

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: io LED

Report Number: P273418

Luminaire Tested: **0.05-06W-827-90ASYM-STD-UNV-AN-3F0**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P273418
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1708-246-12)
Test Lab: INNOVATION CENTER
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: io LED
Catalog Number: 0.05-06W-827-90ASYM-STD-UNV-AN-3F0
Description: iO LIGHTING SERIES 2.0 LINEAR LED LUMINAIRE. 90 DEGREE ASYMMETRIC OPTIC.
HIGH OUTPUT
Light Source: 2700K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 715.5 lumens
Efficiency: N/A
Efficacy: 53.8 lumens/watt
Spacing Criteria (0/90/45): 1.03 / 0.97 / 1.19
Luminous Opening: Rectangular (W 2.92' x L: 0.21' x H: 0')
CIE Type: Direct

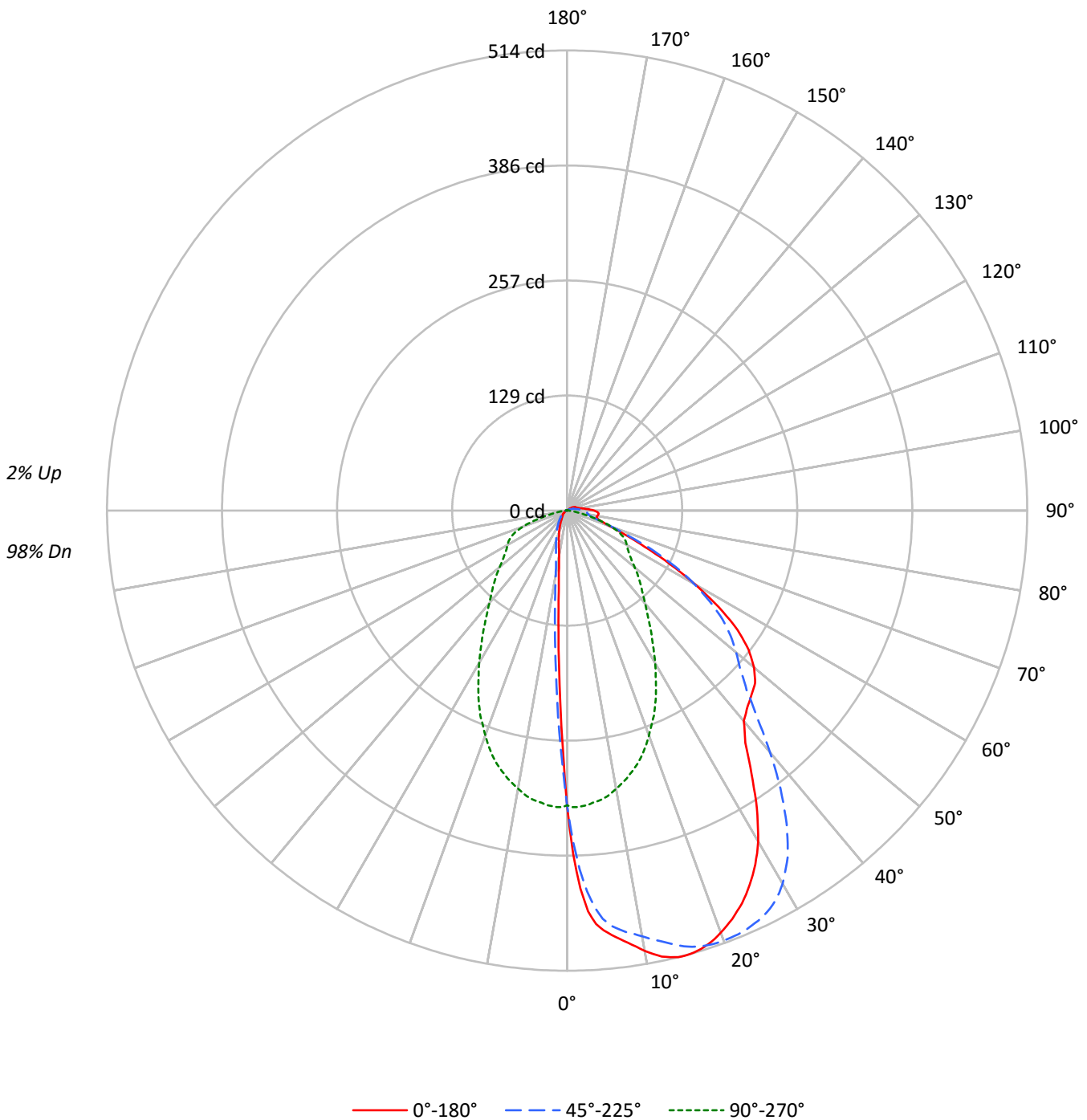
Input Watts (W): 13.3
Input Voltage (V): 120
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	50	30	10	50	30	10	0		
RCR																										
0	119	119	119	119	116	116	116	116	110	110	110	105	105	105	100	100	100	98					98			
1	109	105	101	98	106	103	99	96	98	95	92	94	91	89	90	88	86	84					84			
2	100	93	87	82	98	91	85	80	87	82	78	84	80	76	80	77	74	72					72			
3	92	83	75	69	90	81	74	68	78	72	67	75	70	65	72	68	64	62					62			
4	85	74	66	59	83	72	65	59	70	63	58	67	61	57	65	60	56	54					54			
5	78	66	58	52	76	65	57	51	63	56	51	61	55	50	59	53	49	47					47			
6	73	60	52	45	71	59	51	45	57	50	45	55	49	44	53	48	44	42					42			
7	67	55	46	40	66	54	46	40	52	45	40	50	44	39	49	43	39	37					37			
8	63	50	42	36	61	49	41	36	48	41	36	46	40	35	45	39	35	33					33			
9	59	46	38	33	57	45	38	33	44	37	32	43	37	32	42	36	32	30					30			
10	55	42	35	30	54	42	35	30	41	34	29	40	34	29	39	33	29	27					27			

