

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: P677472

Luminaire Tested: **CCW-SA-1C-830-U-SLR-HSS**

Issue Date: 04/25/2023



Test Information

Test Method: LM-79-08
Report Number: P677472
Test Lab: INNOVATION CENTER(G1)
Issue Date: 04/25/2023
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: INVUE
Catalog Number: CCW-SA-1C-830-U-SLR-HSS
Description: INVUE CLEAR CURVE Wall Pack MOUNT Light Square Luminaire @615mA w/
SLR distribution lens and House Side Shield
Light Source: (16) 3000K CCT, 80 CRI LEDs
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2581.8 lumens
Efficiency: N/A
Efficacy: 80.7 lumens/watt
Luminous Opening: Rectangular (W 1' x L: 0.5' x H: 0')
IES Classification: Type IV - Short
BUG Rating: B1 - U0 - G1

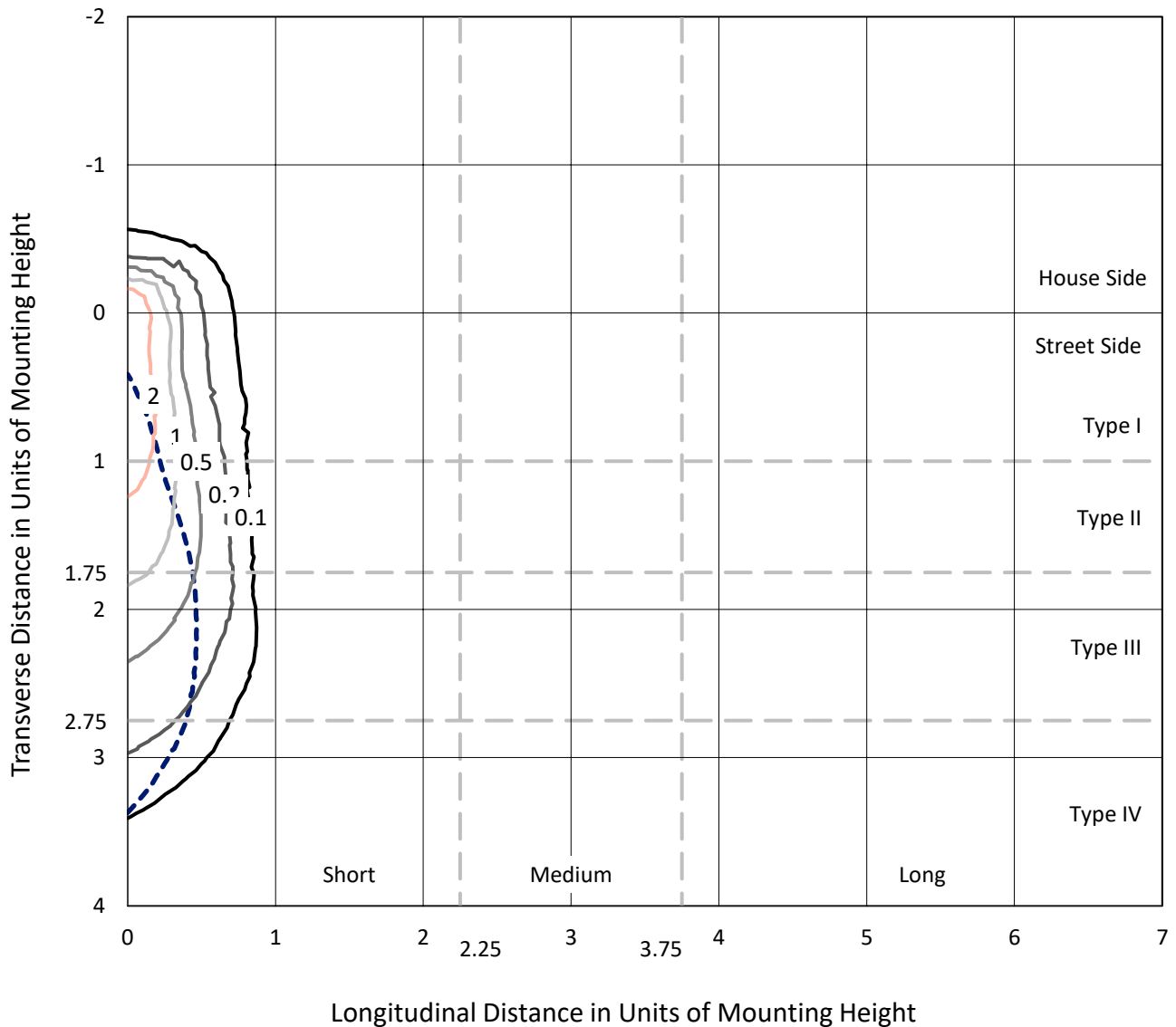
Input Watts (W): 32
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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Iso-Footcandle Lines of Horizontal Illumination

