

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: P233252

Luminaire Tested: **2VRVT3-LD5-3-W-UNV-L850-CD1-U**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P233252
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1709-268-18)
Test Lab: INNOVATION CENTER(G3)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 2VRVT3-LD5-3-W-UNV-L850-CD1-U
Description: 2FT VRVT3 WIDE APPLICATION, 3000LM
Light Source: (196) 5000K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 3547.0 lumens
Efficiency: N/A
Efficacy: 142.8 lumens/watt
Spacing Criteria (0/90/45): 1.26 / 1.66 / 1.64
Luminous Opening: Rectangular w/ Sides (W: 0.42' x L: 2' x H: 0.17')
CIE Type: Semi-Direct

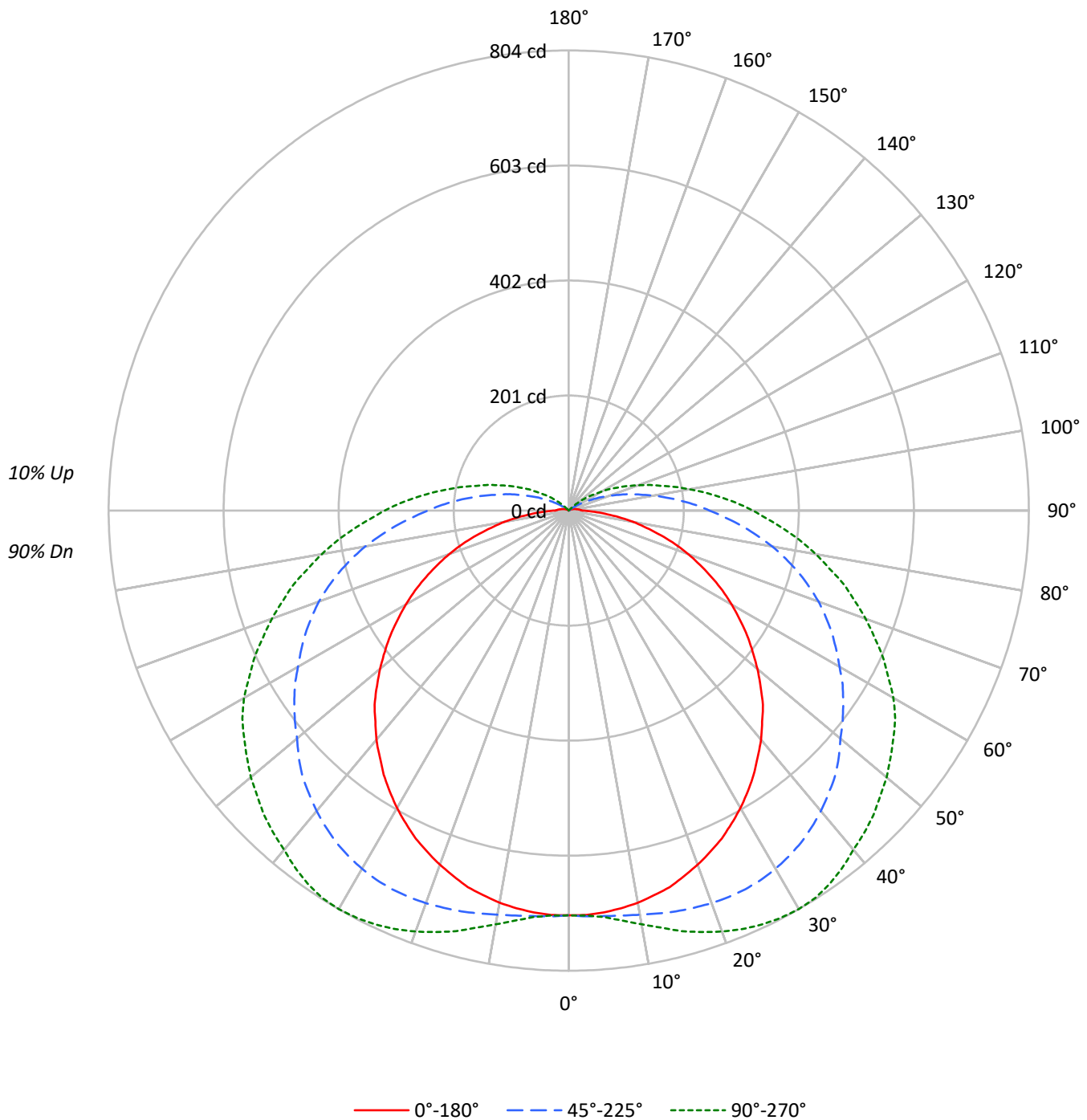
Input Watts (W): 24.84
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P233252

