

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: CORELITE

Report Number: P395866

Luminaire Tested: **I3-WL-40L83050-1D-UNV-W2A-W-4 (5000K)**

Issue Date: 5/6/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P395866  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2001-656-6)  
Test Lab: INNOVATION CENTER  
Issue Date: 5/6/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: CORELITE  
Catalog Number: I3-WL-40L83050-1D-UNV-W2A-W-4 (5000K)  
Description: CORELITE I3, DOWNLIGHT TRAY  
4000 LUMENS, VIVIDTUNE TUNABLE WHITE  
Light Source: 3000K/5000K CCT, 80 CRI LEDS, TUNED TO 5000K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 4040.4 lumens  
Efficiency: N/A  
Efficacy: 104.9 lumens/watt  
Spacing Criteria (0/90/45): 1.2 / 1.2 / 1.32  
Luminous Opening: Rectangular w/ Sides (W: 0.5' x L: 3.92' x H: 0.17')  
CIE Type: Semi-Direct

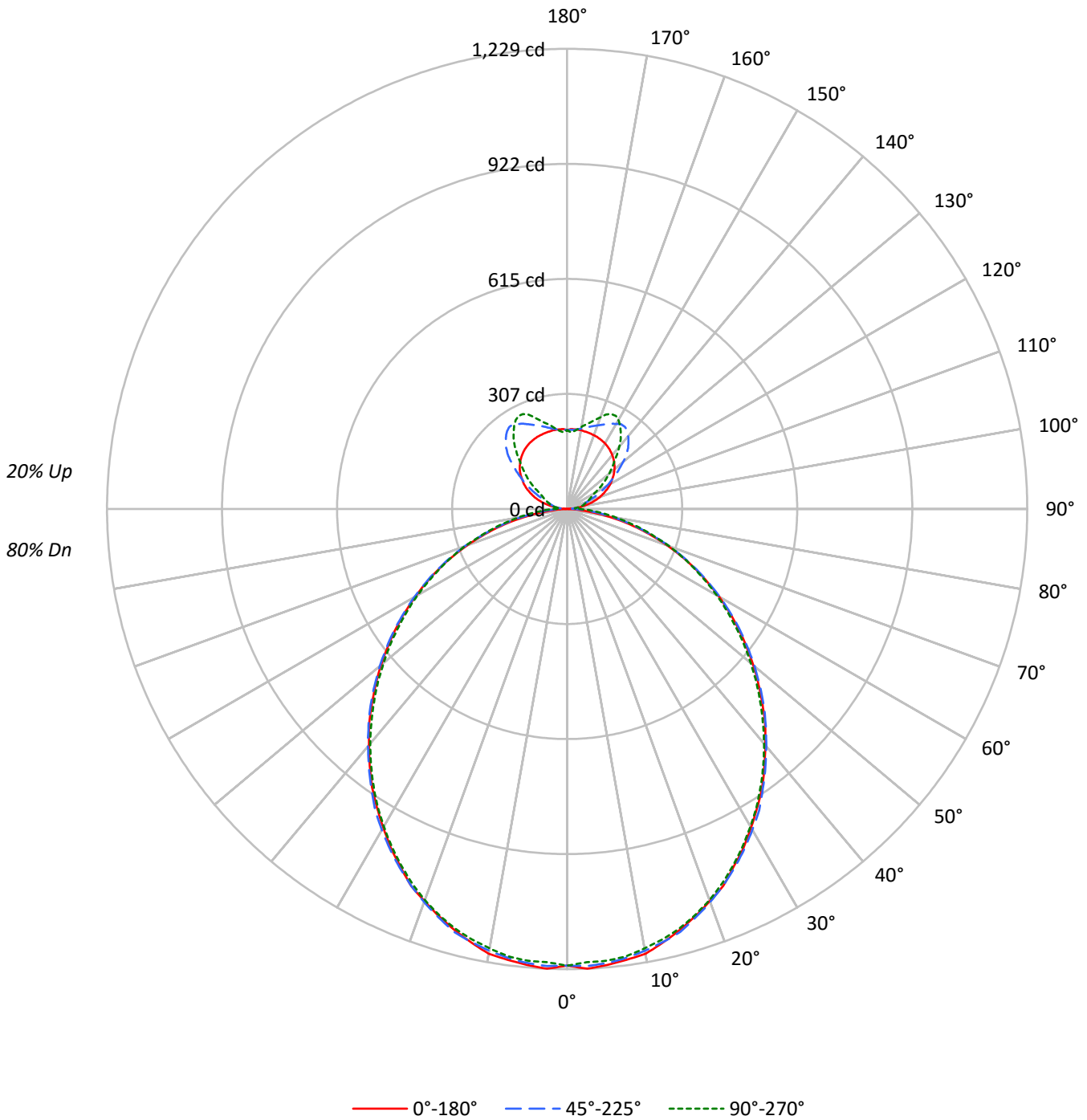
Input Watts (W): 38.5  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



