

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: METALUX

Report Number: P237763

Luminaire Tested: **2VRVT2-LD5-3-DR-W-UNV-L850-CD1-WL-U**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P237763
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1710-355-4)
Test Lab: INNOVATION CENTER(G3)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 2VRVT2-LD5-3-DR-W-UNV-L850-CD1-WL-U
Description: METALUX VRVT2 LED LUMINAIRE
INTERNAL PRISMATIC LENS/15% DR HIGH IMPACT ADDITIVE WIDE DISTRIBUTION
2FT FIXTURE
Light Source: (112) 5000K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2897.0 lumens
Efficiency: N/A
Efficacy: 132.9 lumens/watt
Spacing Criteria (0/90/45): 1.22 / 1.59 / 1.58
Luminous Opening: Rectangular w/ Sides (W: 0.5' x L: 2.08' x H: 0.17')
CIE Type: Direct

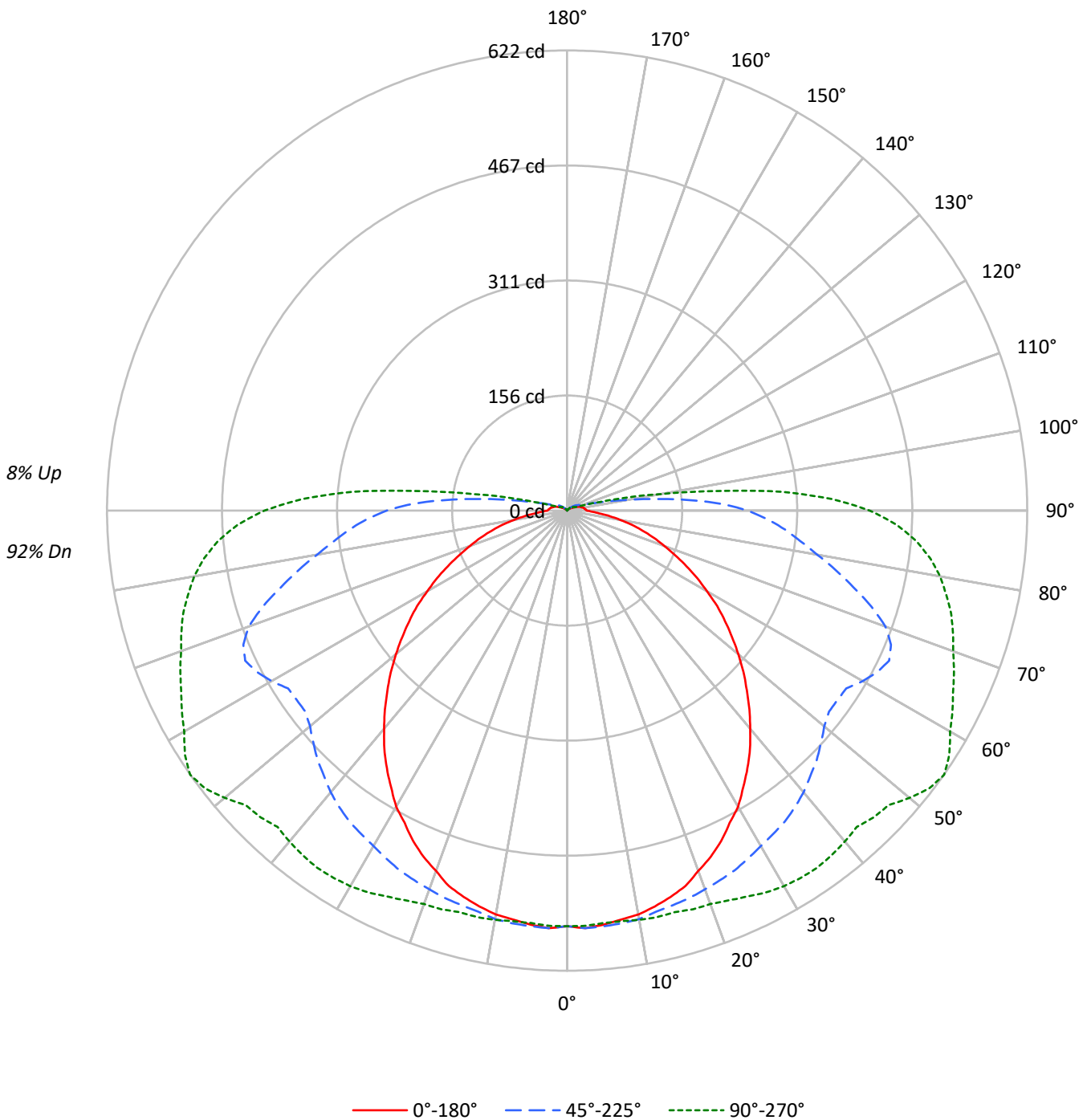
Input Watts (W): 21.8
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	117	117	117	117	113	113	113	113	106	106	106	100	100	100	94	94	94	92
1	102	95	89	83	98	92	86	81	86	81	77	80	76	73	75	72	69	66
2	90	80	71	64	87	77	69	62	72	65	59	67	62	57	63	58	54	51
3	81	68	59	51	78	66	57	50	62	54	48	58	51	46	54	48	44	41
4	74	60	49	42	71	58	48	41	54	46	39	50	43	38	47	41	36	33
5	67	53	42	35	64	51	41	34	48	39	33	45	38	32	42	36	31	28
6	62	47	37	30	59	46	36	29	43	35	28	40	33	27	38	31	27	24
7	57	42	33	26	55	41	32	26	39	31	25	36	29	24	34	28	23	21
8	53	38	29	23	51	37	29	23	35	27	22	33	26	21	31	25	21	18
9	50	35	26	20	48	34	26	20	32	25	19	31	24	19	29	23	18	16
10	46	32	24	18	45	31	23	18	30	23	18	28	22	17	27	21	17	15