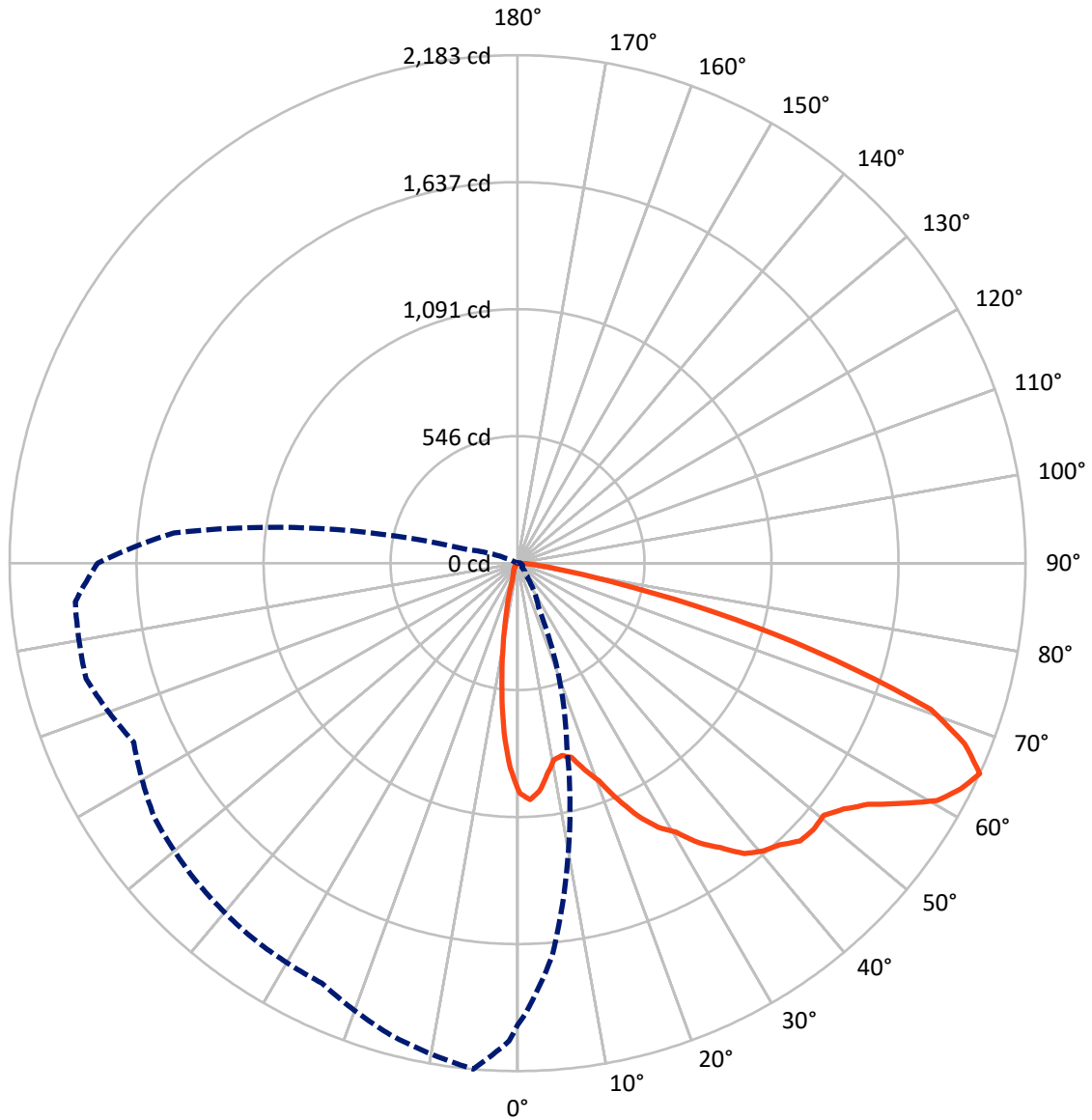
× Max cd
 - - - 1/2 Max cd



Based on 15 foot mounting height. Maximum calculated value = 4.4 fc
 Type IV - Short - N/A

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Luminous Intensity Polar Plot



— Vertical Plane Through 355-Deg Lateral - - - Horizontal Cone Through 65-Deg Vertical

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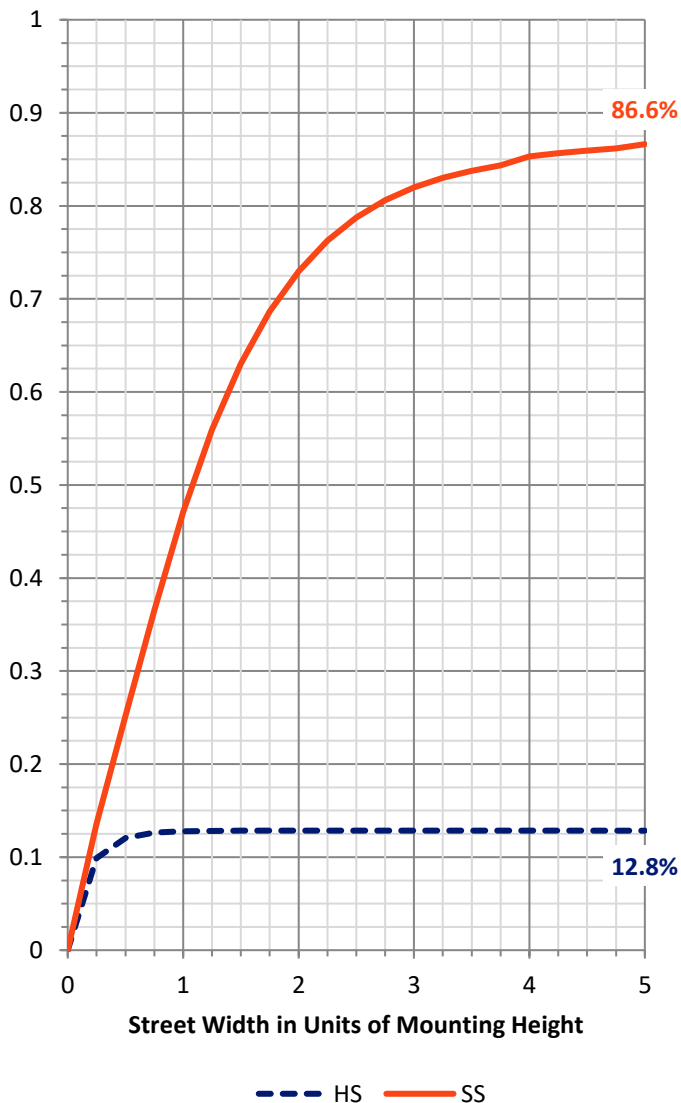
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	335.2	0.0	335.2
	% Fixture	13.0	0.0	13.0
Street Side	Lumens	2246.6	0.0	2246.6
	% Fixture	87.0	0.0	87.0
Total	Lumens	2581.8	0.0	2581.8
	% Fixture	100.0	0.0	100.0

Coefficient of Utilization

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	74.8	2.9
10°-20°	144.8	5.6
20°-30°	201.6	7.8
30°-40°	286.5	11.1
40°-50°	397.3	15.4
50°-60°	541.3	21.0
60°-70°	595.2	23.1
70°-80°	292.5	11.3
80°-90°	47.8	1.9
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°	2581.8	100.0
0°-180°	2581.8	100.0



