

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: P228137

Luminaire Tested: **ISC-AF-1200-LED-E1-SL2-7060-ULG**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P228137
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P29761)-DOWNLIGHT AND
Test Lab: INNOVATION CENTER-P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: MCGRAW-EDISON
Catalog Number: ISC-AF-1200-LED-E1-SL2-7060-ULG
Description: IMPACT ELITE LED CYLINDER LUMINAIRE WITH UPLIGHT
LIGHT SQUARE WITH ACCUED OPTICS-TYPE II W/SPILL CONTROL, WITH UPLIGHT
GLOW
Light Source: (16) 5700K CCT, 70 CRI LEDs and (1) UPLIGHT LED
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 7651.2 lumens
Efficiency: N/A
Efficacy: 92.5 lumens/watt
Luminous Opening: Rectangular w/ Sides (W: 0.5' x L: 0.5' x H: 0.54')
IES Classification: Type III - Medium - Non-Cutoff
BUG Rating: B1 - U5 - G2

Input Watts (W): 82.7
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

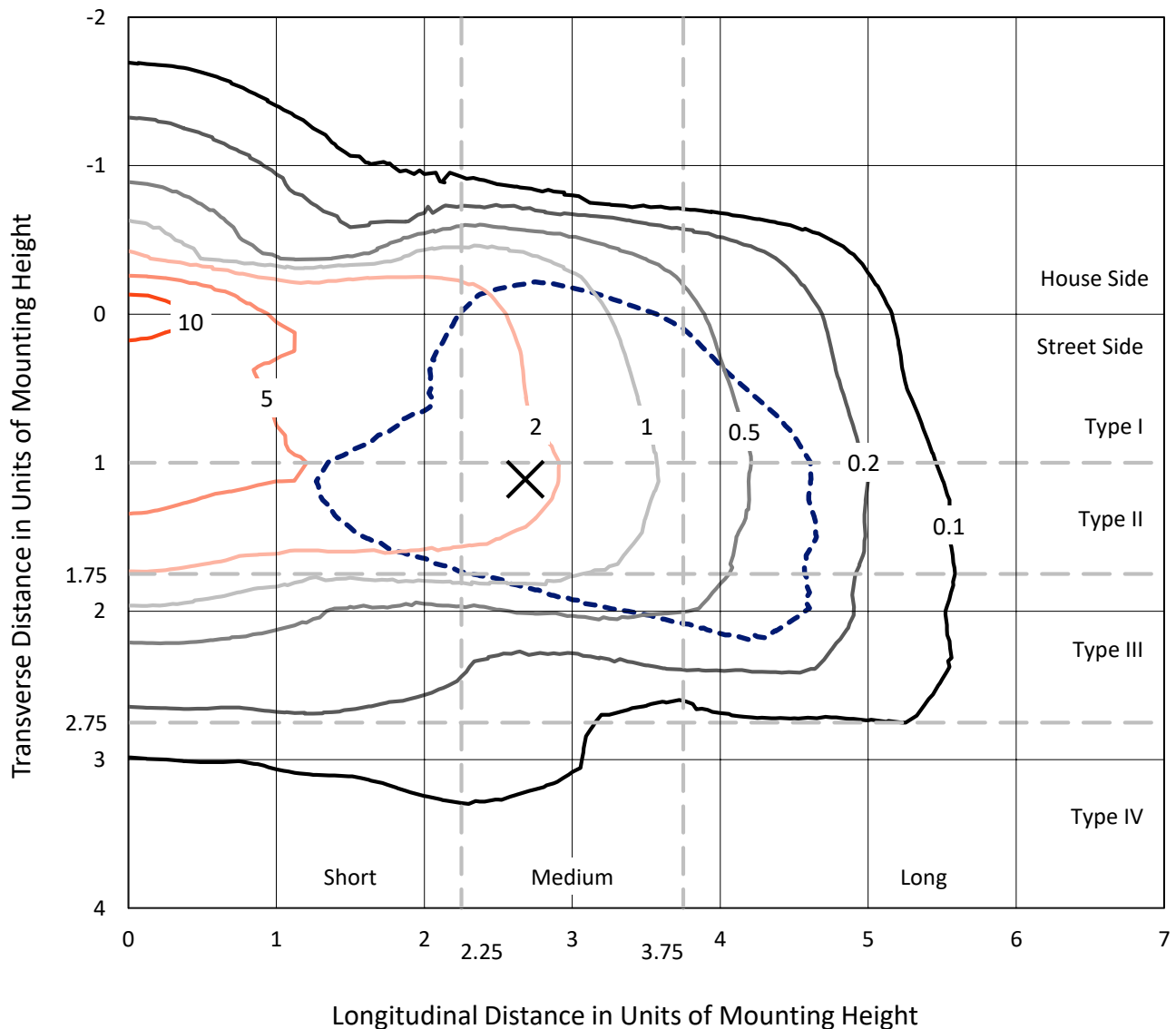


REPORT NUMBER: P228137

CATALOG NUMBER: ISC-AF-1200-LED-E1-SL2-7060-ULG

