.1	133.1
60°	690.1	448.0	258.5	148.5	118.2	116.7	120.3	123.3	126.4	130.0	132.1
62.5°	694.2	432.1	204.7	122.9	111.6	114.1	119.8	123.9	124.9	127.4	130.0
65°	637.9	376.8	162.8	110.0	108.6	112.7	118.2	121.3	121.9	122.9	125.4
67.5°	558.5	307.2	131.5	103.9	105.5	110.0	113.1	115.7	117.2	119.8	120.3
70°	458.7	246.8	112.7	97.8	99.3	104.5	107.0	109.6	112.7	115.7	114.1
72.5°	325.1	192.0	98.8	91.2	93.2	97.8	100.8	102.9	105.5	108.6	106.5
75°	138.2	134.1	85.5	82.4	85.5	88.6	91.6	94.7	97.3	98.8	98.8
77.5°	70.6	78.9	73.8	73.8	75.8	78.9	81.4	84.5	86.0	87.5	89.6
80°	59.9	60.9	62.0	64.0	66.0	69.1	71.6	74.2	74.8	75.3	76.3
82.5°	49.7	51.7	52.7	55.8	57.3	58.3	59.9	59.9	60.9	60.9	59.3
85°	35.8	38.4	39.9	40.5	39.9	40.5	40.9	42.0	44.6	44.6	42.5
87.5°	10.2	9.8	12.3	12.8	13.9	15.9	18.0	21.5	22.5	23.5	23.5
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):

	165°	170°	175°	180°
0°	968.1	968.1	968.1	968.1
2.5°	955.4	956.4	954.3	954.8
5°	940.9	943.0	940.5	943.5
7.5°	922.5	925.6	925.1	924.6
10°	895.9	900.0	900.0	901.6
12.5°	862.1	864.7	866.7	867.7
15°	816.6	821.2	823.7	823.7
17.5°	761.8	764.8	766.4	764.4
20°	692.2	691.2	691.6	686.5
22.5°	611.8	613.3	608.7	609.8
25°	532.9	530.4	532.5	529.4
27.5°	456.7	457.2	451.5	454.1
30°	384.0	381.4	374.2	377.9
32.5°	313.9	307.2	299.5	294.9
35°	247.8	237.6	234.0	232.5
37.5°	194.5	183.3	179.7	175.6
40°	154.6	150.5	149.0	150.0
42.5°	138.7	138.7	139.7	140.3
45°	134.6	136.2	137.7	138.2
47.5°	135.2	136.7	138.7	139.3
50°	136.2	137.7	139.3	139.7
52.5°	136.7	136.7	137.7	138.2
55°	135.6	135.2	135.6	136.2
57.5°	133.6	132.6	133.1	134.6
60°	132.6	131.1	132.1	133.1
62.5°	130.0	129.5	130.5	131.1
65°	124.4	124.9	126.4	126.4
67.5°	119.3	119.8	120.3	120.8
70°	<i>113.1</i>	<i>113.7</i>	<i>114.7</i>	<i>115.2</i>
72.5°	106.0	108.0	109.6	111.6
75°	100.4	102.4	105.5	107.5
77.5°	90.6	92.2	95.7	98.3
80°	76.8	76.3	76.8	78.3
82.5°	58.9	58.9	58.3	57.9
85°	41.5	40.9	39.4	39.4
87.5°	22.5	22.0	21.5	20.5
90°	0.0	0.0	0.0	0.0

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