TEST NUMBER: P395866

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### Luminous Intensity Polar Plot





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**COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:**

RF	20				20				20				20				20	
RC	80				70				50				30				10	0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0
RCR																		
0	114	114	114	114	109	109	109	109	100	100	100	91	91	91	83	83	83	80
1	104	100	96	92	99	95	92	88	87	85	82	80	78	76	73	72	70	67
2	95	87	80	75	90	83	78	73	77	72	68	70	67	63	65	62	59	56
3	87	77	69	62	82	73	66	61	68	62	57	62	57	53	57	53	50	47
4	79	68	59	53	75	65	57	52	60	54	49	55	50	46	51	47	43	40
5	73	61	52	46	69	58	50	44	54	47	42	50	44	40	46	41	38	35
6	67	55	46	40	64	53	45	39	49	42	37	45	39	35	42	37	33	31
7	62	49	41	35	59	48	40	34	44	38	33	41	35	31	38	33	30	27
8	58	45	37	31	55	43	36	31	41	34	29	38	32	28	35	30	26	24
9	54	41	33	28	52	40	33	27	37	31	26	35	29	25	32	28	24	22
10	51	38	30	25	49	37	30	25	34	28	24	32	27	23	30	25	22	20

**AVERAGE LUMINANCE (cd/sqm):**

	0°	45°	90°
0°	6703	6703	6703
5°	6721	6565	6494
10°	6682	6386	6282
15°	6548	6210	6058
20°	6418	5959	5796
25°	6265	5707	5508
30°	6085	5445	5212
35°	5916	5154	4906
40°	5704	4855	4588
45°	5500	4562	4253
50°	5282	4241	3915
55°	5052	3913	3570
60°	4796	3549	3214
65°	4500	3154	2833
70°	4082	2693	2432
75°	3517	2134	1953
80°	2683	1538	1458
85°	1400	918	987



TEST NUMBER: P395866

CATALOG NUMBER: I3-WL-40L83050-1D-UNV-W2A-W-4 (5000K)

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	115.2	2.9
10°-20°	326.8	8.1
20°-30°	483.9	12.0
30°-40°	565.6	14.0
40°-50°	568.1	14.1
50°-60°	499.3	12.4
60°-70°	374.1	9.3
70°-80°	212.8	5.3
80°-90°	67.2	1.7
90°-100°	24.2	0.6
100°-110°	59.0	1.5
110°-120°	98.0	2.4
120°-130°	137.5	3.4
130°-140°	158.5	3.9
140°-150°	151.4	3.7
150°-160°	113.8	2.8
160°-170°	64.4	1.6
170°-180°	20.4	0.5
0°-30°	926.0	22.9
0°-40°	1491.6	36.9
0°-60°	2559.0	63.3
0°-90°	3213.1	79.5
90°-120°	181.2	4.5
90°-150°	628.7	15.6
90°-180°	827.0	20.5
0°-180°	4040.4	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1220	1220	1220	1220	1220	
5°	1223	1210	1218	1213	1211	116
15°	1164	1154	1169	1161	1160	328
25°	1054	1050	1058	1054	1049	486
35°	908	901	911	904	902	567
45°	738	737	743	735	730	569
55°	559	561	563	556	550	500
65°	378	379	381	378	374	373
75°	192	195	200	206	206	203
85°	33	43	59	72	75	43
90°	1	6	19	28	32	3
95°	18	18	18	20	21	19
105°	69	59	44	46	48	72
115°	114	141	87	70	69	112
125°	150	206	156	125	116	134
135°	178	225	230	191	178	137
145°	196	223	268	257	250	123
155°	206	219	250	276	280	95
165°	212	215	227	236	239	60
175°	214	212	212	212	208	20
180°	210	210	210	210	210	



TEST NUMBER: P395866

CATALOG NUMBER: I3-WL-40L83050-1D-UNV-W2A-W-4 (5000K)