Iso-Footcandle Lines of Horizontal Illumination

× Max cd
 - - - 1/2 Max cd

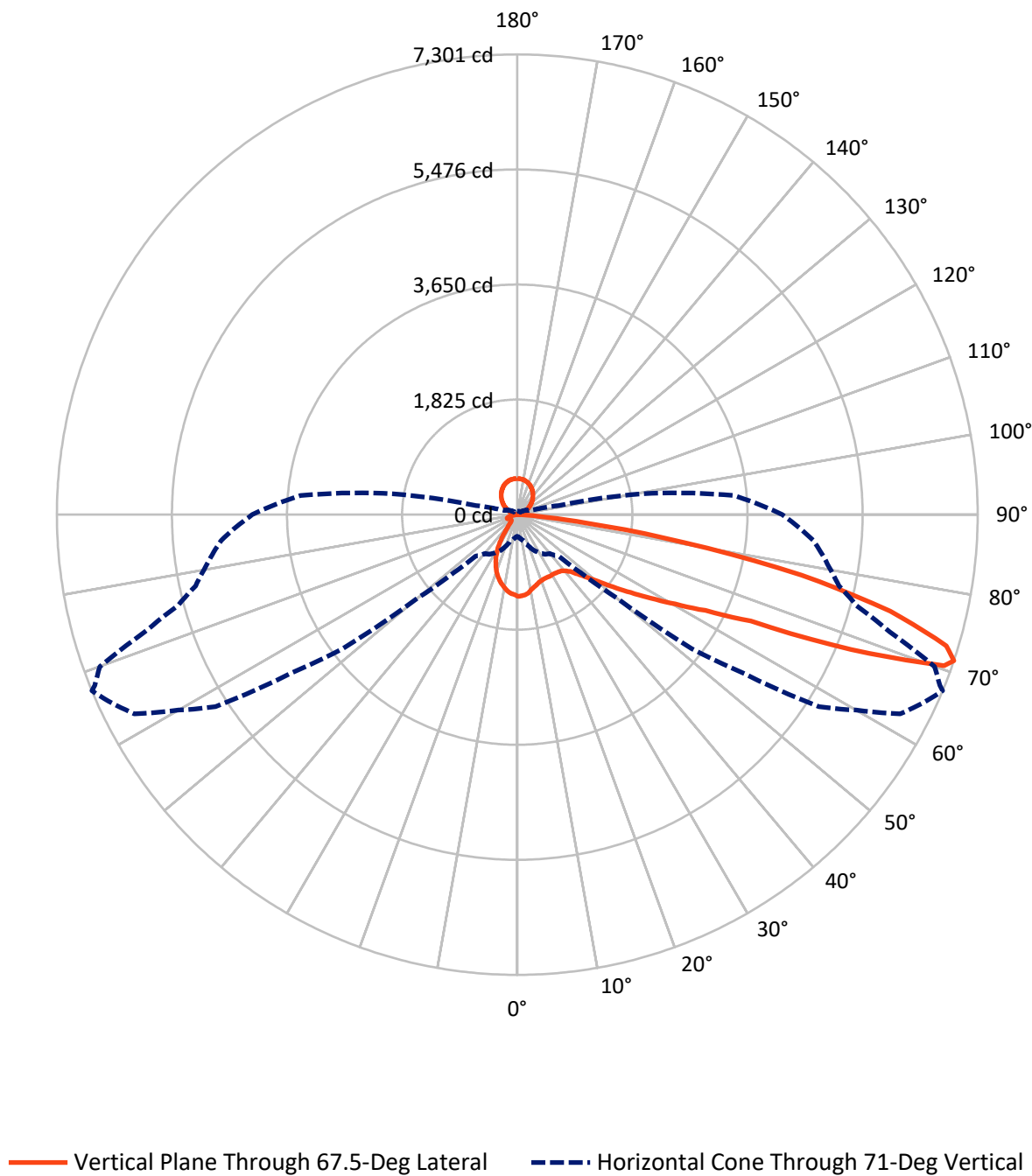


Based on 10 foot mounting height. Maximum calculated value = 13 fc
 Type III - Medium - Non-Cutoff

REPORT NUMBER: P228137

CATALOG NUMBER: ISC-AF-1200-LED-E1-SL2-7060-ULG

Luminous Intensity Polar Plot



REPORT NUMBER: P228137

CATALOG NUMBER: ISC-AF-1200-LED-E1-SL2-7060-ULG

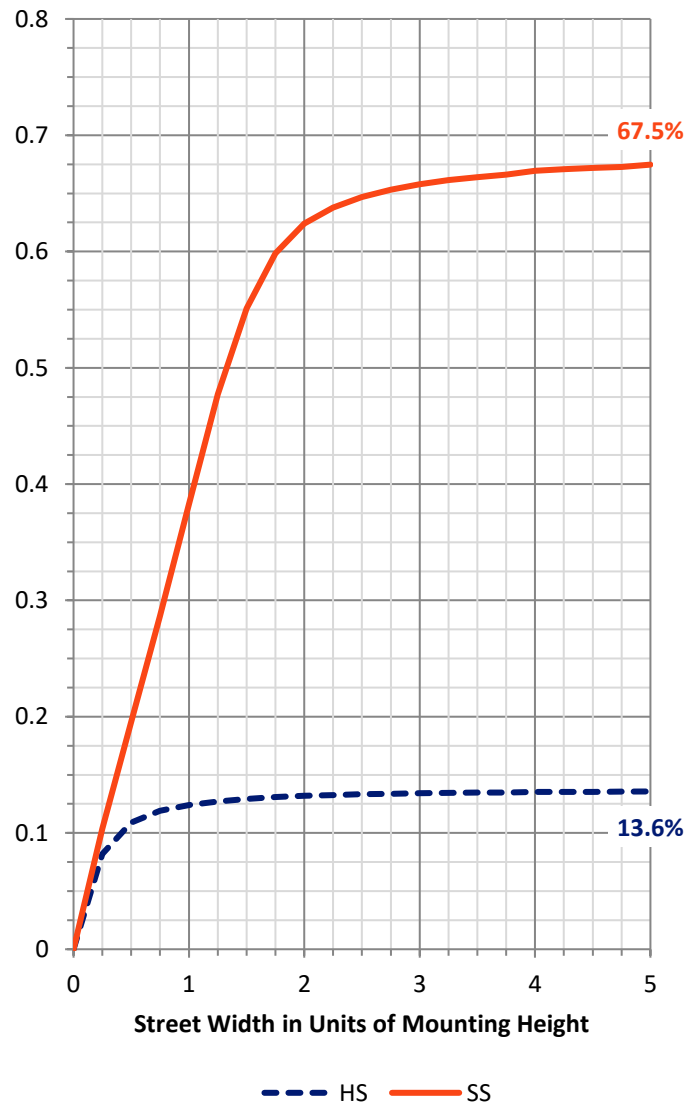
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	1049.0	713.1	1762.1
	% Fixture	13.7	9.3	23.0
Street Side	Lumens	5176.0	713.1	5889.1
	% Fixture	67.7	9.3	77.0
Total	Lumens	6225.0	1426.2	7651.2
	% Fixture	81.4	18.6	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	113.2	1.5
10°-20°	270.8	3.5
20°-30°	368.3	4.8
30°-40°	503.3	6.6
40°-50°	758.4	9.9
50°-60°	1201.9	15.7
60°-70°	1591.2	20.8
70°-80°	1267.6	16.6
80°-90°	150.3	2.0
90°-100°	4.7	0.1
100°-110°	69.0	0.9
110°-120°	153.0	2.0
120°-130°	223.9	2.9
130°-140°	265.6	3.5
140°-150°	269.3	3.5
150°-160°	231.1	3.0
160°-170°	155.1	2.0
170°-180°	54.3	0.7
0°-90°	6225.0	81.4
0°-180°	7651.2	100.0

