

Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269



Scaled data based on original data using
LM-79-2019 Approved Method: Electrical and Photometric Measurements of Solid-
State Lighting Products

Test Report Prepared for
Cooper Lighting Solutions

Brand: CORELITE

Report Number: P934233

Luminaire Tested: SQ4-FA-050U-050D-92765-1D-UNV-STD-W-4-3500K

Issue Date: 12/17/2024

Test Information

Test Method: LM-79-2019
Report Number: P934233
REPORT IS A COMBINATION OF REPORTS P933690 AND P933786
Test Lab: INNOVATION CENTER
Issue Date: 12/17/2024
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: CORELITE
Catalog Number: SQ4-FA-050U-050D-92765-1D-UNV-STD-W-4-3500K
Description: CORELITE SQ4 SUSPENDED INDIRECT LED LUMINAIRE WITH Asymmetric Frosted Continuous I
Lens
Light Source: -
Ballast/Driver: -

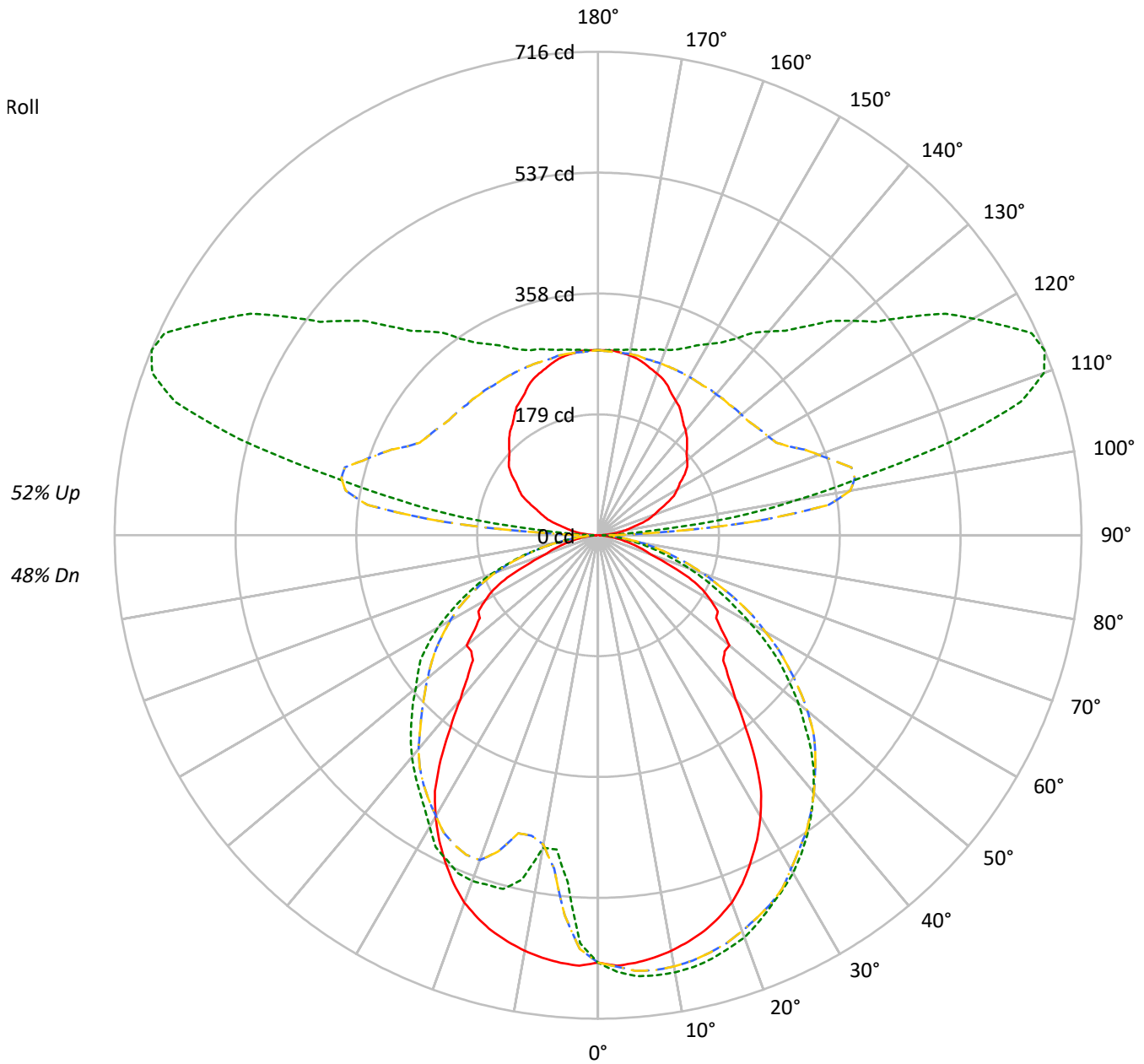
Summary

Lumens per Lamp: N/A
Luminaire Lumens: 3418.7 lumens
Efficiency: N/A
Efficacy: 120.4 lumens/watt
Spacing Criteria (0/90/45): 1.14 / 1.26 / 1.36
Luminous Opening: Rectangular w/ Sides (W: 0.29' x L: 4' x H: 0.1')
CIE Type: General Diffuse

Input Watts (W): 28.4
Input Voltage (V): NR
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

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CATALOG NUMBER: SQ4-FA-050U-050D-92765-1D-UNV-STD-W-4-3500K

Luminous Intensity Polar Plot



— 0°-180° - - 45°-225° - · - · 90°-270° - · - · 135°-315°



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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	50	30	10	0
RCR																					
0	107	107	107	107	98	98	98	98	82	82	82	68	68	68	54	54	54	48	48	48	48
1	97	93	89	86	89	86	83	80	72	70	68	60	58	56	48	47	46	41	41	41	41
2	89	81	75	70	81	75	70	65	63	59	56	52	50	47	42	40	39	34	34	34	34
3	81	71	64	58	74	66	60	55	56	51	47	46	43	40	38	35	33	29	29	29	29
4	74	63	55	49	68	58	52	46	50	44	40	41	37	34	33	31	28	25	25	25	25
5	68	56	48	42	62	52	45	40	44	39	35	37	33	30	30	27	25	21	21	21	21
6	62	50	42	37	57	47	40	34	40	34	30	33	29	26	27	24	22	19	19	19	19
7	58	45	38	32	53	42	35	30	36	30	26	30	26	23	25	22	19	17	17	17	17
8	54	41	34	28	49	38	31	27	33	27	23	28	23	20	23	20	17	15	15	15	15
9	50	38	30	25	46	35	28	24	30	25	21	25	21	18	21	18	16	13	13	13	13
10	47	34	27	22	43	32	26	21	28	22	19	23	19	16	20	16	14	12	12	12	12