**CANDELA DISTRIBUTION (FULL):**

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
0°	1219.6	1219.6	1219.6	1219.6	1219.6	1219.6	1219.6	1219.6	1219.6	1219.6	1219.6
2.5°	1228.9	1226.8	1221.6	1216.5	1215.4	1214.4	1214.4	1213.4	1213.4	1215.4	1221.6
5°	1222.7	1221.6	1216.5	1211.3	1210.3	1210.3	1209.3	1209.3	1209.3	1211.3	1217.5
7.5°	1214.4	1212.3	1207.2	1202.0	1201.0	1201.0	1201.0	1200.0	1201.0	1202.0	1209.3
10°	1206.2	1205.1	1200.0	1193.8	1191.7	1191.7	1190.7	1188.6	1188.6	1190.7	1197.9
12.5°	1185.5	1184.5	1179.3	1175.2	1175.2	1176.2	1176.2	1177.3	1177.3	1179.3	1184.5
15°	1163.9	1162.8	1157.7	1153.5	1153.5	1153.5	1152.5	1152.5	1153.5	1159.7	1169.0
17.5°	1140.1	1139.1	1135.0	1130.8	1130.8	1130.8	1129.8	1129.8	1130.8	1133.9	1143.2
20°	1114.3	1113.3	1109.2	1105.0	1105.0	1105.0	1104.0	1105.0	1105.0	1109.2	1117.4
22.5°	1089.6	1087.5	1082.3	1078.2	1076.2	1076.2	1076.2	1075.1	1077.2	1080.3	1088.5
25°	1053.5	1052.4	1050.4	1047.3	1049.3	1050.4	1048.3	1046.2	1046.2	1050.4	1057.6
27.5°	1020.4	1018.4	1015.3	1012.2	1010.1	1011.2	1012.2	1014.2	1017.3	1018.4	1024.6
30°	982.3	981.2	978.1	974.0	975.0	976.1	976.1	976.1	978.1	987.4	989.5
32.5°	945.1	944.1	941.0	936.9	937.9	938.9	937.9	938.9	941.0	945.1	954.4
35°	908.0	905.9	902.8	901.8	900.7	900.7	900.7	901.8	902.8	905.9	911.1
37.5°	865.7	863.6	861.5	858.4	860.5	862.6	863.6	862.6	863.6	867.7	869.8
40°	823.4	822.3	820.3	818.2	819.2	820.3	819.2	822.3	824.4	826.5	827.5
42.5°	783.1	781.1	779.0	778.0	778.0	779.0	779.0	781.1	781.1	786.2	785.2
45°	737.7	736.7	735.7	735.7	736.7	736.7	736.7	737.7	738.8	741.9	742.9
47.5°	693.4	692.3	692.3	692.3	692.3	693.4	694.4	697.5	695.4	696.5	697.5
50°	649.0	648.0	648.0	648.0	650.0	650.0	652.1	653.1	654.2	652.1	653.1
52.5°	603.6	602.6	604.6	604.6	606.7	606.7	609.8	606.7	608.8	607.7	607.7
55°	559.2	558.2	560.3	559.2	561.3	561.3	563.4	564.4	563.4	563.4	563.4
57.5°	513.8	512.8	513.8	514.9	515.9	515.9	519.0	519.0	515.9	518.0	516.9
60°	468.4	467.4	468.4	469.5	470.5	470.5	471.5	469.5	471.5	472.6	471.5
62.5°	423.0	422.0	424.1	423.0	424.1	425.1	425.1	428.2	427.2	427.2	426.1
65°	377.6	376.6	376.6	376.6	377.6	378.7	379.7	380.7	380.7	381.8	380.7
67.5°	331.2	330.2	331.2	330.2	331.2	332.2	334.3	335.3	335.3	336.4	335.3
70°	283.7	284.8	283.7	284.8	285.8	286.8	287.9	289.9	289.9	289.9	289.9
72.5°	237.3	236.3	236.3	235.2	237.3	238.3	239.4	242.5	242.5	243.5	243.5
75°	191.9	189.8	190.9	189.8	194.0	195.0	195.0	198.1	199.1	201.2	200.2
77.5°	147.5	147.5	145.5	148.6	149.6	151.7	153.7	155.8	156.8	159.9	159.9
80°	105.2	105.2	104.2	106.3	110.4	111.4	114.5	115.6	118.7	120.7	121.8
82.5°	67.1	67.1	67.1	70.2	73.3	74.3	77.4	80.5	82.5	85.6	86.7
85°	33.0	35.1	35.1	39.2	41.3	43.3	44.4	48.5	51.6	55.7	58.8
87.5°	10.3	11.3	12.4	14.4	18.6	19.6	21.7	25.8	28.9	33.0	36.1
90°	1.0	1.0	2.1	3.1	5.2	6.2	8.3	10.3	13.4	16.5	18.6
92.5°	7.2	7.2	8.3	8.3	8.3	8.3	8.3	9.3	10.3	12.4	13.4
95°	17.5	27.9	16.5	15.5	17.5	17.5	18.6	17.5	17.5	17.5	17.5
97.5°	28.9	51.6	34.0	23.7	22.7	23.7	23.7	25.8	26.8	27.9	27.9
100°	42.3	65.0	59.8	39.2	32.0	31.0	31.0	31.0	32.0	33.0	34.0
102.5°	55.7	74.3	85.6	60.9	45.4	41.3	39.2	38.2	37.1	38.2	38.2
105°	69.1	83.6	105.2	82.5	65.0	58.8	52.6	45.4	44.4	44.4	44.4
107.5°	81.5	92.9	119.7	107.3	84.6	78.4	71.2	59.8	52.6	51.6	50.6
110°	92.9	102.1	130.0	127.9	106.3	97.0	90.8	78.4	68.1	60.9	57.8