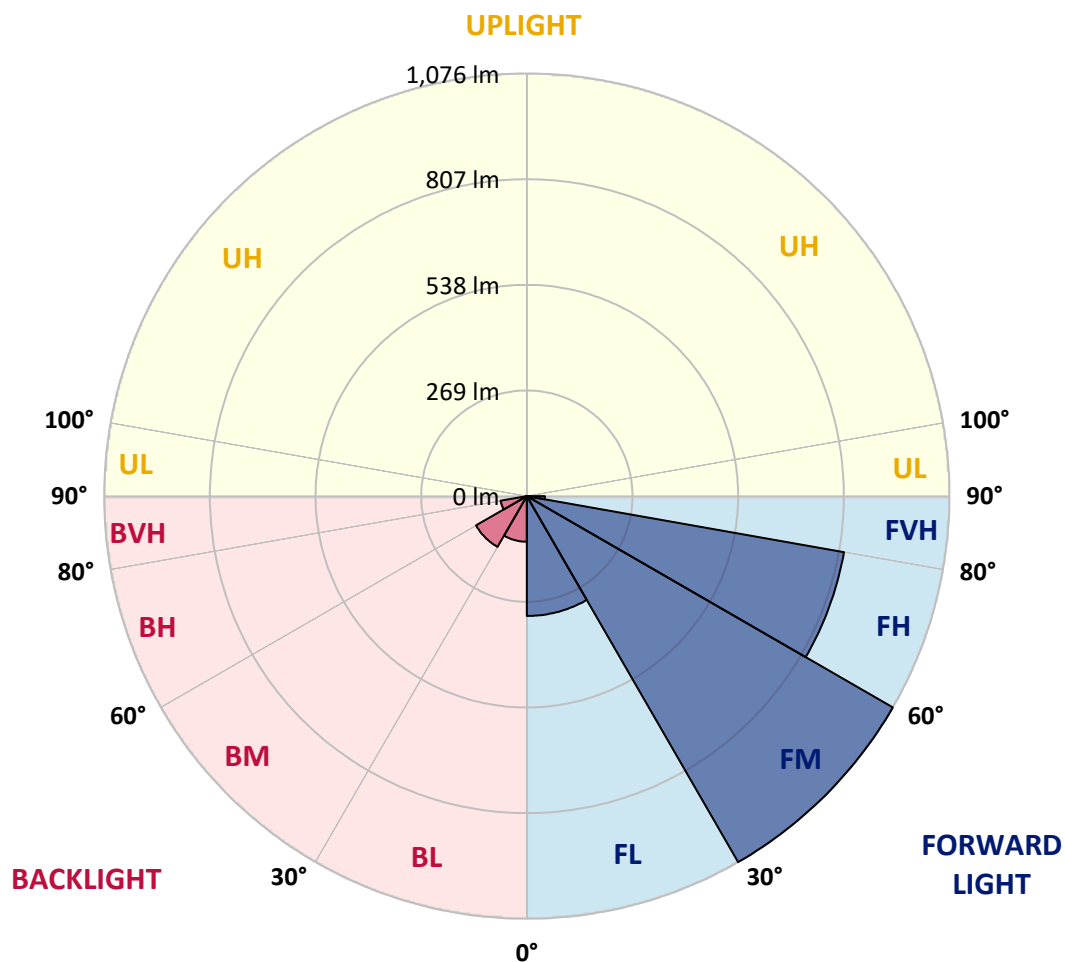
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	305.1	11.8			
FM (30°-60°)	1075.9	41.7			
FH (60°-80°)	819.9	31.8			G1/1800
FVH (80°-90°)	45.6	1.8			G1/100
BL (0°-30°)	116.1	4.5	B1/500		
BM (30°-60°)	149.2	5.8	B0/220		
BH (60°-80°)	67.7	2.6	B0/110		G0/110
BVH (80°-90°)	2.2	0.1			G0/10
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°	1°	5°	15°	25°	35°	45°	55°	65°	75°	85°
0°	987.0	987.0	987.0	987.0	987.0	987.0	987.0	987.0	987.0	987.0	987.0
2.5°	1007.2	1019.0	1007.9	968.9	961.9	943.2	914.6	912.5	882.6	886.1	870.1
5°	946.6	958.5	934.8	883.3	835.3	797.0	774.0	732.9	723.9	703.7	703.7
7.5°	884.7	884.0	843.6	800.5	728.8	658.5	626.4	567.3	532.5	513.7	495.6
10°	833.2	822.0	797.0	707.9	629.9	556.8	517.2	478.2	442.0	410.7	379.3
12.5°	797.0	803.9	764.3	667.5	566.6	515.8	473.3	432.2	389.1	353.6	318.8
15°	815.8	804.6	758.0	658.5	556.1	486.5	430.2	380.0	332.0	285.4	258.9
17.5°	874.2	845.7	790.7	658.5	534.6	442.0	373.8	314.6	263.1	221.3	188.6
20°	952.9	920.2	861.0	682.8	518.6	409.3	316.0	241.5	187.9	149.0	123.9
22.5°	1033.6	1007.9	918.8	692.6	499.8	365.4	249.2	174.7	125.3	100.2	87.7
25°	1130.4	1094.2	996.7	731.6	471.9	323.0	196.3	121.8	93.3	80.0	72.4
27.5°	1207.7	1201.4	1069.8	755.2	451.0	288.2	155.2	96.8	77.3	67.5	62.6
30°	1305.1	1271.0	1158.9	802.5	427.4	248.5	129.5	87.0	71.0	60.6	57.1
32.5°	1363.6	1347.6	1205.6	829.0	400.9	215.8	111.4	76.6	64.7	57.1	53.6