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°	270°
0°	5872	5872	5872	5872
5°	5908	5927	5908	4660
10°	5863	5838	5863	4175
15°	5792	5713	5792	4770
20°	5665	5562	5665	4780
25°	5410	5343	5410	4678
30°	5084	5162	5084	4456
35°	4526	4933	4526	4212
40°	3763	4663	3763	4027
45°	3357	4346	3357	3814
50°	3559	3969	3559	3601
55°	3338	3563	3338	3478
60°	3430	3026	3430	3186
65°	3093	2502	3093	2796
70°	2127	1994	2127	2345
75°	1843	1474	1843	1765
80°	1460	975	1460	1059
85°	795	515	795	440

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 20°
 Vertical Angle: 45°
 Luminance: 5155 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	57.1	1.7
10°-20°	162.2	4.7
20°-30°	250.7	7.3
30°-40°	299.3	8.8
40°-50°	301.0	8.8
50°-60°	261.9	7.7
60°-70°	185.7	5.4
70°-80°	98.3	2.9
80°-90°	25.5	0.7
90°-100°	133.6	3.9
100°-110°	351.3	10.3
110°-120°	364.3	10.7
120°-130°	292.2	8.5
130°-140°	229.3	6.7
140°-150°	176.0	5.1
150°-160°	126.7	3.7
160°-170°	77.5	2.3
170°-180°	26.2	0.8
0°-30°	470.0	13.7
0°-40°	769.3	22.5
0°-60°	1332.2	39.0
0°-90°	1641.7	48.0
90°-120°	849.2	24.8
90°-150°	1546.6	45.2
90°-180°	1777.0	52.0
0°-180°	3418.7	100.0

CANDELA DISTRIBUTION:

	0°	90°	180°	270°	360°	Flux
0°	633	633	633	633	633	
5°	636	656	636	515	636	60
15°	607	650	607	542	607	171
25°	535	606	535	530	535	245
35°	406	541	406	462	406	251
45°	262	445	262	391	262	210
55°	214	329	214	321	214	196
65°	148	198	148	222	148	142
75°	56	94	56	113	56	59
85°	10	24	10	20	10	13
90°	2	7	2	7	2	2
95°	18	81	18	81	18	20
105°	63	550	63	550	63	67
115°	112	708	112	708	112	111
125°	156	564	156	564	156	139
135°	186	438	186	438	186	144
145°	216	355	216	355	216	135
155°	244	306	244	306	244	112
165°	264	285	264	285	264	74
175°	274	276	274	276	274	26
180°	274	274	274	274	274	



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CANDELA DISTRIBUTION (FULL):

	0°	10°	20°	22.5°	30°	40°	45°	50°	60°	67.5°	70°
0°	632.8	632.8	632.8	632.8	632.8	632.8	632.8	632.8	632.8	632.8	632.8
2.5°	638.1	638.1	641.7	643.0	643.0	641.2	639.4	641.2	646.5	648.3	647.7
5°	635.7	640.5	647.1	648.3	649.6	648.9	647.7	648.9	654.9	656.1	656.7
7.5°	631.0	639.9	648.3	650.1	651.9	650.1	649.6	650.7	656.7	657.9	657.9
10°	625.0	637.5	647.1	648.3	650.1	648.3	648.3	650.7	656.7	657.9	658.5
12.5°	616.6	633.9	643.0	644.1	646.5	645.9	645.4	647.7	653.8	654.9	654.9
15°	607.0	627.3	635.7	637.0	641.2	639.9	639.9	642.3	648.9	650.7	650.1
17.5°	593.9	619.0	628.6	630.4	633.4	632.8	633.4	635.7	641.7	643.0	643.6
20°	578.9	607.6	619.0	620.8	623.8	623.8	623.8	626.8	632.8	635.2	635.2
22.5°	558.5	595.6	607.6	608.9	612.4	612.4	613.6	617.8	623.1	623.8	623.8
25°	534.6	582.4	592.6	596.3	599.8	601.6	603.4	605.8	607.6	607.0	607.6
27.5°	509.4	565.7	578.9	581.3	586.1	587.9	590.3	590.8	591.5	593.2	592.1
30°	481.3	542.4	562.1	564.5	572.3	573.5	571.1	572.3	575.3	576.5	577.7
32.5°	449.6	507.6	544.8	550.1	557.4	553.8	553.2	554.9	559.8	559.8	560.9
35°	406.5	480.7	528.6	533.4	538.8	534.6	537.0	537.5	540.6	542.4	541.7
37.5°	359.2	457.4	511.8	515.4	519.6	514.2	517.8	519.6	522.0	520.8	520.8
40°	317.2	420.9	492.1	494.5	498.1	493.9	497.5	498.7	499.9	498.7	498.1
42.5°	286.2	380.7	471.1	474.2	471.7	474.7	475.9	478.4	476.5	474.2	474.2
45°	262.2	370.0	448.4	451.9	448.4	453.2	455.0	455.0	449.6	448.4	447.7
47.5°	254.4	348.4	425.6	425.6	423.8	429.8	432.8	428.6	423.3	421.4	421.4
50°	253.9	324.5	394.5	392.1	400.5	407.7	404.7	400.5	396.3	389.7	389.7
52.5°	230.5	295.1	354.4	363.4	376.5	380.7	376.0	371.8	364.5	361.6	359.2
55°	213.7	264.6	317.9	335.8	349.6	355.0	346.0	341.8	331.1	329.3	328.0
57.5°	210.1	220.3	284.4	307.1	323.8	323.3	317.9	310.1	301.1	299.3	298.8
60°	192.8	159.2	248.4	275.4	292.7	290.9	286.2	278.9	270.6	269.4	268.2
62.5°	174.8	115.5	207.7	238.2	262.8	262.2	258.1	247.3	241.3	238.2	235.8
65°	148.4	96.9	147.9	198.2	233.5	234.7	225.7	217.9	211.3	207.7	207.1
67.5°	113.2	79.0	100.0	165.2	205.3	204.1	192.8	189.1	180.8	179.0	175.4
70°	83.8	52.7	69.4	134.1	177.8	174.8	165.8	161.7	153.9	149.7	147.3
72.5°	69.4	42.5	50.9	104.2	149.7	146.0	138.3	133.5	126.9	123.4	121.0
75°	56.2	44.9	38.9	77.2	121.5	119.2	111.9	107.1	101.8	96.9	97.6
77.5°	41.3	41.9	31.2	56.9	96.4	92.8	88.6	82.7	80.2	75.4	75.4
80°	31.2	32.9	23.4	38.9	69.4	69.4	65.9	61.7	57.5	55.1	55.1
82.5°	21.0	21.0	17.3	24.5	47.3	45.5	43.1	41.9	39.5	38.3	38.3
85°	9.6	12.0	10.8	15.0	25.7	27.0	27.0	25.7	25.2	23.9	24.5
87.5°	3.0	5.4	6.6	8.4	13.2	13.7	14.4	14.4	14.4	15.0	15.0
90°	1.9	3.3	4.8	5.2	8.1	12.1	14.0	12.4	9.3	7.0	7.0
92.5°	7.3	19.8	32.4	35.5	49.9	69.1	78.7	69.0	49.5	35.0	33.6
95°	17.7	40.5	63.5	69.2	122.8	194.3	230.1	205.3	155.8	118.6	114.4
97.5°	30.5	50.7	70.9	76.0	165.4	284.7	344.4	328.8	297.4	273.9	265.9
100°	40.4	58.7	77.1	81.7	180.9	313.3	379.5	380.7	383.0	384.7	375.2
102.5°	48.9	66.1	83.1	87.4	188.1	322.3	389.5	409.4	449.3	479.2	471.0
105°	63.3	77.7	92.2	95.9	193.3	323.4	388.4	433.1	522.5	589.7	585.3
107.5°	78.0	91.5	105.0	108.4	194.3	309.0	366.3	428.7	553.5	647.1	648.1
110°	87.9	100.1	112.3	115.3	192.9	296.3	347.9	417.7	557.2	661.8	666.3