CATALOG NUMBER: 2VRVT3-LD5-3-W-UNV-L850-CD1-U

Luminous Intensity Polar Plot





TEST NUMBER: P233252

CATALOG NUMBER: 2VRVT3-LD5-3-W-UNV-L850-CD1-U

COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20					20					20					20
RC	80				70					50					30					10
RW	70	50	30	10	70	50	30	10		50	30	10			50	30	10			50
RCR																				
0	117	117	117	117	113	113	113	113		106	106	106			99	99	99			93
1	103	96	91	86	99	93	88	83		87	83	79			81	78	75			76
2	92	82	74	67	88	79	72	65		74	68	62			69	64	59			64
3	83	71	61	54	79	68	60	53		64	56	50			60	53	48			56
4	75	62	52	44	72	60	51	44		56	48	42			52	46	40			49
5	69	55	45	38	66	53	44	37		50	42	35			46	40	34			44
6	63	49	39	32	61	47	38	32		44	37	31			42	35	29			39
7	59	44	35	28	56	43	34	28		40	32	27			38	31	26			36
8	54	40	31	25	52	39	30	24		37	29	24			35	28	23			33
9	51	36	28	22	49	35	27	22		34	26	21			32	25	20			30
10	47	33	25	20	46	33	25	19		31	24	19			29	23	18			28

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	9135	9135	9135
5°	9071	8954	8931
10°	8994	8868	8993
15°	8910	8882	9189
20°	8785	8923	9391
25°	8677	8973	9586
30°	8538	9001	9739
35°	8396	9008	9802
40°	8241	8980	9769
45°	8090	8954	9821
50°	7866	8846	9866
55°	7663	8859	9926
60°	7423	8867	9999
65°	7136	8951	9965
70°	6813	9045	9934
75°	6334	9100	9964
80°	5784	9147	9977
85°	4805	9146	10065



TEST NUMBER: P233252

CATALOG NUMBER: 2VRVT3-LD5-3-W-UNV-L850-CD1-U

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	68.0	1.9
10°-20°	204.7	5.8
20°-30°	333.6	9.4
30°-40°	434.4	12.2
40°-50°	490.7	13.8
50°-60°	502.6	14.2
60°-70°	469.9	13.2
70°-80°	395.6	11.2
80°-90°	291.5	8.2
90°-100°	187.1	5.3
100°-110°	103.5	2.9
110°-120°	47.8	1.3
120°-130°	15.8	0.4
130°-140°	1.7	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°-30°	606.3	17.1
0°-40°	1040.7	29.3
0°-60°	2034.0	57.3
0°-90°	3191.0	90.0
90°-120°	338.5	9.5
90°-150°	356.0	10.0
90°-180°	356.0	10.0
0°-180°	3547.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	707	707	707	707	707	
5°	705	706	711	714	713	67
15°	681	693	725	753	761	192
25°	632	663	730	782	798	291
35°	564	611	708	777	796	352
45°	480	541	658	730	753	369
55°	381	454	585	669	693	340
65°	275	361	508	587	606	273
75°	166	270	415	481	498	176
85°	63	179	303	364	378	62
90°	24	132	246	304	322	15
95°	19	93	197	250	266	14
105°	11	31	110	157	167	11
115°	5	6	46	84	96	5
125°	2	2	10	34	43	2
135°	1	0	0	1	6	0
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: P233252