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	5805	5805	5805
5°	5787	5703	5641
10°	5736	5595	5568
15°	5662	5478	5517
20°	5538	5415	5551
25°	5418	5381	5680
30°	5270	5346	5866
35°	5077	5372	6027
40°	4864	5385	6156
45°	4647	5394	6425
50°	4434	5409	6952
55°	4215	5671	7594
60°	3964	6327	7832
65°	3717	7218	8207
70°	3465	7673	8759
75°	3259	7652	9561
80°	2992	7689	10541
85°	2694	8077	11679



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	53.6	1.8
10°-20°	156.2	5.4
20°-30°	247.0	8.5
30°-40°	319.3	11.0
40°-50°	364.3	12.6
50°-60°	399.6	13.8
60°-70°	411.6	14.2
70°-80°	386.7	13.3
80°-90°	313.6	10.8
90°-100°	176.9	6.1
100°-110°	43.6	1.5
110°-120°	14.3	0.5
120°-130°	7.4	0.3
130°-140°	2.7	0.1
140°-150°	0.2	0.0
150°-160°	0.0	0.0
160°-170°	0.0	0.0
170°-180°	0.0	0.0
0°-30°	456.9	15.8
0°-40°	776.1	26.8
0°-60°	1540.0	53.2
0°-90°	2651.9	91.5
90°-120°	234.8	8.1
90°-150°	245.1	8.5
90°-180°	245.0	8.5
0°-180°	2897.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	562	562	562	562	562	
5°	562	564	564	562	560	53
15°	541	543	552	561	562	152
25°	493	504	536	564	576	227
35°	425	449	513	570	589	266
45°	343	385	477	552	586	265
55°	261	315	446	587	622	233
65°	178	253	480	554	576	177
75°	106	250	401	497	537	112
85°	44	173	296	424	474	42
90°	26	126	244	361	409	15
95°	24	84	164	254	292	19
105°	19	28	40	44	44	20
115°	11	14	18	14	11	11
125°	5	5	11	10	8	5
135°	2	1	4	5	5	1
145°	0	0	0	0	0	0
155°	0	0	0	0	0	0
165°	0	0	0	0	0	0
175°	0	0	0	0	0	0
180°	0	0	0	0	0	0