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CANDELA DISTRIBUTION (continued):

	0°	10°	20°	22.5°	30°	40°	45°	50°	60°	67.5°	70°
112.5°	97.7	109.3	120.9	123.8	192.9	285.1	331.2	402.6	545.3	652.4	659.5
115°	112.4	123.1	133.8	136.5	194.7	272.2	311.1	379.8	517.4	620.5	630.3
117.5°	126.9	136.7	146.4	148.8	198.3	264.3	297.3	359.4	483.4	576.5	587.3
120°	135.4	144.6	153.7	156.0	201.3	261.6	291.8	348.5	461.9	547.0	557.5
122.5°	143.7	153.0	162.2	164.5	205.5	260.2	287.5	338.6	440.8	517.4	527.7
125°	156.4	164.8	173.2	175.3	211.2	259.0	283.0	326.3	413.1	478.2	487.7
127.5°	166.7	175.2	183.7	185.8	216.9	258.4	279.1	316.3	390.8	446.7	454.7
130°	172.2	181.4	190.5	192.8	221.1	258.8	277.6	310.8	377.1	426.9	434.3
132.5°	177.9	187.1	196.2	198.5	224.5	259.0	276.4	306.0	365.3	409.9	416.6
135°	186.4	194.7	203.1	205.1	228.2	258.8	274.1	298.9	348.7	386.0	391.7
137.5°	195.0	203.2	211.6	213.6	233.7	260.4	273.8	294.7	336.8	368.3	373.0
140°	202.2	209.8	217.4	219.3	237.0	260.6	272.4	290.6	327.0	354.2	358.6
142.5°	207.7	214.8	221.7	223.5	239.8	261.5	272.4	288.4	320.3	344.2	347.9
145°	216.2	222.3	228.4	229.9	243.5	261.6	270.6	283.7	309.7	329.3	332.1
147.5°	224.7	230.7	236.5	238.1	249.0	263.4	270.6	280.9	301.4	316.8	319.2
150°	230.1	235.5	240.9	242.3	251.7	264.3	270.6	279.3	296.6	309.6	311.6
152.5°	235.8	239.9	244.0	245.0	253.6	264.9	270.6	278.1	292.9	303.9	305.4
155°	244.3	247.3	250.4	251.1	257.6	266.3	270.6	276.5	288.3	297.2	298.1
157.5°	250.6	253.5	256.4	257.2	261.6	267.6	270.6	275.2	284.4	291.3	292.0
160°	254.8	257.1	259.4	259.9	263.5	268.2	270.6	274.6	282.4	288.3	288.7
162.5°	259.0	260.7	262.4	262.9	265.5	268.9	270.6	273.9	280.6	285.5	285.9
165°	263.7	265.2	266.8	267.2	268.3	269.8	270.6	273.0	277.7	281.3	281.6
167.5°	267.9	268.6	269.3	269.5	270.5	271.8	272.4	274.0	277.2	279.5	279.7
170°	270.6	271.4	272.1	272.2	272.3	272.4	272.4	274.0	277.2	279.5	279.5
172.5°	272.1	272.2	272.4	272.4	272.4	272.4	272.4	273.7	276.1	278.0	277.8
175°	274.1	274.1	274.1	274.1	273.6	272.8	272.4	273.2	274.8	276.0	276.0
177.5°	274.1	274.1	274.1	274.1	273.7	273.1	272.9	273.5	274.7	275.6	275.5
180°	274.1	274.1	274.1	274.1	274.1	274.1	274.1	274.1	274.1	274.1	274.1



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CANDELA DISTRIBUTION (continued):