35°	1448.5	1416.5	1272.4	845.7	387.0	197.0	100.2	69.6	54.3	46.6	42.5
37.5°	1543.1	1531.3	1352.4	845.0	366.8	185.8	92.6	64.7	51.5	43.2	38.3
40°	1639.9	1591.9	1401.2	864.5	356.4	177.5	87.0	61.9	48.7	41.1	34.8
42.5°	1712.3	1657.3	1457.5	857.5	343.8	162.9	84.9	57.8	46.6	37.6	32.0
45°	1731.8	1712.3	1508.3	855.4	334.8	151.0	81.4	57.1	45.2	35.5	29.9
47.5°	1769.4	1756.1	1571.0	858.9	327.8	142.0	73.1	58.5	43.2	33.4	28.5
50°	1786.1	1762.4	1621.8	867.3	311.8	130.9	65.4	61.3	42.5	32.7	27.1
52.5°	1855.0	1834.1	1691.4	890.9	298.6	116.2	57.8	58.5	43.9	30.6	25.8
55°	1922.5	1898.8	1798.6	945.2	279.8	104.4	49.4	51.5	41.8	27.8	23.0
57.5°	2015.1	1976.1	1870.3	967.5	263.1	88.4	43.9	42.5	39.0	25.1	20.2
60°	2029.0	2045.0	1859.9	953.6	245.7	78.0	38.3	32.7	41.8	22.3	17.4
62.5°	2075.6	2008.8	1811.1	921.6	233.2	71.7	34.1	27.1	36.2	19.5	14.6
65°	1985.8	1936.4	1697.0	818.6	217.2	72.4	29.9	22.3	23.0	16.0	11.8
67.5°	1854.3	1815.3	1507.6	706.5	201.2	71.0	26.4	19.5	17.4	13.9	10.4
70°	1627.4	1543.1	1280.7	573.5	177.5	66.1	22.3	17.4	14.6	11.1	7.7
72.5°	1184.0	1149.9	918.8	443.4	159.4	59.9	20.9	14.6	12.5	8.4	6.3
75°	797.0	740.6	579.8	290.9	128.1	52.2	17.4	13.2	9.7	6.3	4.9
77.5°	421.1	398.1	328.5	138.5	71.0	24.4	9.7	7.7	5.6	4.9	2.8
80°	182.4	162.2	142.0	56.4	25.1	11.1	6.3	4.2	3.5	2.8	1.4
82.5°	93.3	89.1	73.8	24.4	14.6	8.4	3.5	2.8	2.1	1.4	0.7
85°	45.9	47.3	39.0	7.7	8.4	4.9	0.7	0.7	0.0	0.0	0.0
87.5°	3.5	3.5	2.8	1.4	2.1	0.7	0.0	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