TEST NUMBER: P237763

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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
0°	561.8	561.8	561.8	561.8	561.8	561.8	561.8	561.8	561.8	561.8	561.8
2.5°	565.0	565.0	563.9	565.0	565.0	563.9	565.0	565.0	565.0	565.0	565.0
5°	561.8	562.8	562.8	562.8	562.8	563.9	563.9	563.9	563.9	563.9	563.9
7.5°	557.5	558.6	559.7	559.7	560.7	560.7	560.7	560.7	561.8	562.8	562.8
10°	554.4	554.4	555.4	556.5	555.4	556.5	557.5	557.5	558.6	559.7	560.7
12.5°	548.0	548.0	549.1	550.1	550.1	550.1	551.2	552.2	553.3	554.4	555.4
15°	540.6	540.6	541.6	541.6	542.7	542.7	542.7	544.8	546.9	550.1	552.2
17.5°	532.1	531.0	532.1	533.2	534.2	535.3	535.3	538.5	543.8	546.9	549.1
20°	518.3	520.4	521.5	523.6	524.7	524.7	526.8	532.1	536.3	539.5	544.8
22.5°	506.7	507.7	507.7	510.9	514.1	514.1	516.2	521.5	527.9	533.2	540.6
25°	492.9	492.9	495.0	497.1	501.4	503.5	505.6	513.0	519.4	527.9	536.3
27.5°	475.9	478.0	480.2	482.3	488.6	491.8	496.1	503.5	512.0	521.5	530.0
30°	462.1	462.1	464.3	467.4	474.9	479.1	483.3	492.9	502.4	513.0	523.6
32.5°	443.1	444.1	447.3	451.5	460.0	465.3	469.6	481.2	491.8	503.5	518.3
35°	425.0	426.1	430.3	435.6	445.2	449.4	455.8	468.5	481.2	496.1	513.0
37.5°	406.0	407.0	410.2	418.7	429.3	434.6	440.9	453.7	469.6	487.6	505.6
40°	384.8	387.9	391.1	401.7	411.3	418.7	425.0	440.9	459.0	479.1	497.1
42.5°	364.6	366.7	372.0	382.6	393.2	402.8	409.1	426.1	447.3	467.4	486.5
45°	343.4	345.5	353.0	363.6	377.3	384.8	393.2	412.3	435.6	455.8	477.0
47.5°	323.3	326.5	332.8	344.5	358.3	367.8	377.3	398.5	420.8	443.1	465.3
50°	302.1	305.3	312.7	325.4	339.2	349.8	360.4	383.7	407.0	430.3	453.7
52.5°	280.9	284.1	292.5	305.3	321.2	332.8	343.4	367.8	393.2	417.6	446.2
55°	260.7	262.9	272.4	286.2	304.2	314.8	325.4	351.9	378.4	408.1	446.2
57.5°	240.6	240.6	252.3	267.1	286.2	296.8	309.5	336.0	367.8	407.0	447.3
60°	218.4	221.5	232.1	247.0	269.2	280.9	293.6	323.3	363.6	409.1	461.1
62.5°	198.2	201.4	212.0	227.9	252.3	266.0	280.9	318.0	365.7	420.8	472.7
65°	178.1	181.3	191.9	212.0	238.5	253.3	272.4	319.0	376.3	434.6	480.2
67.5°	157.9	162.2	176.0	196.1	227.9	247.0	269.2	326.5	389.0	439.9	473.8
70°	139.9	144.2	160.1	184.4	220.5	244.8	272.4	336.0	392.2	431.4	457.9
72.5°	123.0	128.3	146.3	174.9	218.4	247.0	277.7	338.1	383.7	412.3	431.4
75°	106.0	112.4	134.6	169.6	219.4	250.1	278.8	328.6	363.6	383.7	400.7
77.5°	90.1	97.5	125.1	164.3	218.4	244.8	268.2	306.3	330.7	350.8	372.0
80°	73.1	84.8	115.5	159.0	206.7	226.8	243.8	272.4	297.8	318.0	343.4
82.5°	58.3	72.1	104.9	146.3	184.4	201.4	215.2	241.7	265.0	290.4	318.0
85°	43.5	59.4	92.2	127.2	159.0	172.8	186.6	210.9	235.3	263.9	295.7
87.5°	32.9	47.7	77.4	107.1	135.7	147.3	160.1	185.5	209.9	238.5	271.3
90°	26.5	39.2	63.6	90.1	114.5	126.1	137.8	160.1	186.6	212.0	243.8
92.5°	25.4	32.9	53.0	74.2	95.4	106.0	115.5	135.7	159.0	182.3	208.8
95°	24.4	27.6	41.3	58.3	75.3	83.7	91.2	107.1	125.1	143.1	164.3
97.5°	23.3	24.4	32.9	44.5	57.2	63.6	70.0	81.6	93.3	106.0	118.7
100°	22.3	22.3	26.5	35.0	43.5	47.7	50.9	60.4	67.8	75.3	83.7
102.5°	20.1	20.1	22.3	26.5	32.9	36.0	38.2	43.5	48.8	54.1	58.3
105°	19.1	18.0	19.1	22.3	25.4	27.6	29.7	32.9	35.0	38.2	40.3
107.5°	17.0	17.0	17.0	19.1	21.2	22.3	23.3	25.4	27.6	28.6	29.7
110°	14.8	14.8	13.8	15.9	18.0	19.1	20.1	21.2	22.3	23.3	23.3