	80°	90°	100°	110°	112.5°	120°	130°	135°	140°	150°	157.5°
0°	632.8	632.8	632.8	632.8	632.8	632.8	632.8	632.8	632.8	632.8	632.8
2.5°	648.9	647.1	648.9	647.7	648.3	646.5	641.2	639.4	641.2	643.0	643.0
5°	656.7	655.5	656.7	656.7	656.1	654.9	648.9	647.7	648.9	649.6	648.3
7.5°	659.1	657.3	659.1	657.9	657.9	656.7	650.7	649.6	650.1	651.9	650.1
10°	659.1	657.3	659.1	658.5	657.9	656.7	650.7	648.3	648.3	650.1	648.3
12.5°	656.1	654.9	656.1	654.9	654.9	653.8	647.7	645.4	645.9	646.5	644.1
15°	651.3	649.6	651.3	650.1	650.7	648.9	642.3	639.9	639.9	641.2	637.0
17.5°	644.1	641.7	644.1	643.6	643.0	641.7	635.7	633.4	632.8	633.4	630.4
20°	635.7	633.9	635.7	635.2	635.2	632.8	626.8	623.8	623.8	623.8	620.8
22.5°	622.6	620.8	622.6	623.8	623.8	623.1	617.8	613.6	612.4	612.4	608.9
25°	607.6	605.8	607.6	607.6	607.0	607.6	605.8	603.4	601.6	599.8	596.3
27.5°	593.2	592.1	593.2	592.1	593.2	591.5	590.8	590.3	587.9	586.1	581.3
30°	578.9	577.7	578.9	577.7	576.5	575.3	572.3	571.1	573.5	572.3	564.5
32.5°	560.9	559.8	560.9	560.9	559.8	559.8	554.9	553.2	553.8	557.4	550.1
35°	542.4	540.6	542.4	541.7	542.4	540.6	537.5	537.0	534.6	538.8	533.4
37.5°	520.8	519.1	520.8	520.8	520.8	522.0	519.6	517.8	514.2	519.6	515.4
40°	498.7	496.3	498.7	498.1	498.7	499.9	498.7	497.5	493.9	498.1	494.5
42.5°	473.5	472.9	473.5	474.2	474.2	476.5	478.4	475.9	474.7	471.7	474.2
45°	446.6	445.4	446.6	447.7	448.4	449.6	455.0	455.0	453.2	448.4	451.9
47.5°	417.8	414.9	417.8	421.4	421.4	423.3	428.6	432.8	429.8	423.8	425.6
50°	387.3	387.9	387.3	389.7	389.7	396.3	400.5	404.7	407.7	400.5	392.1
52.5°	357.4	356.8	357.4	359.2	361.6	364.5	371.8	376.0	380.7	376.5	363.4
55°	327.4	328.7	327.4	328.0	329.3	331.1	341.8	346.0	355.0	349.6	335.8
57.5°	297.5	295.7	297.5	298.8	299.3	301.1	310.1	317.9	323.3	323.8	307.1
60°	262.8	260.4	262.8	268.2	269.4	270.6	278.9	286.2	290.9	292.7	275.4
62.5°	232.3	228.1	232.3	235.8	238.2	241.3	247.3	258.1	262.2	262.8	238.2
65°	199.9	198.2	199.9	207.1	207.7	211.3	217.9	225.7	234.7	233.5	198.2
67.5°	170.6	170.6	170.6	175.4	179.0	180.8	189.1	192.8	204.1	205.3	165.2
70°	143.7	143.1	143.7	147.3	149.7	153.9	161.7	165.8	174.8	177.8	134.1
72.5°	117.9	117.3	117.9	121.0	123.4	126.9	133.5	138.3	146.0	149.7	104.2
75°	95.2	94.0	95.2	97.6	96.9	101.8	107.1	111.9	119.2	121.5	77.2
77.5°	73.0	73.0	73.0	75.4	75.4	80.2	82.7	88.6	92.8	96.4	56.9
80°	54.4	53.9	54.4	55.1	55.1	57.5	61.7	65.9	69.4	69.4	38.9
82.5°	38.3	37.1	38.3	38.3	38.3	39.5	41.9	43.1	45.5	47.3	24.5
85°	23.9	23.9	23.9	24.5	23.9	25.2	25.7	27.0	27.0	25.7	15.0
87.5°	15.5	15.0	15.5	15.0	15.0	14.4	14.4	14.4	13.7	13.2	8.4
90°	7.0	7.0	7.0	7.0	7.0	9.3	12.4	14.0	12.1	8.1	5.2
92.5°	28.0	22.4	28.0	33.6	35.0	49.5	69.0	78.7	69.1	49.9	35.5
95°	97.6	80.8	97.6	114.4	118.6	155.8	205.3	230.1	194.3	122.8	69.2
97.5°	233.9	201.8	233.9	265.9	273.9	297.4	328.8	344.4	284.7	165.4	76.0
100°	337.0	298.8	337.0	375.2	384.7	383.0	380.7	379.5	313.3	180.9	81.7
102.5°	438.4	405.7	438.4	471.0	479.2	449.3	409.4	389.5	322.3	188.1	87.4
105°	567.7	550.1	567.7	585.3	589.7	522.5	433.1	388.4	323.4	193.3	95.9
107.5°	652.3	656.6	652.3	648.1	647.1	553.5	428.7	366.3	309.0	194.3	108.4
110°	684.6	702.9	684.6	666.3	661.8	557.2	417.7	347.9	296.3	192.9	115.3



TEST NUMBER: P934233

CATALOG NUMBER: SQ4-FA-050U-050D-92765-1D-UNV-STD-W-4-3500K

CANDELA DISTRIBUTION (continued):

	80°	90°	100°	110°	112.5°	120°	130°	135°	140°	150°	157.5°
112.5°	687.6	715.7	687.6	659.5	652.4	545.3	402.6	331.2	285.1	192.9	123.8
115°	669.3	708.3	669.3	630.3	620.5	517.4	379.8	311.1	272.2	194.7	136.5
117.5°	630.6	673.9	630.6	587.3	576.5	483.4	359.4	297.3	264.3	198.3	148.8
120°	599.5	641.5	599.5	557.5	547.0	461.9	348.5	291.8	261.6	201.3	156.0
122.5°	569.2	610.6	569.2	527.7	517.4	440.8	338.6	287.5	260.2	205.5	164.5
125°	525.8	564.0	525.8	487.7	478.2	413.1	326.3	283.0	259.0	211.2	175.3
127.5°	486.9	519.1	486.9	454.7	446.7	390.8	316.3	279.1	258.4	216.9	185.8
130°	464.1	493.8	464.1	434.3	426.9	377.1	310.8	277.6	258.8	221.1	192.8
132.5°	443.2	469.9	443.2	416.6	409.9	365.3	306.0	276.4	259.0	224.5	198.5
135°	414.7	437.7	414.7	391.7	386.0	348.7	298.9	274.1	258.8	228.2	205.1
137.5°	391.8	410.6	391.8	373.0	368.3	336.8	294.7	273.8	260.4	233.7	213.6
140°	376.2	393.7	376.2	358.6	354.2	327.0	290.6	272.4	260.6	237.0	219.3
142.5°	363.1	378.3	363.1	347.9	344.2	320.3	288.4	272.4	261.5	239.8	223.5
145°	343.7	355.1	343.7	332.1	329.3	309.7	283.7	270.6	261.6	243.5	229.9
147.5°	328.7	338.1	328.7	319.2	316.8	301.4	280.9	270.6	263.4	249.0	238.1
150°	319.3	327.0	319.3	311.6	309.6	296.6	279.3	270.6	264.3	251.7	242.3
152.5°	311.2	317.0	311.2	305.4	303.9	292.9	278.1	270.6	264.9	253.6	245.0
155°	302.0	305.8	302.0	298.1	297.2	288.3	276.5	270.6	266.3	257.6	251.1
157.5°	294.7	297.3	294.7	292.0	291.3	284.4	275.2	270.6	267.6	261.6	257.2
160°	290.3	291.8	290.3	288.7	288.3	282.4	274.6	270.6	268.2	263.5	259.9
162.5°	287.4	288.9	287.4	285.9	285.5	280.6	273.9	270.6	268.9	265.5	262.9
165°	283.2	284.8	283.2	281.6	281.3	277.7	273.0	270.6	269.8	268.3	267.2
167.5°	280.3	280.9	280.3	279.7	279.5	277.2	274.0	272.4	271.8	270.5	269.5
170°	279.5	279.5	279.5	279.5	279.5	277.2	274.0	272.4	272.4	272.3	272.2
172.5°	277.2	276.7	277.2	277.8	278.0	276.1	273.7	272.4	272.4	272.4	272.4
175°	276.0	276.0	276.0	276.0	276.0	274.8	273.2	272.4	272.8	273.6	274.1
177.5°	274.8	274.1	274.8	275.5	275.6	274.7	273.5	272.9	273.1	273.7	274.1
180°	274.1	274.1	274.1	274.1	274.1	274.1	274.1	274.1	274.1	274.1	274.1