Coefficient of Utilization



REPORT NUMBER: P228137

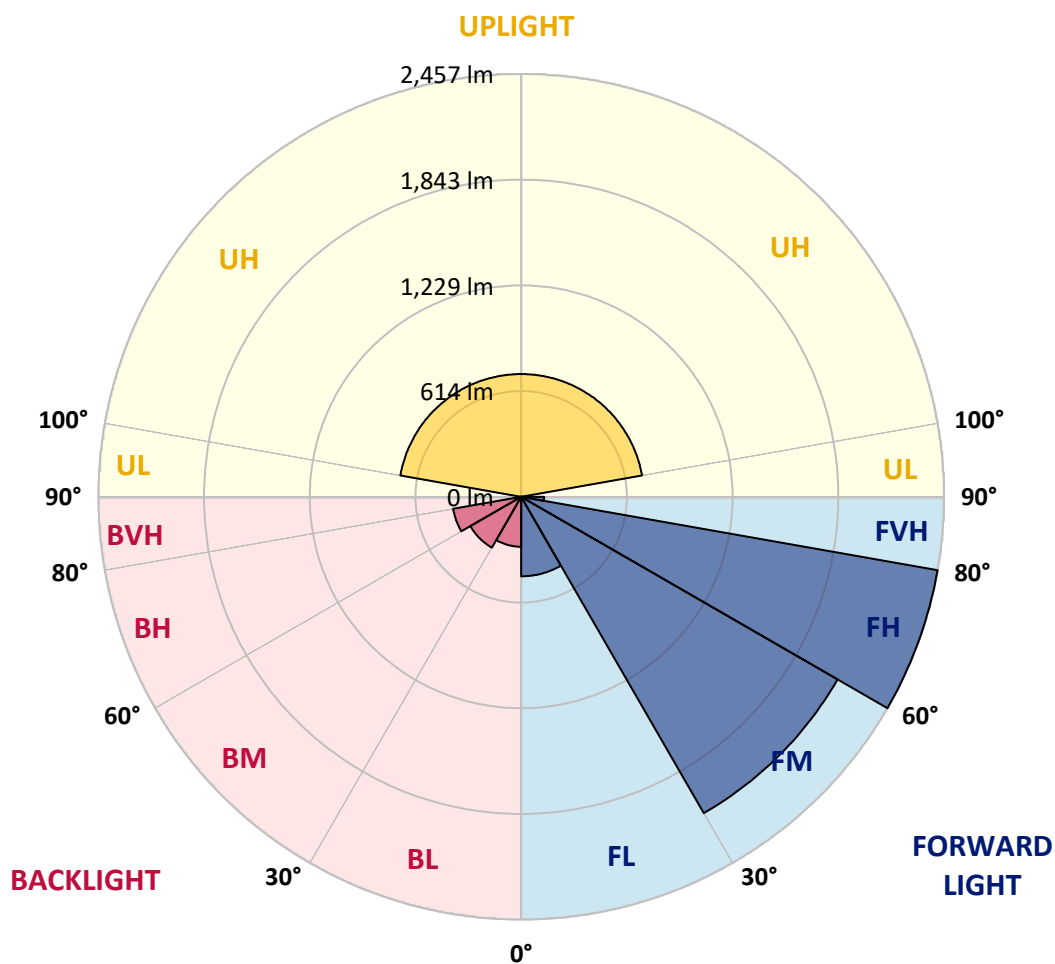
CATALOG NUMBER: ISC-AF-1200-LED-E1-SL2-7060-ULG

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	461.9	6.0			
FM	(30°-60°)	2122.8	27.7			
FH	(60°-80°)	2457.3	32.1			G2/5000
FVH	(80°-90°)	134.0	1.8			G2/225
BL	(0°-30°)	290.4	3.8	B1/500		
BM	(30°-60°)	340.9	4.5	B1/1000		
BH	(60°-80°)	401.5	5.2	B1/500		G1/500
BVH	(80°-90°)	16.3	0.2			G1/100
UL	(90°-100°)	4.7	0.1		U1/10	
UH	(100°-180°)	713.1	9.3		U4/1000	

BUG Rating: B1-U5-G2

Type III Medium



REPORT NUMBER: P228137

CATALOG NUMBER: ISC-AF-1200-LED-E1-SL2-7060-ULG

CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	37.5°	40°	42.5°	45°	47.5°	50°
0°	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2
2.5°	1273.3	1269.0	1269.0	1275.5	1286.4	1277.7	1284.2	1284.2	1286.4	1292.9	1295.0
5°	1179.9	1171.2	1179.9	1188.6	1212.5	1208.1	1214.6	1221.2	1234.2	1236.4	1253.8
7.5°	1095.1	1090.8	1097.3	1114.7	1145.1	1136.4	1145.1	1153.8	1169.0	1175.5	1192.9
10°	1030.0	1023.4	1032.1	1045.2	1075.6	1073.4	1077.8	1088.6	1106.0	1110.3	1132.1
12.5°	982.1	982.1	986.5	1003.9	1030.0	1027.8	1040.8	1047.3	1062.5	1066.9	1090.8
15°	958.2	951.7	960.4	975.6	1001.7	1001.7	1010.4	1016.9	1038.6	1040.8	1062.5
17.5°	936.5	938.7	940.9	958.2	982.1	977.8	988.7	993.0	1016.9	1012.6	1038.6
20°	936.5	940.9	938.7	949.6	966.9	958.2	971.3	973.5	999.5	993.0	1021.3
22.5°	962.6	966.9	960.4	958.2	964.8	958.2	964.8	969.1	988.7	984.3	1010.4
25°	1008.2	1016.9	1008.2	993.0	986.5	969.1	973.5	980.0	995.2	984.3	1008.2
27.5°	1079.9	1086.4	1071.2	1056.0	1025.6	1006.0	999.5	997.4	1014.7	997.4	1016.9
30°	1162.5	1171.2	1158.2	1129.9	1086.4	1053.9	1040.8	1034.3	1045.2	1019.1	1038.6
32.5°	1251.6	1260.3	1251.6	1229.9	1171.2	1123.4	1106.0	1090.8	1099.5	1064.7	1073.4
35°	1342.8	1351.5	1360.2	1347.2	1271.1	1216.8	1188.6	1175.5	1173.4	1129.9	1132.1
37.5°	1423.2	1431.9	1460.2	1473.2	1403.7	1329.8	1303.7	1275.5	1277.7	1216.8	1216.8
40°	1521.0	1531.9	1568.8	1599.2	1553.6	1464.5	1434.1	1403.7	1403.7	1323.3	1325.5
42.5°	1653.6	1666.6	1690.5	1731.8	1716.6	1625.3	1592.7	1551.4	1555.8	1460.2	1458.0
45°	1840.4	1849.1	1849.1	1875.2	1877.4	1790.5	1768.7	1727.5	1736.1	1614.5	1621.0
47.5°	2083.8	2072.9	2029.5	2044.7	2062.1	1970.8	1951.3	1925.2	1936.0	1805.7	1818.7
50°	2309.8	2301.1	2212.0	2216.4	2279.4	2185.9	2179.4	2146.8	2162.0	2031.7	2051.2
52.5°	2394.5	2379.3	2290.2	2338.0	2514.0	2461.9	2472.8	2457.5	2466.2	2327.2	2322.8
55°	2298.9	2298.9	2244.6	2331.5	2690.0	2718.3	2807.4	2842.1	2879.1	2740.0	2709.6
57.5°	2033.8	2051.2	2059.9	2214.2	2661.8	2783.5	2953.0	3100.7	3289.8	3281.1	3326.7
60°	1594.9	1625.3	1675.3	1927.4	2540.1	2740.0	2959.5	3181.1	3441.9	3609.2	3856.9
62.5°	1119.0	1145.1	1186.4	1360.2	2185.9	2529.2	2846.5	3187.6	3520.1	3783.0	4108.9
65°	760.5	786.6	873.5	969.1	1318.9	1818.7	2303.3	2868.2	3374.5	3863.4	4302.3
67.5°	547.6	562.8	630.1	790.9	877.8	969.1	1149.5	1814.4	2438.0	3422.3	4063.3
70°	410.7	425.9	486.7	664.9	771.4	795.3	838.7	956.1	1114.7	1923.0	2763.9
71°	343.3	365.0	438.9	625.8	767.0	786.6	806.1	875.7	927.8	1360.2	2051.2
72.5°	241.2	256.4	325.9	578.0	736.6	782.2	827.9	825.7	821.4	927.8	1240.7
75°	154.3	154.3	154.3	325.9	786.6	758.3	775.7	869.2	821.4	780.1	817.0
77.5°	121.7	119.5	113.0	163.0	614.9	769.2	814.8	838.7	884.4	814.8	777.9
80°	91.3	89.1	89.1	102.1	284.6	497.6	688.8	764.9	797.5	867.0	790.9
82.5°	47.8	47.8	52.1	60.8	106.5	173.8	356.4	586.7	656.2	660.6	667.1
85°	15.2	13.0	17.4	28.2	45.6	56.5	100.0	236.8	352.0	425.9	449.8
87.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	6.5	8.7	15.2	19.6
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
92.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
95°	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0
97.5°	2.0	2.0	2.0	3.0	4.0	5.2	6.5	7.8	9.0	10.0	11.0
100°	8.0	8.0	10.0	14.0	22.0	24.0	26.0	28.0	30.0	30.5	31.0
102.5°	28.0	28.0	32.0	38.0	45.0	46.2	47.5	48.8	50.0	50.2	50.5
105°	54.0	54.0	56.0	61.0	66.0	67.0	68.0	69.0	70.0	70.2	70.5
107.5°	78.0	77.0	80.0	84.0	88.0	88.8	89.5	90.2	91.0	91.5	92.0