TEST NUMBER: P395866

CATALOG NUMBER: I3-WL-40L83050-1D-UNV-W2A-W-4 (5000K)

**CANDELA DISTRIBUTION (continued):**

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
112.5°	103.2	111.4	137.2	145.5	130.0	118.7	109.4	97.0	85.6	76.4	69.1
115°	113.5	120.7	143.4	159.9	150.6	141.4	131.0	115.6	104.2	94.9	86.7
117.5°	123.8	130.0	149.6	170.2	168.2	162.0	153.7	135.2	121.8	112.5	103.2
120°	133.1	139.3	155.8	177.5	183.7	178.5	173.3	156.8	140.3	130.0	121.8
122.5°	141.4	146.5	162.0	183.7	195.0	194.0	188.8	177.5	161.0	148.6	138.3
125°	149.6	154.8	168.2	187.8	203.3	206.4	204.3	195.0	182.6	168.2	155.8
127.5°	157.9	162.0	174.4	191.9	209.5	215.6	216.7	210.5	201.2	188.8	175.4
130°	165.1	169.2	179.5	195.0	213.6	220.8	224.9	223.9	216.7	208.4	195.0
132.5°	171.3	174.4	184.7	198.1	215.6	223.9	230.1	235.2	230.1	223.9	214.6
135°	177.5	180.6	188.8	201.2	216.7	224.9	233.2	241.4	242.5	237.3	230.1
137.5°	182.6	184.7	192.9	203.3	216.7	224.9	233.2	244.5	250.7	248.7	242.5
140°	187.8	189.8	196.0	206.4	217.7	224.9	232.2	245.6	253.8	256.9	253.8
142.5°	191.9	194.0	199.1	208.4	217.7	223.9	231.1	243.5	254.9	261.0	263.1
145°	196.0	197.1	202.2	209.5	217.7	222.9	229.1	241.4	252.8	262.1	268.3
147.5°	199.1	200.2	203.3	210.5	217.7	221.8	227.0	237.3	248.7	259.0	268.3
150°	202.2	202.2	205.3	210.5	217.7	220.8	224.9	234.2	243.5	253.8	262.1
152.5°	204.3	204.3	207.4	211.5	216.7	219.8	223.9	231.1	239.4	248.7	256.9
155°	206.4	206.4	208.4	211.5	216.7	218.7	221.8	228.0	235.2	242.5	249.7
157.5°	208.4	208.4	209.5	212.5	215.6	217.7	220.8	226.0	231.1	237.3	243.5
160°	209.5	209.5	210.5	212.5	214.6	216.7	218.7	222.9	228.0	232.2	237.3
162.5°	210.5	210.5	211.5	212.5	214.6	215.6	216.7	220.8	223.9	228.0	232.2
165°	211.5	211.5	211.5	212.5	213.6	214.6	215.6	217.7	220.8	223.9	227.0
167.5°	212.5	212.5	212.5	212.5	213.6	213.6	214.6	215.6	217.7	219.8	221.8
170°	213.6	212.5	212.5	213.6	212.5	212.5	213.6	214.6	214.6	216.7	217.7
172.5°	213.6	213.6	212.5	212.5	212.5	212.5	212.5	212.5	212.5	213.6	214.6
175°	213.6	213.6	212.5	212.5	212.5	211.5	211.5	211.5	211.5	211.5	211.5
177.5°	213.6	213.6	212.5	212.5	211.5	211.5	211.5	211.5	211.5	211.5	211.5
180°	210.5	210.5	210.5	210.5	210.5	210.5	210.5	210.5	210.5	210.5	210.5