TEST NUMBER: P934233

CATALOG NUMBER: SQ4-FA-050U-050D-92765-1D-UNV-STD-W-4-3500K

CANDELA DISTRIBUTION (continued):

	160°	170°	180°	190°	200°	202.5°	210°	220°	225°	230°	240°
0°	632.8	632.8	632.8	632.8	632.8	632.8	632.8	632.8	632.8	632.8	632.8
2.5°	641.7	638.1	638.1	632.2	629.7	628.0	625.0	616.0	613.6	611.2	614.8
5°	647.1	640.5	635.7	625.0	616.0	612.4	601.0	579.5	565.1	554.3	548.3
7.5°	648.3	639.9	631.0	614.2	592.6	583.1	548.3	508.9	498.1	488.5	482.5
10°	647.1	637.5	625.0	599.8	549.0	532.2	497.5	471.7	465.1	463.4	465.1
12.5°	643.0	633.9	616.6	574.7	503.4	492.1	471.7	456.8	455.6	458.5	474.7
15°	635.7	627.3	607.0	541.2	478.4	470.0	455.6	450.1	456.8	477.7	526.2
17.5°	628.6	619.0	593.9	508.3	459.2	453.2	443.0	453.8	490.9	519.1	535.2
20°	619.0	607.6	578.9	484.3	445.4	440.0	435.2	483.7	511.8	522.0	531.0
22.5°	607.6	595.6	558.5	467.6	431.0	426.9	429.8	500.5	511.8	519.1	526.8
25°	592.6	582.4	534.6	454.3	419.6	414.9	426.2	498.7	505.2	507.0	522.6
27.5°	578.9	565.7	509.4	442.4	405.9	404.1	429.3	490.9	495.7	497.5	514.2
30°	562.1	542.4	481.3	429.8	391.5	390.9	429.8	481.3	480.1	484.9	501.7
32.5°	544.8	507.6	449.6	414.3	377.8	377.1	425.6	466.9	465.8	472.3	484.9
35°	528.6	480.7	406.5	396.3	360.4	361.0	415.4	450.1	450.8	456.8	464.5
37.5°	511.8	457.4	359.2	376.5	343.7	343.7	401.7	434.6	433.5	435.2	446.0
40°	492.1	420.9	317.2	350.8	328.0	326.3	384.9	417.8	413.6	413.1	428.0
42.5°	471.1	380.7	286.2	316.7	310.1	307.7	364.5	397.5	389.7	391.5	410.7
45°	448.4	370.0	262.2	267.6	291.5	289.7	342.4	374.2	368.7	373.6	393.3
47.5°	425.6	348.4	254.4	222.1	271.8	271.2	317.9	351.4	348.4	353.2	374.2
50°	394.5	324.5	253.9	190.4	249.7	252.0	288.6	329.3	329.3	333.5	355.6
52.5°	354.4	295.1	230.5	172.4	223.9	231.1	262.8	310.1	311.3	315.5	335.3
55°	317.9	264.6	213.7	158.6	193.3	209.0	237.6	290.4	292.7	296.9	314.9
57.5°	284.4	220.3	210.1	142.5	165.2	180.2	215.5	271.2	272.3	276.0	293.3
60°	248.4	159.2	192.8	125.1	140.7	152.0	195.1	248.4	252.6	255.0	270.0
62.5°	207.7	115.5	174.8	113.2	128.7	131.1	178.4	226.9	232.3	234.0	243.1
65°	147.9	96.9	148.4	103.0	116.1	116.8	160.4	204.8	209.5	212.5	219.1
67.5°	100.0	79.0	113.2	93.4	106.6	107.1	143.1	179.0	185.6	188.0	192.2
70°	69.4	52.7	83.8	83.2	95.8	96.9	124.5	155.7	161.7	163.4	165.8
72.5°	50.9	42.5	69.4	74.8	84.4	85.6	105.3	129.3	135.3	137.1	138.3
75°	38.9	44.9	56.2	65.3	71.9	72.4	86.2	105.3	109.5	110.8	111.3
77.5°	31.2	41.9	41.3	52.7	58.6	57.5	67.7	81.4	85.0	85.0	85.0
80°	23.4	32.9	31.2	37.8	43.1	41.9	48.5	58.1	59.3	60.4	59.9
82.5°	17.3	21.0	21.0	23.9	28.7	27.6	32.3	37.8	37.8	37.8	38.9
85°	10.8	12.0	9.6	12.6	16.2	15.5	17.9	20.4	21.0	21.0	19.7
87.5°	6.6	5.4	3.0	4.8	7.1	7.1	8.4	9.0	8.4	8.4	8.4
90°	4.8	3.3	1.9	3.3	4.8	5.2	8.1	12.1	14.0	12.4	9.3
92.5°	32.4	19.8	7.3	19.8	32.4	35.5	49.9	69.1	78.7	69.0	49.5
95°	63.5	40.5	17.7	40.5	63.5	69.2	122.8	194.3	230.1	205.3	155.8
97.5°	70.9	50.7	30.5	50.7	70.9	76.0	165.4	284.7	344.4	328.8	297.4
100°	77.1	58.7	40.4	58.7	77.1	81.7	180.9	313.3	379.5	380.7	383.0
102.5°	83.1	66.1	48.9	66.1	83.1	87.4	188.1	322.3	389.5	409.4	449.3
105°	92.2	77.7	63.3	77.7	92.2	95.9	193.3	323.4	388.4	433.1	522.5
107.5°	105.0	91.5	78.0	91.5	105.0	108.4	194.3	309.0	366.3	428.7	553.5
110°	112.3	100.1	87.9	100.1	112.3	115.3	192.9	296.3	347.9	417.7	557.2



TEST NUMBER: P934233

CATALOG NUMBER: SQ4-FA-050U-050D-92765-1D-UNV-STD-W-4-3500K

CANDELA DISTRIBUTION (continued):