REPORT NUMBER: P228137

CATALOG NUMBER: ISC-AF-1200-LED-E1-SL2-7060-ULG

CANDELA DISTRIBUTION (continued):

	0°	5°	15°	25°	35°	37.5°	40°	42.5°	45°	47.5°	50°
110°	101.0	102.0	103.0	106.0	110.0	110.5	111.0	111.5	112.0	112.5	113.0
112.5°	124.0	124.0	126.0	129.0	132.0	132.5	133.0	133.5	134.0	134.5	135.0
115°	146.0	147.0	149.0	151.0	154.0	154.5	155.0	155.5	156.0	156.5	157.0
117.5°	169.0	170.0	172.0	174.0	177.0	177.5	178.0	178.5	179.0	179.2	179.5
120°	193.0	195.0	196.0	198.0	201.0	201.2	201.5	201.8	202.0	202.5	203.0
122.5°	219.0	220.0	221.0	223.0	226.0	226.2	226.5	226.8	227.0	227.2	227.5
125°	244.0	246.0	247.0	248.0	251.0	251.2	251.5	251.8	252.0	252.2	252.5
127.5°	267.0	269.0	270.0	272.0	274.0	274.5	275.0	275.5	276.0	276.5	277.0
130°	290.0	292.0	293.0	294.0	298.0	298.2	298.5	298.8	299.0	299.5	300.0
132.5°	313.0	314.0	317.0	318.0	321.0	321.2	321.5	321.8	322.0	322.8	323.5
135°	336.0	337.0	339.0	341.0	345.0	345.0	345.0	345.0	345.0	345.8	346.5
137.5°	359.0	360.0	363.0	364.0	367.0	367.0	367.0	367.0	367.0	367.5	368.0
140°	382.0	383.0	385.0	386.0	388.0	388.2	388.5	388.8	389.0	389.2	389.5
142.5°	404.0	406.0	408.0	407.0	410.0	410.0	410.0	410.0	410.0	410.5	411.0
145°	425.0	426.0	428.0	428.0	431.0	431.2	431.5	431.8	432.0	432.5	433.0
147.5°	444.0	444.0	447.0	448.0	452.0	452.2	452.5	452.8	453.0	453.2	453.5
150°	461.0	462.0	464.0	465.0	469.0	469.2	469.5	469.8	470.0	470.2	470.5
152.5°	479.0	480.0	483.0	482.0	485.0	485.2	485.5	485.8	486.0	486.2	486.5
155°	499.0	500.0	502.0	501.0	503.0	503.0	503.0	503.0	503.0	503.2	503.5
157.5°	513.0	515.0	517.0	516.0	519.0	519.0	519.0	519.0	519.0	519.0	519.0
160°	525.0	527.0	529.0	529.0	532.0	532.0	532.0	532.0	532.0	532.0	532.0
162.5°	535.0	536.0	539.0	538.0	541.0	541.0	541.0	541.0	541.0	541.2	541.5
165°	546.0	547.0	549.0	548.0	552.0	552.0	552.0	552.0	552.0	552.2	552.5
167.5°	555.0	556.0	559.0	558.0	561.0	560.8	560.5	560.2	560.0	560.0	560.0
170°	562.0	563.0	566.0	565.0	567.0	566.8	566.5	566.2	566.0	565.8	565.5
172.5°	565.0	566.0	569.0	567.0	569.0	568.8	568.5	568.2	568.0	568.2	568.5
175°	567.0	569.0	570.0	569.0	572.0	572.0	572.0	572.0	572.0	572.2	572.5
177.5°	572.0	573.0	575.0	574.0	578.0	577.8	577.5	577.2	577.0	577.0	577.0
180°	576.0	576.0	576.0	576.0	576.0	576.0	576.0	576.0	576.0	576.0	576.0

REPORT NUMBER: P228137

CATALOG NUMBER: ISC-AF-1200-LED-E1-SL2-7060-ULG

CANDELA DISTRIBUTION (continued):