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CANDELA DISTRIBUTION (continued):

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
112.5°	12.7	12.7	12.7	12.7	14.8	15.9	17.0	18.0	20.1	20.1	20.1
115°	10.6	10.6	10.6	10.6	12.7	13.8	14.8	15.9	17.0	18.0	18.0
117.5°	8.5	8.5	8.5	8.5	10.6	10.6	11.7	13.8	14.8	15.9	15.9
120°	7.4	7.4	7.4	6.4	8.5	9.5	9.5	11.7	12.7	13.8	14.8
122.5°	6.4	5.3	5.3	5.3	6.4	6.4	7.4	9.5	10.6	11.7	12.7
125°	5.3	4.2	4.2	4.2	4.2	5.3	6.4	7.4	9.5	10.6	10.6
127.5°	4.2	3.2	3.2	3.2	3.2	3.2	4.2	5.3	7.4	8.5	8.5
130°	3.2	3.2	3.2	2.1	2.1	2.1	2.1	4.2	5.3	6.4	7.4
132.5°	2.1	2.1	2.1	2.1	1.1	1.1	1.1	2.1	3.2	4.2	5.3
135°	2.1	2.1	2.1	1.1	1.1	1.1	1.1	1.1	2.1	3.2	4.2
137.5°	1.1	1.1	1.1	1.1	1.1	1.1	0.0	0.0	1.1	2.1	2.1
140°	1.1	1.1	1.1	1.1	0.0	0.0	0.0	0.0	0.0	0.0	1.1
142.5°	1.1	1.1	1.1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
145°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
147.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
150°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
152.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
155°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
157.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
162.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	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):