CATALOG NUMBER: 2VRVT3-LD5-3-W-UNV-L850-CD1-U

CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
0°	707.2	707.2	707.2	707.2	707.2	707.2	707.2	707.2	707.2	707.2	707.2
2.5°	707.2	706.4	706.4	706.4	707.2	708.0	708.0	708.8	708.8	709.6	709.6
5°	704.7	703.9	704.7	704.7	705.6	706.4	707.2	708.0	708.8	710.4	711.2
7.5°	700.7	700.7	700.7	702.3	703.1	703.9	705.6	707.2	709.6	712.1	713.7
10°	695.8	695.8	696.6	697.4	699.9	701.5	703.1	706.4	709.6	713.7	716.9
12.5°	688.5	688.5	689.3	691.8	695.0	697.4	699.9	704.7	710.4	715.3	721.0
15°	681.2	680.4	682.0	686.1	690.1	693.4	696.6	703.1	709.6	716.9	725.0
17.5°	669.8	670.6	673.1	678.0	683.6	687.7	691.8	699.9	709.6	717.7	727.5
20°	658.5	659.3	662.5	667.4	675.5	680.4	686.1	695.8	707.2	718.6	729.9
22.5°	645.5	646.3	650.3	657.7	667.4	672.3	678.8	690.9	703.9	716.9	730.7
25°	632.5	633.3	638.2	645.5	656.8	663.3	669.8	685.3	699.9	715.3	729.9
27.5°	616.2	618.7	624.4	633.3	645.5	652.0	660.9	677.1	693.4	710.4	727.5
30°	600.0	601.6	607.3	618.7	632.5	640.6	648.7	666.6	686.1	703.9	722.6
32.5°	582.1	584.6	591.9	602.4	619.5	627.6	635.7	656.0	676.3	696.6	716.1
35°	563.5	565.9	572.4	586.2	603.3	611.4	621.9	643.0	665.0	686.9	708.0
37.5°	542.4	545.6	554.5	568.3	585.4	596.0	607.3	629.2	652.8	675.5	697.4
40°	522.9	524.5	533.4	548.0	566.7	578.1	589.5	614.6	638.2	662.5	685.3
42.5°	500.1	504.2	513.9	529.4	548.9	559.4	571.6	597.6	623.6	647.1	671.5
45°	479.8	481.5	492.0	509.1	529.4	540.7	553.7	578.9	604.9	631.7	657.7
47.5°	454.7	457.1	468.5	486.3	508.3	520.4	532.6	561.0	587.8	615.4	639.8
50°	430.3	434.4	445.7	464.4	487.2	499.3	513.1	539.9	569.2	594.3	619.5
52.5°	405.1	410.0	422.2	440.9	464.4	478.2	491.2	519.6	547.2	575.7	603.3
55°	380.8	384.9	396.2	416.5	442.5	453.9	467.7	497.7	526.1	557.0	585.4
57.5°	354.0	359.7	373.5	393.8	419.0	431.9	446.6	475.0	507.5	539.1	567.5
60°	328.8	332.9	349.1	369.4	394.6	407.6	422.2	453.9	487.2	518.8	546.4
62.5°	302.8	307.7	323.1	344.3	370.2	384.9	399.5	431.9	466.9	497.7	526.9
65°	275.2	281.7	298.8	319.1	347.5	361.3	377.5	411.6	444.9	477.4	507.5
67.5°	248.4	254.1	272.8	294.7	320.7	338.6	354.8	390.5	425.4	457.9	486.3
70°	221.7	227.3	244.4	269.6	298.0	315.8	332.1	367.8	403.5	434.4	464.4
72.5°	194.9	200.5	219.2	243.6	275.2	291.5	310.2	346.7	380.8	413.3	440.1
75°	166.4	176.2	193.2	220.8	252.5	270.4	288.2	324.8	358.1	388.9	414.9
77.5°	138.8	149.4	168.9	197.3	229.8	249.3	267.1	302.0	335.3	362.9	388.1
80°	114.5	123.4	144.5	172.1	207.9	224.9	242.8	277.7	309.3	337.8	361.3
82.5°	87.7	98.2	119.4	150.2	184.3	202.2	220.0	251.7	282.5	308.5	331.3
85°	63.3	73.9	97.4	129.1	160.8	178.6	194.9	227.3	255.8	281.7	302.8
87.5°	41.4	52.0	76.3	108.0	138.8	155.1	169.7	199.7	228.2	253.3	273.6
90°	23.5	35.7	59.3	87.7	117.7	132.3	147.8	176.2	202.2	225.7	246.0
92.5°	21.1	25.2	44.7	71.4	98.2	113.7	126.7	153.5	179.4	201.4	221.7
95°	18.7	19.5	31.7	55.2	81.2	93.4	107.2	133.2	156.7	177.8	197.3
97.5°	16.2	16.2	21.9	39.8	63.3	76.3	88.5	112.0	135.6	155.9	172.9
100°	13.8	14.6	15.4	27.6	47.9	60.1	70.6	93.4	114.5	132.3	150.2
102.5°	12.2	12.2	13.0	18.7	34.1	44.7	54.4	75.5	94.2	112.0	128.3
105°	10.6	10.6	10.6	12.2	23.5	30.9	39.8	58.5	77.1	94.2	110.4
107.5°	8.9	8.9	8.9	9.7	15.4	21.9	28.4	43.8	60.9	77.1	91.7
110°	7.3	7.3	7.3	8.1	8.9	13.8	19.5	31.7	46.3	62.5	74.7