	52.5°	55°	57.5°	60°	62.5°	65°	67.5°	68°	70°	72.5°	75°
0°	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2
2.5°	1288.5	1297.2	1290.7	1299.4	1288.5	1301.6	1290.7	1297.2	1299.4	1290.7	1301.6
5°	1242.9	1269.0	1260.3	1279.8	1271.1	1288.5	1279.8	1297.2	1297.2	1290.7	1305.9
7.5°	1186.4	1212.5	1214.6	1234.2	1234.2	1255.9	1255.9	1273.3	1282.0	1282.0	1303.7
10°	1129.9	1153.8	1158.2	1179.9	1184.2	1210.3	1210.3	1234.2	1251.6	1258.1	1284.2
12.5°	1086.4	1116.9	1116.9	1140.8	1136.4	1175.5	1179.9	1201.6	1219.0	1234.2	1269.0
15°	1060.4	1088.6	1088.6	1112.5	1108.2	1147.3	1153.8	1175.5	1201.6	1210.3	1258.1
17.5°	1034.3	1062.5	1056.0	1088.6	1086.4	1129.9	1125.6	1158.2	1179.9	1192.9	1247.2
20°	1012.6	1045.2	1040.8	1073.4	1064.7	1112.5	1112.5	1145.1	1166.8	1177.7	1240.7
22.5°	1001.7	1036.5	1027.8	1060.4	1053.9	1101.7	1101.7	1134.3	1158.2	1175.5	1238.5
25°	1001.7	1032.1	1023.4	1060.4	1049.5	1101.7	1099.5	1132.1	1156.0	1171.2	1240.7
27.5°	1006.0	1036.5	1030.0	1064.7	1056.0	1101.7	1106.0	1134.3	1158.2	1175.5	1245.1
30°	1021.3	1049.5	1034.3	1066.9	1060.4	1103.8	1101.7	1132.1	1156.0	1177.7	1245.1
32.5°	1053.9	1069.1	1049.5	1077.8	1064.7	1108.2	1108.2	1129.9	1158.2	1184.2	1245.1
35°	1099.5	1110.3	1079.9	1099.5	1075.6	1119.0	1116.9	1140.8	1162.5	1184.2	1249.4
37.5°	1164.7	1177.7	1129.9	1147.3	1108.2	1142.9	1134.3	1162.5	1184.2	1197.3	1271.1
40°	1262.5	1266.8	1203.8	1216.8	1162.5	1192.9	1171.2	1210.3	1221.2	1229.9	1303.7
42.5°	1382.0	1386.3	1305.9	1314.6	1245.1	1271.1	1234.2	1275.5	1290.7	1288.5	1368.9
45°	1529.7	1531.9	1440.6	1447.1	1366.8	1388.5	1342.8	1377.6	1388.5	1382.0	1464.5
47.5°	1690.5	1707.9	1605.8	1614.5	1529.7	1540.6	1484.1	1523.2	1523.2	1516.7	1601.4
50°	1903.5	1929.5	1810.0	1823.1	1725.3	1734.0	1668.8	1710.1	1705.7	1688.3	1783.9
52.5°	2168.5	2192.4	2066.4	2083.8	1979.5	1983.9	1903.5	1951.3	1938.2	1910.0	2020.8
55°	2492.3	2494.5	2377.1	2392.4	2288.1	2281.5	2181.6	2240.3	2220.7	2181.6	2283.7
57.5°	3011.6	2948.6	2755.2	2750.9	2637.9	2629.2	2501.0	2572.7	2540.1	2457.5	2592.3
60°	3848.2	3867.8	3374.5	3298.5	3087.7	3048.6	2879.1	2961.7	2922.5	2787.8	2920.4
62.5°	4319.7	4630.4	4600.0	4326.2	3783.0	3635.3	3348.4	3446.2	3344.1	3146.4	3270.2
65°	4669.5	5091.1	5334.5	5597.4	5354.0	4749.9	4072.0	4208.9	3959.0	3583.1	3702.6
67.5°	4799.9	5308.4	5821.2	6194.9	6449.1	6494.8	5710.4	5747.3	5132.4	4380.6	4395.8
70°	4117.6	4867.3	5871.2	6344.8	6849.0	7096.7	7179.2	7140.1	6742.5	5677.8	5271.4
71°	3489.7	4397.9	5671.3	6199.3	6844.6	7083.6	7300.9	7227.0	7042.3	6192.7	5569.1
72.5°	2364.1	3504.9	5086.7	5756.0	6616.5	6790.3	7116.2	6985.9	6946.7	6577.3	5847.3
75°	1112.5	1747.0	3309.3	4321.9	5599.5	5766.9	6108.0	5947.2	5845.1	5971.1	5562.6
77.5°	819.2	953.9	1816.5	2685.7	4072.0	4308.8	4602.2	4404.5	4274.1	4400.1	4115.5
80°	745.3	749.6	940.9	1416.7	2429.3	2570.5	2681.4	2520.6	2322.8	2314.1	2051.2
82.5°	686.6	649.7	610.6	749.6	1245.1	1184.2	1095.1	1014.7	788.8	632.3	456.3
85°	436.8	478.0	434.6	410.7	495.4	408.5	323.8	310.7	219.5	147.8	136.9
87.5°	30.4	34.8	41.3	47.8	58.7	47.8	30.4	36.9	21.7	0.0	10.9
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
92.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
95°	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0
97.5°	12.0	13.0	11.5	10.0	8.5	7.0	6.5	6.4	6.0	5.5	5.0
100°	31.5	32.0	31.5	31.0	30.5	30.0	29.2	29.1	28.5	27.8	27.0
102.5°	50.8	51.0	50.8	50.5	50.2	50.0	49.5	49.4	49.0	48.5	48.0
105°	70.8	71.0	71.0	71.0	71.0	71.0	70.5	70.4	70.0	69.5	69.0
107.5°	92.5	93.0	92.8	92.5	92.2	92.0	91.8	91.7	91.5	91.2	91.0

REPORT NUMBER: P228137

CATALOG NUMBER: ISC-AF-1200-LED-E1-SL2-7060-ULG

CANDELA DISTRIBUTION (continued):

	52.5°	55°	57.5°	60°	62.5°	65°	67.5°	68°	70°	72.5°	75°
110°	113.5	114.0	114.0	114.0	114.0	114.0	113.8	113.7	113.5	113.2	113.0
112.5°	135.5	136.0	136.0	136.0	136.0	136.0	135.8	135.7	135.5	135.2	135.0
115°	157.5	158.0	158.0	158.0	158.0	158.0	158.0	158.0	158.0	158.0	158.0
117.5°	179.8	180.0	180.2	180.5	180.8	181.0	180.8	180.7	180.5	180.2	180.0
120°	203.5	204.0	204.0	204.0	204.0	204.0	204.0	204.0	204.0	204.0	204.0
122.5°	227.8	228.0	228.0	228.0	228.0	228.0	228.2	228.3	228.5	228.8	229.0
125°	252.8	253.0	253.2	253.5	253.8	254.0	254.0	254.0	254.0	254.0	254.0
127.5°	277.5	278.0	277.8	277.5	277.2	277.0	277.2	277.3	277.5	277.8	278.0
130°	300.5	301.0	301.0	301.0	301.0	301.0	301.2	301.3	301.5	301.8	302.0
132.5°	324.2	325.0	325.0	325.0	325.0	325.0	325.2	325.3	325.5	325.8	326.0
135°	347.2	348.0	348.0	348.0	348.0	348.0	348.2	348.3	348.5	348.8	349.0
137.5°	368.5	369.0	369.0	369.0	369.0	369.0	369.2	369.3	369.5	369.8	370.0
140°	389.8	390.0	390.0	390.0	390.0	390.0	390.5	390.6	391.0	391.5	392.0
142.5°	411.5	412.0	412.0	412.0	412.0	412.0	412.2	412.3	412.5	412.8	413.0
145°	433.5	434.0	433.8	433.5	433.2	433.0	433.2	433.3	433.5	433.8	434.0
147.5°	453.8	454.0	453.5	453.0	452.5	452.0	452.2	452.3	452.5	452.8	453.0
150°	470.8	471.0	470.5	470.0	469.5	469.0	469.0	469.0	469.0	469.0	469.0
152.5°	486.8	487.0	486.8	486.5	486.2	486.0	486.0	486.0	486.0	486.0	486.0
155°	503.8	504.0	503.8	503.5	503.2	503.0	503.2	503.3	503.5	503.8	504.0
157.5°	519.0	519.0	518.5	518.0	517.5	517.0	517.2	517.3	517.5	517.8	518.0
160°	532.0	532.0	531.5	531.0	530.5	530.0	530.0	530.0	530.0	530.0	530.0
162.5°	541.8	542.0	541.5	541.0	540.5	540.0	539.5	539.4	539.0	538.5	538.0
165°	552.8	553.0	552.2	551.5	550.8	550.0	549.5	549.4	549.0	548.5	548.0
167.5°	560.0	560.0	559.5	559.0	558.5	558.0	558.2	558.3	558.5	558.8	559.0
170°	565.2	565.0	564.8	564.5	564.2	564.0	564.5	564.6	565.0	565.5	566.0
172.5°	568.8	569.0	568.5	568.0	567.5	567.0	567.2	567.3	567.5	567.8	568.0
175°	572.8	573.0	572.2	571.5	570.8	570.0	569.5	569.4	569.0	568.5	568.0
177.5°	577.0	577.0	576.2	575.5	574.8	574.0	574.0	574.0	574.0	574.0	574.0
180°	576.0	576.0	576.0	576.0	576.0	576.0	576.0	576.0	576.0	576.0	576.0