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CANDELA DISTRIBUTION (continued):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	987.0	987.0	987.0	987.0	987.0	987.0	987.0	987.0	987.0	987.0	987.0
2.5°	863.8	873.5	856.8	867.3	862.4	864.5	866.6	861.0	862.4	881.9	882.6
5°	691.9	710.7	703.7	713.5	730.2	721.8	729.5	728.1	729.5	732.2	744.8
7.5°	493.5	487.9	501.2	526.9	556.8	574.9	565.9	561.0	558.2	551.3	559.6
10°	372.4	369.6	366.1	373.8	393.3	413.5	424.6	405.8	395.4	382.1	377.3
12.5°	309.0	291.6	281.9	270.1	275.6	293.7	294.4	276.3	259.6	252.7	260.3
15°	243.6	231.8	214.4	197.7	189.3	203.2	191.4	174.0	152.4	149.7	149.0
17.5°	174.0	167.1	154.5	147.6	137.8	134.3	121.8	95.4	80.0	75.9	77.3
20°	118.3	112.8	112.1	105.8	101.6	98.8	78.7	61.3	56.4	57.1	57.8
22.5°	87.7	84.9	81.4	80.7	77.3	73.8	57.8	51.5	48.0	48.0	50.1
25°	71.7	70.3	66.8	65.4	64.0	59.2	48.7	43.9	42.5	41.1	43.2
27.5°	61.3	60.6	58.5	56.4	55.0	50.1	42.5	38.3	36.9	36.9	36.9
30°	55.0	55.0	52.2	48.0	48.0	42.5	36.2	33.4	32.0	32.0	31.3
32.5°	51.5	50.1	46.6	43.9	41.8	36.2	32.0	29.2	27.1	27.1	27.8
35°	41.8	41.8	41.1	39.0	36.2	30.6	27.1	24.4	23.0	22.3	23.0
37.5°	36.9	34.8	32.0	32.7	31.3	26.4	23.0	20.9	18.8	18.8	18.8
40°	33.4	31.3	28.5	26.4	25.8	23.7	20.2	16.7	14.6	13.9	13.9
42.5°	29.9	28.5	24.4	20.9	20.2	20.2	15.3	12.5	10.4	10.4	10.4
45°	27.8	25.8	22.3	18.1	14.6	15.3	12.5	9.0	7.7	7.0	7.0
47.5°	26.4	24.4	19.5	15.3	11.1	11.1	9.0	6.3	4.9	4.2	4.2
50°	24.4	22.3	17.4	12.5	8.4	7.0	5.6	3.5	2.1	1.4	1.4
52.5°	23.0	20.9	15.3	10.4	7.0	4.9	3.5	0.7	0.0	0.0	0.0
55°	20.9	18.1	13.2	8.4	5.6	2.8	0.7	0.0	0.0	0.0	0.0
57.5°	18.1	16.0	10.4	6.3	3.5	0.7	0.0	0.0	0.0	0.0	0.0
60°	15.3	13.2	8.4	4.9	1.4	0.0	0.0	0.0	0.0	0.0	0.0
62.5°	12.5	11.1	6.3	2.8	0.0	0.0	0.0	0.0	0.0	0.0	0.0
65°	10.4	8.4	4.9	0.7	0.0	0.0	0.0	0.0	0.0	0.0	0.0
67.5°	9.0	7.0	3.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
70°	7.0	4.9	2.1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
72.5°	4.9	3.5	0.7	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
75°	3.5	2.1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
77.5°	2.1	0.7	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
80°	0.7	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
82.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
85°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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