	160°	170°	180°	190°	200°	202.5°	210°	220°	225°	230°	240°
112.5°	120.9	109.3	97.7	109.3	120.9	123.8	192.9	285.1	331.2	402.6	545.3
115°	133.8	123.1	112.4	123.1	133.8	136.5	194.7	272.2	311.1	379.8	517.4
117.5°	146.4	136.7	126.9	136.7	146.4	148.8	198.3	264.3	297.3	359.4	483.4
120°	153.7	144.6	135.4	144.6	153.7	156.0	201.3	261.6	291.8	348.5	461.9
122.5°	162.2	153.0	143.7	153.0	162.2	164.5	205.5	260.2	287.5	338.6	440.8
125°	173.2	164.8	156.4	164.8	173.2	175.3	211.2	259.0	283.0	326.3	413.1
127.5°	183.7	175.2	166.7	175.2	183.7	185.8	216.9	258.4	279.1	316.3	390.8
130°	190.5	181.4	172.2	181.4	190.5	192.8	221.1	258.8	277.6	310.8	377.1
132.5°	196.2	187.1	177.9	187.1	196.2	198.5	224.5	259.0	276.4	306.0	365.3
135°	203.1	194.7	186.4	194.7	203.1	205.1	228.2	258.8	274.1	298.9	348.7
137.5°	211.6	203.2	195.0	203.2	211.6	213.6	233.7	260.4	273.8	294.7	336.8
140°	217.4	209.8	202.2	209.8	217.4	219.3	237.0	260.6	272.4	290.6	327.0
142.5°	221.7	214.8	207.7	214.8	221.7	223.5	239.8	261.5	272.4	288.4	320.3
145°	228.4	222.3	216.2	222.3	228.4	229.9	243.5	261.6	270.6	283.7	309.7
147.5°	236.5	230.7	224.7	230.7	236.5	238.1	249.0	263.4	270.6	280.9	301.4
150°	240.9	235.5	230.1	235.5	240.9	242.3	251.7	264.3	270.6	279.3	296.6
152.5°	244.0	239.9	235.8	239.9	244.0	245.0	253.6	264.9	270.6	278.1	292.9
155°	250.4	247.3	244.3	247.3	250.4	251.1	257.6	266.3	270.6	276.5	288.3
157.5°	256.4	253.5	250.6	253.5	256.4	257.2	261.6	267.6	270.6	275.2	284.4
160°	259.4	257.1	254.8	257.1	259.4	259.9	263.5	268.2	270.6	274.6	282.4
162.5°	262.4	260.7	259.0	260.7	262.4	262.9	265.5	268.9	270.6	273.9	280.6
165°	266.8	265.2	263.7	265.2	266.8	267.2	268.3	269.8	270.6	273.0	277.7
167.5°	269.3	268.6	267.9	268.6	269.3	269.5	270.5	271.8	272.4	274.0	277.2
170°	272.1	271.4	270.6	271.4	272.1	272.2	272.3	272.4	272.4	274.0	277.2
172.5°	272.4	272.2	272.1	272.2	272.4	272.4	272.4	272.4	272.4	273.7	276.1
175°	274.1	274.1	274.1	274.1	274.1	274.1	273.6	272.8	272.4	273.2	274.8
177.5°	274.1	274.1	274.1	274.1	274.1	274.1	273.7	273.1	272.9	273.5	274.7
180°	274.1	274.1	274.1	274.1	274.1	274.1	274.1	274.1	274.1	274.1	274.1



TEST NUMBER: P934233

CATALOG NUMBER: SQ4-FA-050U-050D-92765-1D-UNV-STD-W-4-3500K

CANDELA DISTRIBUTION (continued):

	247.5°	250°	260°	270°	280°	290°	292.5°	300°	310°	315°	320°
0°	632.8	632.8	632.8	632.8	632.8	632.8	632.8	632.8	632.8	632.8	632.8
2.5°	610.6	608.9	611.2	604.7	611.2	608.9	610.6	614.8	611.2	613.6	616.0
5°	535.8	532.8	523.3	515.4	523.3	532.8	535.8	548.3	554.3	565.1	579.5
7.5°	478.9	476.5	474.2	469.3	474.2	476.5	478.9	482.5	488.5	498.1	508.9
10°	466.3	466.9	470.5	470.0	470.5	466.9	466.3	465.1	463.4	465.1	471.7
12.5°	498.7	504.1	523.8	522.6	523.8	504.1	498.7	474.7	458.5	455.6	456.8
15°	535.8	537.5	541.7	542.4	541.7	537.5	535.8	526.2	477.7	456.8	450.1
17.5°	539.4	539.9	543.0	543.0	543.0	539.9	539.4	535.2	519.1	490.9	453.8
20°	536.4	537.5	543.6	544.8	543.6	537.5	536.4	531.0	522.0	511.8	483.7
22.5°	535.2	537.5	542.4	541.7	542.4	537.5	535.2	526.8	519.1	511.8	500.5
25°	529.2	529.2	529.8	530.4	529.8	529.2	529.2	522.6	507.0	505.2	498.7
27.5°	516.6	517.8	521.4	520.8	521.4	517.8	516.6	514.2	497.5	495.7	490.9
30°	505.2	504.1	501.0	498.7	501.0	504.1	505.2	501.7	484.9	480.1	481.3
32.5°	486.1	483.1	480.1	478.4	480.1	483.1	486.1	484.9	472.3	465.8	466.9
35°	463.4	464.0	463.4	461.6	463.4	464.0	463.4	464.5	456.8	450.8	450.1
37.5°	447.2	448.4	447.7	445.4	447.7	448.4	447.2	446.0	435.2	433.5	434.6
40°	430.4	431.0	430.4	428.6	430.4	431.0	430.4	428.0	413.1	413.6	417.8
42.5°	414.3	413.6	411.9	410.7	411.9	413.6	414.3	410.7	391.5	389.7	397.5
45°	395.7	396.3	392.7	390.9	392.7	396.3	395.7	393.3	373.6	368.7	374.2
47.5°	377.1	377.1	374.2	372.3	374.2	377.1	377.1	374.2	353.2	348.4	351.4
50°	357.4	356.8	352.6	352.0	352.6	356.8	357.4	355.6	333.5	329.3	329.3
52.5°	334.6	334.6	335.3	336.4	335.3	334.6	334.6	335.3	315.5	311.3	310.1
55°	314.9	315.5	319.6	320.9	319.6	315.5	314.9	314.9	296.9	292.7	290.4
57.5°	294.6	294.6	297.5	297.5	297.5	294.6	294.6	293.3	276.0	272.3	271.2
60°	271.2	272.3	274.7	274.2	274.7	272.3	271.2	270.0	255.0	252.6	248.4
62.5°	246.6	247.9	248.4	247.3	248.4	247.9	246.6	243.1	234.0	232.3	226.9
65°	220.9	222.1	222.7	221.5	222.7	222.1	220.9	219.1	212.5	209.5	204.8
67.5°	194.6	194.0	193.3	195.8	193.3	194.0	194.6	192.2	188.0	185.6	179.0
70°	167.6	167.6	167.0	168.3	167.0	167.6	167.6	165.8	163.4	161.7	155.7
72.5°	138.9	138.3	140.7	138.9	140.7	138.3	138.9	138.3	137.1	135.3	129.3
75°	110.8	111.9	110.8	112.6	110.8	111.9	110.8	111.3	110.8	109.5	105.3
77.5°	84.4	85.6	84.4	84.4	84.4	85.6	84.4	85.0	85.0	85.0	81.4
80°	59.9	59.3	59.3	58.6	59.3	59.3	59.9	59.9	60.4	59.3	58.1
82.5°	38.3	37.8	37.8	38.9	37.8	37.8	38.3	38.9	37.8	37.8	37.8
85°	21.0	21.5	20.4	20.4	20.4	21.5	21.0	19.7	21.0	21.0	20.4
87.5°	7.8	7.1	7.1	7.1	7.1	7.1	7.8	8.4	8.4	8.4	9.0
90°	7.0	7.0	7.0	7.0	7.0	7.0	7.0	9.3	12.4	14.0	12.1
92.5°	35.0	33.6	28.0	22.4	28.0	33.6	35.0	49.5	69.0	78.7	69.1
95°	118.6	114.4	97.6	80.8	97.6	114.4	118.6	155.8	205.3	230.1	194.3
97.5°	273.9	265.9	233.9	201.8	233.9	265.9	273.9	297.4	328.8	344.4	284.7
100°	384.7	375.2	337.0	298.8	337.0	375.2	384.7	383.0	380.7	379.5	313.3
102.5°	479.2	471.0	438.4	405.7	438.4	471.0	479.2	449.3	409.4	389.5	322.3
105°	589.7	585.3	567.7	550.1	567.7	585.3	589.7	522.5	433.1	388.4	323.4
107.5°	647.1	648.1	652.3	656.6	652.3	648.1	647.1	553.5	428.7	366.3	309.0
110°	661.8	666.3	684.6	702.9	684.6	666.3	661.8	557.2	417.7	347.9	296.3