REPORT NUMBER: P228137

CATALOG NUMBER: ISC-AF-1200-LED-E1-SL2-7060-ULG

CANDELA DISTRIBUTION (continued):

	77.5°	80°	85°	90°	95°	100°	102.5°	105°	107.5°	110°	112.5°
0°	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2
2.5°	1286.4	1297.2	1301.6	1299.4	1295.0	1290.7	1275.5	1286.4	1271.1	1282.0	1269.0
5°	1292.9	1308.1	1310.3	1305.9	1301.6	1292.9	1266.8	1282.0	1264.6	1273.3	1253.8
7.5°	1290.7	1314.6	1316.8	1312.4	1303.7	1288.5	1262.5	1273.3	1245.1	1251.6	1225.5
10°	1279.8	1314.6	1316.8	1305.9	1292.9	1269.0	1238.5	1242.9	1214.6	1214.6	1179.9
12.5°	1269.0	1310.3	1321.1	1305.9	1284.2	1251.6	1216.8	1212.5	1179.9	1177.7	1138.6
15°	1269.0	1314.6	1329.8	1310.3	1277.7	1232.0	1190.7	1182.1	1145.1	1134.3	1090.8
17.5°	1266.8	1314.6	1336.3	1310.3	1271.1	1212.5	1160.3	1151.6	1103.8	1086.4	1036.5
20°	1264.6	1318.9	1340.7	1305.9	1251.6	1188.6	1129.9	1112.5	1060.4	1032.1	973.5
22.5°	1262.5	1327.6	1345.0	1301.6	1238.5	1158.2	1097.3	1066.9	1006.0	969.1	899.6
25°	1273.3	1338.5	1347.2	1297.2	1219.0	1125.6	1060.4	1019.1	951.7	903.9	821.4
27.5°	1277.7	1349.4	1351.5	1288.5	1195.1	1090.8	1021.3	964.8	888.7	830.0	736.6
30°	1290.7	1351.5	1345.0	1271.1	1166.8	1047.3	975.6	906.1	821.4	745.3	634.5
32.5°	1295.0	1358.1	1340.7	1251.6	1138.6	1003.9	923.5	843.1	741.0	651.9	517.1
35°	1303.7	1362.4	1336.3	1240.7	1108.2	958.2	869.2	777.9	660.6	547.6	393.3
37.5°	1316.8	1382.0	1347.2	1236.4	1093.0	919.1	808.3	710.5	565.0	432.4	260.7
40°	1349.4	1421.1	1366.8	1242.9	1082.1	886.5	749.6	641.0	456.3	319.4	180.4
42.5°	1414.6	1488.4	1416.7	1275.5	1088.6	858.3	688.8	567.1	345.5	228.2	149.9
45°	1512.3	1575.3	1499.3	1329.8	1114.7	843.1	632.3	491.1	247.7	182.5	136.9
47.5°	1655.7	1716.6	1621.0	1416.7	1160.3	836.6	573.6	410.7	191.2	165.1	132.5
50°	1844.8	1916.5	1797.0	1553.6	1245.1	843.1	510.6	334.6	167.3	160.8	130.4
52.5°	2077.3	2146.8	2027.3	1755.7	1384.1	880.0	443.3	291.2	158.6	158.6	128.2
55°	2340.2	2438.0	2320.7	2036.0	1599.2	960.4	402.0	276.0	158.6	160.8	126.0
57.5°	2650.9	2733.5	2629.2	2305.4	1857.8	1093.0	406.3	291.2	158.6	160.8	123.9
60°	2955.1	3057.3	2937.8	2648.8	2153.3	1292.9	495.4	369.4	165.1	167.3	123.9
62.5°	3272.4	3350.6	3252.8	2948.6	2488.0	1540.6	673.6	534.5	191.2	197.7	132.5
65°	3620.0	3748.2	3646.1	3396.2	2961.7	1936.0	1012.6	801.8	282.5	230.3	145.6
67.5°	4221.9	4274.1	4224.1	3996.0	3515.7	2262.0	1206.0	814.8	282.5	223.8	163.0
70°	5036.8	4919.4	4695.6	4269.7	3574.4	2029.5	864.8	497.6	241.2	212.9	171.7
71°	5225.8	5045.5	4715.2	4202.4	3452.7	1831.7	671.4	393.3	226.0	208.6	171.7
72.5°	5341.0	5071.5	4571.8	4004.6	3213.7	1442.8	443.3	308.6	206.4	197.7	165.1
75°	5191.0	4693.5	4037.2	3465.8	2631.4	749.6	278.1	234.7	176.0	171.7	143.4
77.5°	4122.0	3685.2	2979.0	2518.4	1692.7	332.5	199.9	178.2	139.1	134.7	110.8
80°	1923.0	1542.8	903.9	775.7	532.4	195.6	136.9	121.7	100.0	95.6	78.2
82.5°	349.8	262.9	204.3	197.7	178.2	115.2	80.4	73.9	63.0	60.8	50.0
85°	119.5	115.2	86.9	86.9	89.1	60.8	45.6	43.5	32.6	32.6	21.7
87.5°	2.2	10.9	10.9	15.2	13.0	10.9	4.3	6.5	2.2	6.5	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
92.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
95°	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0
97.5°	4.8	4.5	4.0	4.0	4.0	4.5	4.8	5.0	5.5	6.0	6.5
100°	26.8	26.5	26.0	25.0	26.0	26.5	26.8	27.0	27.8	28.5	29.2
102.5°	48.2	48.5	49.0	48.0	49.0	48.5	48.2	48.0	48.5	49.0	49.5
105°	69.5	70.0	71.0	69.0	71.0	70.0	69.5	69.0	69.5	70.0	70.5
107.5°	91.2	91.5	92.0	91.0	92.0	91.5	91.2	91.0	91.2	91.5	91.8

REPORT NUMBER: P228137

REPORT N

CATALOG NUMBER: ISC-AF-1200-LED-E1-SL2-7060-ULG

CATALOG

CANDELA DISTRIBUTION (continued):