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CANDELA DISTRIBUTION (continued):

	185°	195°	205°	215°	225°	235°	245°	255°	265°	270°	275°
0°	987.0	987.0	987.0	987.0	987.0	987.0	987.0	987.0	987.0	987.0	987.0
2.5°	885.4	906.3	925.7	931.3	946.6	989.1	989.1	1009.3	1045.5	1058.7	1061.5
5°	746.9	769.1	773.3	816.5	836.7	879.8	908.3	976.6	1017.6	1043.4	1059.4
7.5°	568.0	575.6	591.6	632.0	671.7	723.9	778.2	865.2	937.6	966.8	1021.1
10°	390.5	413.5	448.3	484.5	546.4	604.2	674.5	756.6	845.7	881.9	928.5
12.5°	263.1	295.1	350.8	402.3	459.4	517.9	584.7	694.7	795.6	845.7	892.3
15°	153.8	192.8	240.8	324.4	400.2	465.7	532.5	643.8	766.4	831.1	888.2
17.5°	78.0	89.8	129.5	201.9	302.1	409.3	508.8	650.8	788.6	868.0	915.3
20°	58.5	61.9	73.1	107.2	206.7	338.3	486.5	661.2	850.6	947.3	973.1
22.5°	50.8	53.6	58.5	69.6	116.2	258.9	455.2	687.0	934.8	1026.0	1080.3
25°	43.2	45.9	50.1	57.1	74.5	176.1	416.9	714.1	1010.0	1124.8	1175.6
27.5°	37.6	39.7	43.9	49.4	60.6	112.1	350.8	750.3	1124.8	1244.5	1257.8
30°	32.0	34.1	37.6	43.9	51.5	79.3	257.5	755.2	1188.2	1296.7	1333.6
32.5°	27.8	28.5	32.7	38.3	43.2	62.6	181.0	760.1	1234.8	1364.3	1371.9
35°	23.0	24.4	28.5	32.0	37.6	49.4	137.1	735.7	1295.4	1433.9	1431.8
37.5°	18.8	20.9	23.7	26.4	30.6	41.8	109.3	690.5	1371.2	1541.8	1476.3
40°	14.6	16.7	19.5	23.0	25.8	37.6	82.1	622.3	1450.6	1594.7	1525.1
42.5°	10.4	11.8	14.6	18.1	23.0	31.3	59.2	541.5	1481.9	1656.6	1583.5
45°	7.7	9.0	11.1	15.3	23.7	25.1	41.1	467.7	1515.3	1683.8	1570.3
47.5°	4.2	5.6	8.4	13.2	20.9	18.8	29.2	401.6	1553.6	1708.1	1580.7
50°	1.4	2.1	4.9	13.9	16.7	14.6	23.0	366.1	1591.2	1713.0	1601.6
52.5°	0.0	0.0	2.8	14.6	12.5	11.1	20.2	352.2	1581.4	1728.3	1588.4
55°	0.0	0.0	0.7	6.3	7.0	8.4	16.7	351.5	1650.3	1733.2	1660.8
57.5°	0.0	0.0	0.0	2.1	4.2	7.0	14.6	329.2	1694.2	1854.3	1758.2
60°	0.0	0.0	0.0	0.7	2.8	4.9	11.1	309.7	1738.7	1908.6	1862.6
62.5°	0.0	0.0	0.0	0.0	0.7	2.1	7.7	279.8	1648.9	1904.4	1963.6
65°	0.0	0.0	0.0	0.0	0.0	0.0	4.9	221.3	1483.3	1804.9	1907.9
67.5°	0.0	0.0	0.0	0.0	0.0	0.0	2.8	153.1	1298.8	1679.6	1805.6
70°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	92.6	1048.3	1472.8	1531.3
72.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	39.7	748.3	1169.4	1256.4
75°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	16.0	462.9	854.8	961.9
77.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	6.3	300.0	647.3	730.2
80°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1.4	160.1	405.8	471.9
82.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	69.6	246.4	284.0
85°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	22.3	149.7	170.5
87.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	23.0	30.6
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):