TEST NUMBER: P934233

CATALOG NUMBER: SQ4-FA-050U-050D-92765-1D-UNV-STD-W-4-3500K

CANDELA DISTRIBUTION (continued):

	247.5°	250°	260°	270°	280°	290°	292.5°	300°	310°	315°	320°
112.5°	652.4	659.5	687.6	715.7	687.6	659.5	652.4	545.3	402.6	331.2	285.1
115°	620.5	630.3	669.3	708.3	669.3	630.3	620.5	517.4	379.8	311.1	272.2
117.5°	576.5	587.3	630.6	673.9	630.6	587.3	576.5	483.4	359.4	297.3	264.3
120°	547.0	557.5	599.5	641.5	599.5	557.5	547.0	461.9	348.5	291.8	261.6
122.5°	517.4	527.7	569.2	610.6	569.2	527.7	517.4	440.8	338.6	287.5	260.2
125°	478.2	487.7	525.8	564.0	525.8	487.7	478.2	413.1	326.3	283.0	259.0
127.5°	446.7	454.7	486.9	519.1	486.9	454.7	446.7	390.8	316.3	279.1	258.4
130°	426.9	434.3	464.1	493.8	464.1	434.3	426.9	377.1	310.8	277.6	258.8
132.5°	409.9	416.6	443.2	469.9	443.2	416.6	409.9	365.3	306.0	276.4	259.0
135°	386.0	391.7	414.7	437.7	414.7	391.7	386.0	348.7	298.9	274.1	258.8
137.5°	368.3	373.0	391.8	410.6	391.8	373.0	368.3	336.8	294.7	273.8	260.4
140°	354.2	358.6	376.2	393.7	376.2	358.6	354.2	327.0	290.6	272.4	260.6
142.5°	344.2	347.9	363.1	378.3	363.1	347.9	344.2	320.3	288.4	272.4	261.5
145°	329.3	332.1	343.7	355.1	343.7	332.1	329.3	309.7	283.7	270.6	261.6
147.5°	316.8	319.2	328.7	338.1	328.7	319.2	316.8	301.4	280.9	270.6	263.4
150°	309.6	311.6	319.3	327.0	319.3	311.6	309.6	296.6	279.3	270.6	264.3
152.5°	303.9	305.4	311.2	317.0	311.2	305.4	303.9	292.9	278.1	270.6	264.9
155°	297.2	298.1	302.0	305.8	302.0	298.1	297.2	288.3	276.5	270.6	266.3
157.5°	291.3	292.0	294.7	297.3	294.7	292.0	291.3	284.4	275.2	270.6	267.6
160°	288.3	288.7	290.3	291.8	290.3	288.7	288.3	282.4	274.6	270.6	268.2
162.5°	285.5	285.9	287.4	288.9	287.4	285.9	285.5	280.6	273.9	270.6	268.9
165°	281.3	281.6	283.2	284.8	283.2	281.6	281.3	277.7	273.0	270.6	269.8
167.5°	279.5	279.7	280.3	280.9	280.3	279.7	279.5	277.2	274.0	272.4	271.8
170°	279.5	279.5	279.5	279.5	279.5	279.5	279.5	277.2	274.0	272.4	272.4
172.5°	278.0	277.8	277.2	276.7	277.2	277.8	278.0	276.1	273.7	272.4	272.4
175°	276.0	276.0	276.0	276.0	276.0	276.0	276.0	274.8	273.2	272.4	272.8
177.5°	275.6	275.5	274.8	274.1	274.8	275.5	275.6	274.7	273.5	272.9	273.1
180°	274.1	274.1	274.1	274.1	274.1	274.1	274.1	274.1	274.1	274.1	274.1



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CANDELA DISTRIBUTION (continued):