CANDELA

	77.5°	80°	85°	90°	95°	100°	102.5°	105°	107.5°	110°	112.5°	
110°	113.2	113.5	114.0	113.0	114.0	113.5	113.2	113.0	113.2	113.5	113.8	0°
112.5°	135.5	136.0	137.0	135.0	137.0	136.0	135.5	135.0	135.2	135.5	135.8	2.5°
115°	158.5	159.0	160.0	159.0	160.0	159.0	158.5	158.0	158.0	158.0	158.0	5°
117.5°	180.5	181.0	182.0	180.0	182.0	181.0	180.5	180.0	180.2	180.5	180.8	7.5°
120°	204.5	205.0	206.0	204.0	206.0	205.0	204.5	204.0	204.0	204.0	204.0	10°
122.5°	230.0	231.0	233.0	232.0	233.0	231.0	230.0	229.0	228.8	228.5	228.2	12.5°
125°	254.8	255.5	257.0	256.0	257.0	255.5	254.8	254.0	254.0	254.0	254.0	15°
127.5°	278.8	279.5	281.0	278.0	281.0	279.5	278.8	278.0	277.8	277.5	277.2	17.5°
130°	302.8	303.5	305.0	303.0	305.0	303.5	302.8	302.0	301.8	301.5	301.2	20°
132.5°	326.8	327.5	329.0	327.0	329.0	327.5	326.8	326.0	325.8	325.5	325.2	22.5°
135°	349.5	350.0	351.0	350.0	351.0	350.0	349.5	349.0	348.8	348.5	348.2	25°
137.5°	371.0	372.0	374.0	372.0	374.0	372.0	371.0	370.0	369.8	369.5	369.2	27.5°
140°	393.0	394.0	396.0	394.0	396.0	394.0	393.0	392.0	391.5	391.0	390.5	30°
142.5°	413.8	414.5	416.0	415.0	416.0	414.5	413.8	413.0	412.8	412.5	412.2	32.5°
145°	434.8	435.5	437.0	435.0	437.0	435.5	434.8	434.0	433.8	433.5	433.2	35°
147.5°	453.8	454.5	456.0	453.0	456.0	454.5	453.8	453.0	452.8	452.5	452.2	37.5°
150°	470.0	471.0	473.0	470.0	473.0	471.0	470.0	469.0	469.0	469.0	469.0	40°
152.5°	486.8	487.5	489.0	486.0	489.0	487.5	486.8	486.0	486.0	486.0	486.0	42.5°
155°	504.8	505.5	507.0	505.0	507.0	505.5	504.8	504.0	503.8	503.5	503.2	45°
157.5°	519.2	520.5	523.0	520.0	523.0	520.5	519.2	518.0	517.8	517.5	517.2	47.5°
160°	530.8	531.5	533.0	531.0	533.0	531.5	530.8	530.0	530.0	530.0	530.0	50°
162.5°	538.5	539.0	540.0	537.0	540.0	539.0	538.5	538.0	538.5	539.0	539.5	52.5°
165°	548.5	549.0	550.0	548.0	550.0	549.0	548.5	548.0	548.5	549.0	549.5	55°
167.5°	560.0	561.0	563.0	561.0	563.0	561.0	560.0	559.0	558.8	558.5	558.2	57.5°
170°	567.2	568.5	571.0	569.0	571.0	568.5	567.2	566.0	565.5	565.0	564.5	60°
172.5°	568.8	569.5	571.0	568.0	571.0	569.5	568.8	568.0	567.8	567.5	567.2	62.5°
175°	568.8	569.5	571.0	568.0	571.0	569.5	568.8	568.0	568.5	569.0	569.5	65°
177.5°	574.8	575.5	577.0	574.0	577.0	575.5	574.8	574.0	574.0	574.0	574.0	67.5°
180°	576.0	576.0	576.0	576.0	576.0	576.0	576.0	576.0	576.0	576.0	576.0	70°
												71°
												72.5°
												75°
												77.5°
												80°
												82.5°
												85°
												87.5°
												90°
												92.5°
												95°
												97.5°
												100°
												102.5°
												105°
												107.5°

NUMBER: P228137

REPORT NUMBER: P

NUMBER: ISC-AF-1200-LED-E1-SL2-7060-ULG

CATALOG NUMBER:

DISTRIBUTION (continued):

CANDELA DISTRIBUTION

115°	117.5°	120°	122.5°	125°	127.5°	130°	135°	145°	155°	165°	110°	115°
1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	1297.2	110°	114.0
1279.8	1262.5	1277.7	1262.5	1271.1	1253.8	1264.6	1258.1	1258.1	1251.6	1247.2	112.5°	136.0
1260.3	1238.5	1249.4	1232.0	1240.7	1214.6	1221.2	1210.3	1188.6	1175.5	1158.2	115°	158.0
1232.0	1199.4	1208.1	1182.1	1188.6	1153.8	1160.3	1140.8	1099.5	1073.4	1047.3	117.5°	181.0
1182.1	1151.6	1153.8	1121.2	1119.0	1084.3	1077.8	1051.7	990.8	947.4	912.6	120°	204.0
1132.1	1097.3	1093.0	1053.9	1047.3	1006.0	997.4	956.1	867.0	782.2	727.9	122.5°	228.0
1079.9	1036.5	1023.4	982.1	958.2	923.5	899.6	838.7	710.5	599.7	528.0	125°	254.0
1021.3	964.8	945.2	897.4	862.6	810.5	775.7	693.2	528.0	408.5	358.5	127.5°	277.0
945.2	884.4	849.6	788.8	743.1	680.1	636.7	530.2	352.0	291.2	284.6	130°	301.0
860.5	788.8	745.3	669.3	612.8	545.4	475.9	358.5	249.9	236.8	245.5	132.5°	325.0
771.4	682.3	625.8	532.4	456.3	378.1	312.9	239.0	204.3	202.1	215.1	135°	348.0
664.9	562.8	482.4	371.6	302.0	241.2	212.9	189.0	173.8	176.0	189.0	137.5°	369.0
547.6	415.0	330.3	232.5	202.1	176.0	171.7	163.0	156.4	160.8	169.5	140°	390.0
408.5	265.1	212.9	167.3	165.1	149.9	154.3	149.9	147.8	149.9	156.4	142.5°	412.0
276.0	176.0	167.3	143.4	147.8	136.9	143.4	141.2	139.1	139.1	143.4	145°	433.0
191.2	145.6	149.9	132.5	139.1	130.4	136.9	134.7	132.5	130.4	132.5	147.5°	452.0
158.6	132.5	139.1	126.0	132.5	123.9	130.4	128.2	126.0	121.7	121.7	150°	469.0
145.6	126.0	132.5	119.5	128.2	117.3	126.0	121.7	117.3	113.0	115.2	152.5°	486.0
141.2	121.7	128.2	115.2	123.9	113.0	119.5	117.3	108.6	106.5	108.6	155°	503.0
136.9	119.5	126.0	113.0	119.5	108.6	115.2	110.8	102.1	100.0	102.1	157.5°	517.0
134.7	115.2	121.7	108.6	115.2	106.5	110.8	106.5	97.8	95.6	95.6	160°	530.0
132.5	113.0	119.5	104.3	110.8	97.8	104.3	100.0	91.3	89.1	89.1	162.5°	540.0
132.5	110.8	115.2	100.0	106.5	93.4	97.8	93.4	89.1	84.7	84.7	165°	550.0
130.4	106.5	113.0	95.6	100.0	89.1	93.4	89.1	82.6	80.4	80.4	167.5°	558.0
130.4	104.3	110.8	93.4	97.8	84.7	89.1	84.7	78.2	76.1	76.1	170°	564.0
136.9	108.6	113.0	95.6	97.8	84.7	86.9	80.4	73.9	73.9	71.7	172.5°	567.0
149.9	121.7	121.7	100.0	100.0	84.7	86.9	78.2	69.5	69.5	69.5	175°	570.0
163.0	134.7	132.5	106.5	104.3	84.7	84.7	73.9	65.2	65.2	65.2	177.5°	574.0
171.7	141.2	136.9	108.6	104.3	82.6	80.4	69.5	60.8	60.8	60.8	180°	576.0
169.5	141.2	134.7	106.5	100.0	78.2	78.2	67.4	58.7	58.7	56.5		
160.8	132.5	126.0	100.0	95.6	73.9	73.9	63.0	54.3	54.3	52.1		
136.9	113.0	106.5	84.7	80.4	65.2	63.0	52.1	47.8	45.6	45.6		
106.5	89.1	82.6	67.4	65.2	52.1	50.0	43.5	39.1	39.1	36.9		
76.1	63.0	58.7	45.6	41.3	34.8	36.9	32.6	30.4	30.4	28.2		
45.6	32.6	32.6	26.1	28.2	21.7	23.9	23.9	21.7	17.4	17.4		
23.9	15.2	19.6	10.9	15.2	6.5	10.9	8.7	8.7	6.5	6.5		
4.3	0.0	2.2	0.0	2.2	0.0	0.0	0.0	0.0	0.0	0.0		
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0		
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0		
1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0		
7.0	8.5	10.0	11.5	13.0	12.0	11.0	9.0	4.0	3.0	2.0		
30.0	30.5	31.0	31.5	32.0	31.5	31.0	30.0	22.0	14.0	10.0		
50.0	50.2	50.5	50.8	51.0	50.8	50.5	50.0	45.0	38.0	32.0		
71.0	71.0	71.0	71.0	71.0	70.8	70.5	70.0	66.0	61.0	56.0		
92.0	92.2	92.5	92.8	93.0	92.5	92.0	91.0	88.0	84.0	80.0		