TEST NUMBER: P233252

CATALOG NUMBER: 2VRVT3-LD5-3-W-UNV-L850-CD1-U

CANDELA DISTRIBUTION (continued):

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
112.5°	5.7	5.7	5.7	6.5	6.5	7.3	12.2	22.7	34.1	47.9	60.9
115°	4.9	4.9	4.9	4.9	5.7	5.7	5.7	13.8	24.4	35.7	46.3
117.5°	4.1	4.1	4.1	4.1	4.1	4.1	4.9	8.1	16.2	26.0	34.9
120°	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2	8.9	17.1	25.2
122.5°	2.4	2.4	2.4	2.4	2.4	2.4	2.4	2.4	3.2	9.7	17.1
125°	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6	2.4	9.7
127.5°	0.8	0.8	0.8	0.8	0.8	1.6	1.6	1.6	1.6	1.6	2.4
130°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
132.5°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.0	0.0	0.0	0.0
135°	0.8	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
137.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
140°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
142.5°	0.0	0.0	0.0	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



TEST NUMBER: P233252

CATALOG NUMBER: 2VRVT3-LD5-3-W-UNV-L850-CD1-U

CANDELA DISTRIBUTION (continued):

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°
0°	707.2	707.2	707.2	707.2	707.2	707.2	707.2	707.2	707.2	707.2
2.5°	710.4	710.4	710.4	709.6	709.6	709.6	708.8	708.8	708.0	708.0
5°	712.1	712.9	713.7	713.7	713.7	713.7	713.7	713.7	712.9	712.9
7.5°	716.1	717.7	718.6	720.2	720.2	721.0	721.8	721.8	721.8	722.6
10°	720.2	723.4	725.9	729.1	729.9	730.7	732.4	732.4	733.2	734.0
12.5°	725.9	730.7	735.6	739.7	740.5	742.1	743.7	746.2	746.2	746.2
15°	731.5	738.8	744.5	748.6	752.7	753.5	755.9	759.1	759.1	760.8
17.5°	737.2	745.3	754.3	760.0	763.2	765.6	768.1	769.7	772.9	772.1
20°	741.3	751.0	760.0	768.1	770.5	772.9	777.8	781.1	782.7	782.7
22.5°	742.9	755.1	764.8	773.8	777.0	780.3	785.1	789.2	790.8	791.6
25°	743.7	756.7	768.1	777.8	781.9	785.1	791.6	794.9	797.3	798.1
27.5°	742.9	756.7	769.7	780.3	784.3	788.4	794.9	798.9	802.2	802.2
30°	739.7	755.1	768.9	780.3	785.1	789.2	795.7	800.6	803.0	803.8
32.5°	734.0	751.0	765.6	777.0	782.7	786.8	794.1	798.9	801.4	802.2
35°	727.5	744.5	760.0	771.3	777.0	781.1	788.4	792.4	794.9	795.7
37.5°	717.7	735.6	751.0	763.2	768.1	772.1	777.8	783.5	785.1	785.9
40°	706.4	724.2	738.8	751.0	755.1	760.0	764.8	770.5	772.9	773.8
42.5°	692.6	709.6	725.0	737.2	741.3	747.0	754.3	759.1	762.4	764.0
45°	676.3	695.0	710.4	724.2	729.9	733.2	742.1	747.8	751.0	752.7
47.5°	660.1	680.4	696.6	710.4	716.1	721.8	729.9	734.8	738.0	738.0
50°	644.7	664.2	681.2	695.8	701.5	708.0	715.3	721.0	724.2	725.0