	330°	337.5°	340°	350°	360°
0°	632.8	632.8	632.8	632.8	632.8
2.5°	625.0	628.0	629.7	632.2	638.1
5°	601.0	612.4	616.0	625.0	635.7
7.5°	548.3	583.1	592.6	614.2	631.0
10°	497.5	532.2	549.0	599.8	625.0
12.5°	471.7	492.1	503.4	574.7	616.6
15°	455.6	470.0	478.4	541.2	607.0
17.5°	443.0	453.2	459.2	508.3	593.9
20°	435.2	440.0	445.4	484.3	578.9
22.5°	429.8	426.9	431.0	467.6	558.5
25°	426.2	414.9	419.6	454.3	534.6
27.5°	429.3	404.1	405.9	442.4	509.4
30°	429.8	390.9	391.5	429.8	481.3
32.5°	425.6	377.1	377.8	414.3	449.6
35°	415.4	361.0	360.4	396.3	406.5
37.5°	401.7	343.7	343.7	376.5	359.2
40°	384.9	326.3	328.0	350.8	317.2
42.5°	364.5	307.7	310.1	316.7	286.2
45°	342.4	289.7	291.5	267.6	262.2
47.5°	317.9	271.2	271.8	222.1	254.4
50°	288.6	252.0	249.7	190.4	253.9
52.5°	262.8	231.1	223.9	172.4	230.5
55°	237.6	209.0	193.3	158.6	213.7
57.5°	215.5	180.2	165.2	142.5	210.1
60°	195.1	152.0	140.7	125.1	192.8
62.5°	178.4	131.1	128.7	113.2	174.8
65°	160.4	116.8	116.1	103.0	148.4
67.5°	143.1	107.1	106.6	93.4	113.2
70°	124.5	96.9	95.8	83.2	83.8
72.5°	105.3	85.6	84.4	74.8	69.4
75°	86.2	72.4	71.9	65.3	56.2
77.5°	67.7	57.5	58.6	52.7	41.3
80°	48.5	41.9	43.1	37.8	31.2
82.5°	32.3	27.6	28.7	23.9	21.0
85°	17.9	15.5	16.2	12.6	9.6
87.5°	8.4	7.1	7.1	4.8	3.0
90°	8.1	5.2	4.8	3.3	1.9
92.5°	49.9	35.5	32.4	19.8	7.3
95°	122.8	69.2	63.5	40.5	17.7
97.5°	165.4	76.0	70.9	50.7	30.5
100°	180.9	81.7	77.1	58.7	40.4
102.5°	188.1	87.4	83.1	66.1	48.9
105°	193.3	95.9	92.2	77.7	63.3
107.5°	194.3	108.4	105.0	91.5	78.0
110°	192.9	115.3	112.3	100.1	87.9



TEST NUMBER: P934233

CATALOG NUMBER: SQ4-FA-050U-050D-92765-1D-UNV-STD-W-4-3500K

CANDELA DISTRIBUTION (continued):

	330°	337.5°	340°	350°	360°
112.5°	192.9	123.8	120.9	109.3	97.7
115°	194.7	136.5	133.8	123.1	112.4
117.5°	198.3	148.8	146.4	136.7	126.9
120°	201.3	156.0	153.7	144.6	135.4
122.5°	205.5	164.5	162.2	153.0	143.7
125°	211.2	175.3	173.2	164.8	156.4
127.5°	216.9	185.8	183.7	175.2	166.7
130°	221.1	192.8	190.5	181.4	172.2
132.5°	224.5	198.5	196.2	187.1	177.9
135°	228.2	205.1	203.1	194.7	186.4
137.5°	233.7	213.6	211.6	203.2	195.0
140°	237.0	219.3	217.4	209.8	202.2
142.5°	239.8	223.5	221.7	214.8	207.7
145°	243.5	229.9	228.4	222.3	216.2
147.5°	249.0	238.1	236.5	230.7	224.7
150°	251.7	242.3	240.9	235.5	230.1
152.5°	253.6	245.0	244.0	239.9	235.8
155°	257.6	251.1	250.4	247.3	244.3
157.5°	261.6	257.2	256.4	253.5	250.6
160°	263.5	259.9	259.4	257.1	254.8
162.5°	265.5	262.9	262.4	260.7	259.0
165°	268.3	267.2	266.8	265.2	263.7
167.5°	270.5	269.5	269.3	268.6	267.9
170°	272.3	272.2	272.1	271.4	270.6
172.5°	272.4	272.4	272.4	272.2	272.1
175°	273.6	274.1	274.1	274.1	274.1
177.5°	273.7	274.1	274.1	274.1	274.1
180°	274.1	274.1	274.1	274.1	274.1



TEST NUMBER: P934233

CATALOG NUMBER: SQ4-FA-050U-050D-92765-1D-UNV-STD-W-4-3500K

CIE UGR TABLE:

Reflectances:											
Ceiling		0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3
Wall		0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3
Reference plane		0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2
Room dimensions		Viewed crosswise					Viewed endwise				
X=2H	Y=2H	10.76	11.60	11.73	12.59	13.89	13.56	14.40	14.53	15.39	16.69
	3H	11.23	11.99	12.22	12.99	14.31	14.89	15.65	15.87	16.64	17.96
	4H	11.42	12.14	12.42	13.14	14.47	15.33	16.04	16.33	17.04	18.37
	6H	11.54	12.20	12.55	13.21	14.55	15.60	16.26	16.61	17.27	18.61
	8H	11.54	12.17	12.56	13.19	14.53	15.67	16.30	16.69	17.32	18.66
	12H	11.51	12.11	12.53	13.13	14.49	15.71	16.30	16.73	17.32	18.68
4H	2H	11.78	12.50	12.79	13.50	14.83	13.96	14.68	14.97	15.68	17.01
	3H	12.81	13.40	13.82	14.43	15.77	15.46	16.06	16.47	17.08	18.43
	4H	13.08	13.63	14.10	14.65	16.01	15.98	16.52	17.00	17.55	18.91
	6H	13.21	13.67	14.24	14.72	16.08	16.34	16.80	17.37	17.85	19.21
	8H	13.21	13.65	14.24	14.69	16.06	16.44	16.87	17.47	17.91	19.29
	12H	13.18	13.57	14.23	14.63	16.01	16.49	16.88	17.54	17.94	19.32
8H	4H	13.53	13.97	14.56	15.00	16.38	16.10	16.54	17.14	17.58	18.96
	6H	13.79	14.15	14.85	15.23	16.61	16.53	16.89	17.59	17.97	19.35
	8H	13.83	14.15	14.90	15.21	16.61	16.68	17.00	17.74	18.06	19.45
	12H	13.81	14.10	14.88	15.15	16.59	16.77	17.05	17.84	18.11	19.54
12H	4H	13.53	13.93	14.58	14.98	16.36	16.07	16.46	17.12	17.52	18.90
	6H	13.85	14.17	14.91	15.23	16.63	16.53	16.85	17.59	17.91	19.30
	8H	13.91	14.19	14.98	15.25	16.69	16.68	16.96	17.75	18.02	19.46