	285°	295°	305°	315°	325°	335°	345°	355°	359°	360°
0°	987.0	987.0	987.0	987.0	987.0	987.0	987.0	987.0	987.0	987.0
2.5°	1062.9	1083.1	1090.7	1078.9	1080.3	1055.9	1052.4	1018.3	1004.4	1007.2
5°	1111.6	1140.8	1156.8	1143.6	1113.7	1067.0	1024.6	984.2	959.2	946.6
7.5°	1100.5	1133.2	1153.4	1165.9	1131.8	1056.6	991.9	916.0	884.0	884.7
10°	1039.2	1107.4	1148.5	1132.5	1116.5	1041.3	941.1	858.9	830.4	833.2
12.5°	989.8	1065.7	1090.0	1102.5	1069.8	1010.0	942.5	848.5	816.5	797.0
15°	959.2	1015.5	1016.9	1036.4	1023.2	1023.2	957.1	865.2	837.4	815.8
17.5°	959.2	971.7	970.3	977.3	999.5	1026.0	994.0	932.7	877.7	874.2
20°	980.7	941.8	932.7	935.5	954.3	1032.9	1075.4	998.8	964.0	952.9
22.5°	1030.9	945.2	890.3	880.5	938.3	1032.2	1127.6	1103.2	1042.7	1033.6
25°	1099.8	939.0	879.1	866.6	910.4	1057.3	1199.3	1204.2	1149.2	1130.4
27.5°	1165.2	966.8	877.7	874.9	932.7	1051.7	1248.7	1284.9	1223.0	1207.7
30°	1187.5	994.7	903.5	866.6	941.1	1071.9	1247.3	1342.0	1301.6	1305.1
32.5°	1213.9	1022.5	906.3	891.6	976.6	1104.6	1287.0	1433.9	1404.6	1363.6
35°	1252.9	1060.1	932.7	919.5	1001.6	1133.9	1295.4	1501.4	1496.5	1448.5
37.5°	1286.3	1097.0	987.7	989.8	1078.2	1181.2	1332.2	1584.2	1575.9	1543.1
40°	1310.0	1148.5	1073.3	1078.9	1145.0	1234.1	1397.7	1626.0	1687.9	1639.9
42.5°	1313.5	1194.4	1171.5	1216.0	1278.0	1316.2	1424.1	1654.5	1743.6	1712.3
45°	1326.7	1267.5	1331.5	1364.3	1415.1	1388.6	1422.7	1703.2	1747.8	1731.8
47.5°	1378.2	1400.5	1481.2	1580.7	1598.8	1511.8	1456.1	1710.9	1771.5	1769.4
50°	1431.8	1543.1	1656.6	1722.7	1745.7	1596.7	1487.5	1704.6	1802.8	1786.1
52.5°	1491.6	1667.0	1830.6	1912.1	1899.5	1690.7	1523.0	1755.4	1860.5	1855.0
55°	1529.2	1722.7	1942.7	2056.1	2046.4	1795.8	1635.7	1828.5	1936.4	1922.5
57.5°	1628.8	1813.2	2054.1	2107.0	2132.7	1933.6	1714.4	1948.3	1999.8	2015.1
60°	1710.9	1872.4	2083.3	2159.9	2168.9	2015.8	1852.2	2071.5	2080.5	2029.0
62.5°	1831.3	1895.4	2021.3	2090.2	2136.9	2062.4	1976.1	2137.6	2079.1	2075.6
65°	1919.7	1820.2	1905.8	1944.1	1974.0	1991.4	2100.7	2182.8	2053.4	1985.8
67.5°	1870.3	1678.2	1662.2	1664.3	1673.3	1778.4	2058.9	2072.1	1910.0	1854.3
70°	1646.2	1376.8	1355.2	1371.9	1326.7	1453.4	1889.8	1883.5	1685.1	1627.4
72.5°	1331.5	1003.7	966.8	989.8	1000.2	1134.6	1589.8	1428.3	1229.2	1184.0
75°	1058.0	735.7	620.9	676.6	712.1	826.2	1241.8	970.3	858.2	797.0
77.5°	831.1	556.8	483.1	460.8	493.5	600.7	903.5	509.5	449.6	421.1
80°	526.9	409.3	444.1	412.1	426.0	428.8	470.5	231.8	184.5	182.4
82.5°	317.4	279.8	332.7	183.1	333.4	297.9	195.6	105.1	93.3	93.3
85°	224.8	173.3	114.8	74.5	148.3	163.6	75.9	54.3	47.3	45.9
87.5°	112.8	53.6	25.8	16.7	18.8	30.6	9.0	4.2	4.2	3.5
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

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