52.5°	628.4	648.7	665.8	680.4	686.1	691.8	699.9	705.6	708.8	708.8
55°	609.8	631.7	648.7	662.5	669.0	673.9	683.6	688.5	692.6	692.6
57.5°	591.1	613.0	630.9	645.5	652.8	656.8	666.6	671.5	675.5	676.3
60°	572.4	593.5	612.2	627.6	632.5	639.0	645.5	651.2	654.4	655.2
62.5°	552.9	574.0	592.7	604.9	612.2	615.4	623.6	626.8	630.1	629.2
65°	534.2	552.9	570.8	583.0	587.0	592.7	597.6	603.3	605.7	605.7
67.5°	511.5	530.2	546.4	558.6	564.3	567.5	573.2	576.5	580.5	578.1
70°	487.2	505.0	519.6	531.8	535.9	539.9	546.4	549.7	552.1	552.1
72.5°	462.0	479.0	493.6	504.2	508.3	513.1	518.0	521.3	522.9	523.7
75°	435.2	452.2	465.2	475.8	480.7	486.3	490.4	495.3	496.1	497.7
77.5°	410.0	425.4	437.6	449.8	452.2	456.3	461.2	465.2	466.9	466.0
80°	380.0	398.7	408.4	419.0	423.0	426.3	431.9	434.4	438.4	438.4
82.5°	349.9	366.2	377.5	389.7	394.6	396.2	403.5	407.6	408.4	409.2
85°	322.3	336.9	349.1	358.9	363.7	365.4	371.9	378.4	379.2	378.4
87.5°	291.5	306.9	319.9	328.8	332.9	336.9	342.6	345.9	349.1	348.3
90°	263.9	278.5	291.5	301.2	304.5	308.5	313.4	318.3	319.1	321.5
92.5°	237.1	252.5	265.5	274.4	279.3	280.9	286.6	290.7	292.3	294.7
95°	212.7	225.7	237.9	249.3	250.1	254.1	259.8	263.1	267.1	266.3
97.5°	188.4	203.0	213.5	221.7	225.7	229.8	234.6	237.9	240.3	240.3
100°	164.8	178.6	188.4	196.5	201.4	203.0	207.9	211.9	213.5	213.5
102.5°	143.7	155.1	164.8	174.6	177.0	179.4	184.3	189.2	189.2	190.8
105°	122.6	134.8	144.5	152.6	156.7	157.5	162.4	165.6	168.1	167.3
107.5°	103.9	115.3	125.8	132.3	135.6	138.0	142.9	145.3	147.8	148.6
110°	87.7	97.4	107.2	114.5	116.9	120.2	125.0	127.5	129.9	129.1



TEST NUMBER: P233252

CATALOG NUMBER: 2VRVT3-LD5-3-W-UNV-L850-CD1-U

CANDELA DISTRIBUTION (continued):

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°
112.5°	71.4	82.0	90.1	97.4	100.7	103.1	108.0	109.6	112.0	112.0
115°	57.6	66.6	74.7	82.0	84.4	86.9	90.9	93.4	95.0	95.8
117.5°	43.8	53.6	61.7	68.2	69.8	73.1	77.1	78.8	80.4	82.0
120°	33.3	40.6	47.9	53.6	56.8	58.5	62.5	65.0	66.6	66.6
122.5°	24.4	30.9	37.3	42.2	44.7	46.3	50.3	52.8	53.6	53.6
125°	15.4	21.9	26.8	31.7	34.1	35.7	38.2	40.6	42.2	43.0
127.5°	8.9	13.8	18.7	22.7	24.4	26.0	29.2	30.9	32.5	32.5
130°	1.6	5.7	10.6	13.8	15.4	17.1	19.5	21.1	22.7	22.7
132.5°	0.0	0.0	3.2	6.5	7.3	8.9	11.4	13.0	13.8	13.8
135°	0.0	0.0	0.0	0.0	0.8	1.6	4.1	4.9	5.7	5.7
137.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
140°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
142.5°	0.0	0.0	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
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)