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**CANDELA DISTRIBUTION (continued):**

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°
0°	1219.6	1219.6	1219.6	1219.6	1219.6	1219.6	1219.6	1219.6	1219.6	1219.6
2.5°	1227.8	1222.7	1220.6	1219.6	1218.5	1217.5	1215.4	1213.4	1211.3	1211.3
5°	1222.7	1217.5	1215.4	1214.4	1213.4	1212.3	1211.3	1211.3	1211.3	1211.3
7.5°	1214.4	1209.3	1207.2	1206.2	1206.2	1205.1	1205.1	1205.1	1204.1	1205.1
10°	1202.0	1196.9	1195.8	1194.8	1193.8	1191.7	1191.7	1191.7	1190.7	1191.7
12.5°	1186.6	1181.4	1180.4	1179.3	1178.3	1177.3	1177.3	1176.2	1176.2	1177.3
15°	1171.1	1163.9	1161.8	1161.8	1160.8	1159.7	1160.8	1159.7	1159.7	1159.7
17.5°	1148.4	1145.3	1142.2	1140.1	1139.1	1138.1	1138.1	1137.0	1137.0	1137.0
20°	1118.5	1118.5	1118.5	1113.3	1112.3	1111.2	1111.2	1111.2	1111.2	1111.2
22.5°	1089.6	1084.4	1088.5	1085.4	1083.4	1081.3	1082.3	1082.3	1082.3	1082.3
25°	1057.6	1053.5	1054.5	1055.5	1053.5	1050.4	1050.4	1050.4	1050.4	1049.3
27.5°	1023.5	1020.4	1019.4	1020.4	1022.5	1020.4	1017.3	1014.2	1015.3	1015.3
30°	986.4	985.4	984.3	982.3	984.3	985.4	980.2	979.2	979.2	979.2
32.5°	949.2	948.2	945.1	943.1	944.1	946.1	944.1	942.0	942.0	942.0
35°	912.1	908.0	904.9	903.8	903.8	905.9	904.9	901.8	901.8	901.8
37.5°	868.8	869.8	864.6	863.6	863.6	863.6	865.7	860.5	861.5	860.5
40°	826.5	827.5	824.4	821.3	822.3	820.3	823.4	818.2	818.2	818.2
42.5°	784.2	782.1	783.1	776.9	778.0	778.0	779.0	775.9	774.9	773.8
45°	740.8	738.8	737.7	734.6	734.6	733.6	733.6	729.5	729.5	729.5
47.5°	695.4	694.4	692.3	690.3	690.3	689.2	687.2	686.1	685.1	685.1
50°	652.1	649.0	645.9	646.9	645.9	644.9	642.8	641.8	640.7	639.7
52.5°	605.7	605.7	601.5	601.5	601.5	600.5	598.4	596.4	596.4	595.3
55°	560.3	559.2	556.1	555.1	556.1	555.1	553.0	551.0	551.0	549.9
57.5°	514.9	512.8	511.8	511.8	510.7	510.7	507.6	505.6	506.6	505.6
60°	468.4	468.4	467.4	466.4	466.4	465.3	462.2	462.2	462.2	461.2
62.5°	424.1	424.1	422.0	421.0	422.0	421.0	419.9	418.9	417.9	416.8
65°	377.6	378.7	376.6	377.6	377.6	375.6	375.6	374.5	374.5	373.5
67.5°	334.3	334.3	333.3	333.3	334.3	333.3	333.3	332.2	332.2	331.2
70°	289.9	292.0	291.0	291.0	291.0	289.9	289.9	289.9	288.9	289.9
72.5°	245.6	245.6	245.6	245.6	245.6	246.6	246.6	246.6	246.6	245.6
75°	204.3	205.3	204.3	205.3	206.4	206.4	206.4	206.4	207.4	206.4
77.5°	164.1	165.1	165.1	167.1	167.1	167.1	168.2	168.2	168.2	168.2
80°	125.9	126.9	127.9	130.0	130.0	132.1	133.1	133.1	133.1	133.1
82.5°	90.8	93.9	94.9	98.0	99.1	99.1	101.1	102.1	102.1	102.1
85°	62.9	66.0	68.1	70.2	72.2	72.2	74.3	74.3	75.3	75.3
87.5°	39.2	42.3	44.4	47.5	48.5	49.5	50.6	51.6	52.6	52.6
90°	21.7	23.7	25.8	27.9	27.9	28.9	29.9	31.0	32.0	32.0
92.5°	15.5	16.5	18.6	19.6	19.6	20.6	21.7	21.7	22.7	22.7
95°	17.5	18.6	18.6	19.6	19.6	19.6	20.6	20.6	20.6	20.6
97.5°	26.8	26.8	26.8	25.8	25.8	25.8	25.8	25.8	25.8	25.8
100°	35.1	36.1	36.1	36.1	37.1	37.1	37.1	37.1	36.1	36.1
102.5°	39.2	40.2	41.3	42.3	42.3	42.3	43.3	43.3	43.3	43.3
105°	44.4	44.4	45.4	46.4	46.4	46.4	47.5	47.5	47.5	47.5
107.5°	50.6	50.6	51.6	51.6	51.6	51.6	51.6	51.6	51.6	51.6
110°	57.8	57.8	57.8	56.7	57.8	56.7	56.7	56.7	56.7	56.7