'228137
ISC-AF-1200-LED-E1-SL2-7060-ULG

REPORT NUMBER: P228137
CATALOG NUMBER: ISC-AF-12

TION (continued):

CANDELA DISTRIBUTION (con

117.5°	120°	122.5°	125°	127.5°	130°	135°	145°	155°	165°		175°	180°
114.0	114.0	114.0	114.0	113.5	113.0	112.0	110.0	106.0	103.0	0°	1297.2	1297.2
136.0	136.0	136.0	136.0	135.5	135.0	134.0	132.0	129.0	126.0	2.5°	1234.2	1236.4
158.0	158.0	158.0	158.0	157.5	157.0	156.0	154.0	151.0	149.0	5°	1149.5	1153.8
180.8	180.5	180.2	180.0	179.8	179.5	179.0	177.0	174.0	172.0	7.5°	1027.8	1034.3
204.0	204.0	204.0	204.0	203.5	203.0	202.0	201.0	198.0	196.0	10°	882.2	886.5
228.0	228.0	228.0	228.0	227.8	227.5	227.0	226.0	223.0	221.0	12.5°	695.3	695.3
253.8	253.5	253.2	253.0	252.8	252.5	252.0	251.0	248.0	247.0	15°	486.7	491.1
277.2	277.5	277.8	278.0	277.5	277.0	276.0	274.0	272.0	270.0	17.5°	341.1	343.3
301.0	301.0	301.0	301.0	300.5	300.0	299.0	298.0	294.0	293.0	20°	286.8	289.0
325.0	325.0	325.0	325.0	324.2	323.5	322.0	321.0	318.0	317.0	22.5°	256.4	258.6
348.0	348.0	348.0	348.0	347.2	346.5	345.0	345.0	341.0	339.0	25°	228.2	230.3
369.0	369.0	369.0	369.0	368.5	368.0	367.0	367.0	364.0	363.0	27.5°	197.7	199.9
390.0	390.0	390.0	390.0	389.8	389.5	389.0	388.0	386.0	385.0	30°	178.2	180.4
412.0	412.0	412.0	412.0	411.5	411.0	410.0	410.0	407.0	408.0	32.5°	160.8	163.0
433.2	433.5	433.8	434.0	433.5	433.0	432.0	431.0	428.0	428.0	35°	145.6	145.6
452.5	453.0	453.5	454.0	453.8	453.5	453.0	452.0	448.0	447.0	37.5°	134.7	134.7
469.5	470.0	470.5	471.0	470.8	470.5	470.0	469.0	465.0	464.0	40°	123.9	123.9
486.2	486.5	486.8	487.0	486.8	486.5	486.0	485.0	482.0	483.0	42.5°	117.3	117.3
503.2	503.5	503.8	504.0	503.8	503.5	503.0	503.0	501.0	502.0	45°	110.8	110.8
517.5	518.0	518.5	519.0	519.0	519.0	519.0	519.0	516.0	517.0	47.5°	104.3	104.3
530.5	531.0	531.5	532.0	532.0	532.0	532.0	532.0	529.0	529.0	50°	97.8	100.0
540.5	541.0	541.5	542.0	541.8	541.5	541.0	541.0	538.0	539.0	52.5°	91.3	91.3
550.8	551.5	552.2	553.0	552.8	552.5	552.0	552.0	548.0	549.0	55°	84.7	84.7
558.5	559.0	559.5	560.0	560.0	560.0	560.0	561.0	558.0	559.0	57.5°	78.2	80.4
564.2	564.5	564.8	565.0	565.2	565.5	566.0	567.0	565.0	566.0	60°	73.9	73.9
567.5	568.0	568.5	569.0	568.8	568.5	568.0	569.0	567.0	569.0	62.5°	69.5	69.5
570.8	571.5	572.2	573.0	572.8	572.5	572.0	572.0	569.0	570.0	65°	67.4	67.4
574.8	575.5	576.2	577.0	577.0	577.0	577.0	578.0	574.0	575.0	67.5°	63.0	63.0
576.0	576.0	576.0	576.0	576.0	576.0	576.0	576.0	576.0	576.0	70°	58.7	58.7
										71°	56.5	56.5
										72.5°	52.1	52.1
										75°	45.6	43.5
										77.5°	36.9	36.9
										80°	28.2	26.1
										82.5°	17.4	15.2
										85°	6.5	4.3
										87.5°	0.0	0.0
										90°	0.0	0.0
										92.5°	0.0	0.0
										95°	1.0	1.0
										97.5°	2.0	2.0
										100°	8.0	8.0
										102.5°	28.0	28.0
										105°	54.0	54.0
										107.5°	77.0	78.0



REPORT NUMBER: P228137

CATALOG NUMBER: ISC-AF-1200-LED-E1

CANDELA DISTRIBUTION (continued):

	175°	180°
110°	102.0	101.0
112.5°	124.0	124.0
115°	147.0	146.0
117.5°	170.0	169.0
120°	195.0	193.0
122.5°	220.0	219.0
125°	246.0	244.0
127.5°	269.0	267.0
130°	292.0	290.0
132.5°	314.0	313.0
135°	337.0	336.0
137.5°	360.0	359.0
140°	383.0	382.0
142.5°	406.0	404.0
145°	426.0	425.0
147.5°	444.0	444.0
150°	462.0	461.0
152.5°	480.0	479.0
155°	500.0	499.0
157.5°	515.0	513.0
160°	527.0	525.0
162.5°	536.0	535.0
165°	547.0	546.0
167.5°	556.0	555.0
170°	563.0	562.0
172.5°	566.0	565.0
175°	569.0	567.0
177.5°	573.0	572.0
180°	576.0	576.0

(END OF REPORT)