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°
0°	561.8	561.8	561.8	561.8	561.8	561.8	561.8	561.8	561.8	561.8
2.5°	565.0	565.0	563.9	563.9	563.9	562.8	562.8	561.8	561.8	561.8
5°	563.9	563.9	562.8	562.8	561.8	561.8	560.7	560.7	560.7	559.7
7.5°	561.8	561.8	561.8	560.7	560.7	560.7	559.7	559.7	559.7	559.7
10°	559.7	559.7	559.7	560.7	560.7	560.7	560.7	561.8	561.8	561.8
12.5°	556.5	557.5	559.7	559.7	560.7	560.7	560.7	561.8	562.8	562.8
15°	553.3	556.5	558.6	560.7	560.7	561.8	561.8	562.8	562.8	561.8
17.5°	552.2	555.4	558.6	560.7	561.8	562.8	563.9	565.0	566.0	565.0
20°	549.1	554.4	558.6	561.8	562.8	562.8	566.0	567.1	567.1	566.0
22.5°	545.9	552.2	556.5	560.7	562.8	563.9	567.1	568.1	569.2	570.3
25°	542.7	548.0	555.4	561.8	563.9	567.1	570.3	573.4	574.5	575.6
27.5°	539.5	546.9	556.5	563.9	567.1	570.3	575.6	579.8	579.8	581.9
30°	534.2	546.9	556.5	566.0	569.2	573.4	580.9	585.1	586.2	586.2
32.5°	532.1	545.9	557.5	567.1	571.3	574.5	581.9	586.2	588.3	588.3
35°	527.9	542.7	555.4	565.0	570.3	573.4	580.9	587.2	588.3	589.3
37.5°	521.5	537.4	551.2	561.8	566.0	571.3	578.7	583.0	586.2	587.2
40°	515.1	530.0	544.8	556.5	561.8	566.0	574.5	580.9	583.0	584.0
42.5°	504.5	522.6	537.4	551.2	556.5	560.7	570.3	575.6	579.8	579.8
45°	496.1	513.0	531.0	544.8	552.2	558.6	571.3	580.9	586.2	586.2
47.5°	486.5	505.6	526.8	549.1	557.5	565.0	576.6	583.0	588.3	589.3
50°	478.0	505.6	531.0	551.2	559.7	569.2	585.1	596.8	603.1	604.2
52.5°	477.0	507.7	535.3	562.8	573.4	585.1	599.9	609.5	614.8	616.9
55°	479.1	517.3	551.2	575.6	587.2	595.7	608.4	616.9	620.1	622.2
57.5°	491.8	531.0	561.8	583.0	591.5	597.8	606.3	609.5	612.7	612.7
60°	504.5	540.6	562.8	577.7	584.0	589.3	594.6	597.8	599.9	597.8
62.5°	513.0	538.5	555.4	565.0	569.2	572.4	578.7	584.0	584.0	587.2
65°	508.8	526.8	540.6	550.1	554.4	558.6	567.1	571.3	576.6	575.6
67.5°	495.0	512.0	522.6	535.3	540.6	544.8	555.4	560.7	566.0	566.0
70°	473.8	488.6	502.4	516.2	521.5	527.9	539.5	548.0	552.2	555.4
72.5°	446.2	462.1	480.2	500.3	509.8	516.2	530.0	539.5	545.9	546.9
75°	419.7	440.9	466.4	488.6	497.1	505.6	520.4	530.0	534.2	537.4
77.5°	395.4	420.8	448.4	472.7	482.3	491.8	506.7	517.3	523.6	524.7
80°	372.0	401.7	429.3	455.8	466.4	474.9	490.8	502.4	508.8	512.0
82.5°	348.7	381.6	410.2	437.8	448.4	459.0	474.9	486.5	493.9	495.0
85°	327.5	358.3	387.9	414.4	424.0	436.7	453.7	465.3	471.7	473.8
87.5°	302.1	331.8	360.4	385.8	396.4	408.1	425.0	437.8	443.1	446.2
90°	271.3	301.0	326.5	350.8	361.4	371.0	385.8	399.6	406.0	409.1
92.5°	234.2	260.7	286.2	306.3	315.9	323.3	340.2	350.8	355.1	358.3
95°	186.6	205.6	227.9	245.9	254.4	260.7	272.4	283.0	289.4	291.5
97.5°	132.5	147.3	157.9	171.7	174.9	182.3	191.9	198.2	202.5	201.4
100°	91.2	100.7	107.1	112.4	114.5	118.7	124.0	125.1	129.3	128.3
102.5°	61.5	64.7	67.8	71.0	72.1	73.1	76.3	75.3	77.4	78.4
105°	41.3	42.4	43.5	44.5	44.5	44.5	44.5	44.5	44.5	43.5
107.5°	29.7	28.6	28.6	28.6	27.6	27.6	26.5	26.5	26.5	25.4
110°	23.3	22.3	21.2	20.1	19.1	19.1	18.0	18.0	17.0	17.0



TEST NUMBER: P237763

CATALOG NUMBER: 2VRVT2-LD5-3-DR-W-UNV-L850-CD1-WL-U

CANDELA DISTRIBUTION (continued):

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°
112.5°	19.1	18.0	17.0	15.9	15.9	14.8	14.8	13.8	12.7	12.7
115°	17.0	15.9	15.9	14.8	13.8	13.8	12.7	11.7	11.7	10.6
117.5°	15.9	14.8	13.8	12.7	12.7	12.7	11.7	10.6	10.6	10.6
120°	13.8	13.8	12.7	12.7	11.7	11.7	10.6	10.6	9.5	9.5
122.5°	12.7	12.7	11.7	11.7	10.6	10.6	9.5	9.5	9.5	8.5
125°	10.6	10.6	10.6	10.6	9.5	9.5	9.5	8.5	8.5	8.5
127.5°	9.5	9.5	9.5	9.5	8.5	8.5	8.5	8.5	7.4	7.4
130°	7.4	8.5	8.5	8.5	8.5	7.4	7.4	7.4	7.4	7.4
132.5°	6.4	6.4	6.4	6.4	6.4	6.4	6.4	6.4	6.4	6.4
135°	4.2	5.3	5.3	5.3	5.3	5.3	5.3	5.3	5.3	5.3
137.5°	3.2	3.2	4.2	4.2	4.2	4.2	4.2	4.2	4.2	4.2
140°	1.1	2.1	2.1	2.1	3.2	3.2	3.2	3.2	2.1	2.1
142.5°	0.0	0.0	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1
145°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
147.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
150°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
152.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
155°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
157.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
162.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)