TEST NUMBER: P395866

CATALOG NUMBER: I3-WL-40L83050-1D-UNV-W2A-W-4 (5000K)

**CANDELA DISTRIBUTION (continued):**

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°
112.5°	66.0	65.0	65.0	64.0	64.0	64.0	62.9	62.9	62.9	62.9
115°	79.4	74.3	72.2	70.2	70.2	70.2	69.1	69.1	69.1	69.1
117.5°	96.0	88.7	84.6	80.5	79.4	78.4	76.4	76.4	75.3	75.3
120°	113.5	106.3	100.1	94.9	92.9	91.8	88.7	86.7	84.6	84.6
122.5°	130.0	122.8	116.6	111.4	109.4	107.3	104.2	102.1	100.1	100.1
125°	146.5	139.3	133.1	127.9	124.8	122.8	119.7	117.6	115.6	115.6
127.5°	164.1	154.8	148.6	143.4	140.3	139.3	135.2	133.1	131.0	131.0
130°	183.7	172.3	164.1	157.9	155.8	153.7	150.6	148.6	146.5	146.5
132.5°	203.3	191.9	182.6	174.4	171.3	169.2	165.1	163.0	161.0	161.0
135°	221.8	211.5	202.2	194.0	190.9	187.8	183.7	179.5	177.5	177.5
137.5°	236.3	229.1	220.8	213.6	210.5	207.4	203.3	199.1	196.0	197.1
140°	248.7	242.5	237.3	232.2	229.1	227.0	222.9	219.8	216.7	216.7
142.5°	260.0	254.9	249.7	245.6	244.5	243.5	240.4	237.3	235.2	235.2
145°	270.3	267.2	263.1	257.9	256.9	255.9	252.8	250.7	249.7	249.7
147.5°	273.4	274.5	273.4	270.3	269.3	268.3	266.2	264.1	263.1	263.1
150°	271.4	275.5	277.6	277.6	277.6	277.6	277.6	275.5	274.5	274.5
152.5°	265.2	271.4	275.5	278.6	279.6	280.6	280.6	281.7	280.6	280.6
155°	257.9	264.1	270.3	273.4	275.5	276.5	278.6	279.6	280.6	279.6
157.5°	249.7	254.9	259.0	265.2	267.2	269.3	271.4	273.4	274.5	273.4
160°	242.5	246.6	249.7	253.8	254.9	256.9	259.0	260.0	262.1	261.0
162.5°	235.2	238.3	241.4	243.5	245.6	246.6	248.7	249.7	250.7	249.7
165°	230.1	232.2	233.2	235.2	236.3	237.3	238.3	239.4	239.4	239.4
167.5°	223.9	226.0	227.0	228.0	229.1	230.1	230.1	231.1	231.1	231.1
170°	218.7	219.8	220.8	221.8	221.8	222.9	222.9	222.9	223.9	222.9
172.5°	214.6	214.6	214.6	215.6	215.6	215.6	215.6	215.6	215.6	214.6
175°	212.5	212.5	211.5	211.5	211.5	211.5	211.5	210.5	209.5	208.4
177.5°	211.5	210.5	210.5	209.5	209.5	209.5	208.4	207.4	206.4	205.3
180°	210.5	210.5	210.5	210.5	210.5	210.5	210.5	210.5	210.5	210.5

(END OF REPORT)