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	5833	5833	5833
5°	8372	5827	1977
10°	8983	5675	926
15°	9434	5427	649
20°	9460	5037	496
25°	9247	4570	377
30°	8728	4019	282
35°	7759	3518	221
40°	7097	3126	192
45°	7295	2904	178
50°	7515	2706	163
55°	7184	2622	133
60°	5874	2728	85
65°	4003	2884	101
70°	2564	2730	124
75°	2423	1964	137
80°	3489	1285	204
85°	7195	874	406



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	28.6	4.0
10°-20°	78.8	11.0
20°-30°	119.2	16.7
30°-40°	137.0	19.2
40°-50°	131.6	18.4
50°-60°	109.9	15.4
60°-70°	59.5	8.3
70°-80°	21.8	3.1
80°-90°	12.9	1.8
90°-100°	7.6	1.1
100°-110°	4.0	0.6
110°-120°	2.5	0.3
120°-130°	1.3	0.2
130°-140°	0.4	0.1
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°	226.7	31.7
0°-40°	363.7	50.8
0°-60°	605.3	84.6
0°-90°	699.6	97.8
90°-120°	14.1	2.0
90°-150°	15.9	2.2
90°-180°	16.0	2.2
0°-180°	715.5	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	329	329	329	329	329	
5°	471	458	328	154	111	45
15°	514	504	296	48	35	144
25°	473	505	234	28	19	216
35°	359	428	163	17	10	226
45°	291	284	116	10	7	225
55°	233	212	85	6	4	203
65°	96	107	69	3	2	99
75°	35	30	29	2	2	40
85°	35	22	4	2	2	28
90°	30	18	1	1	2	16
95°	21	14	1	1	2	16
105°	12	7	1	1	1	13
115°	9	4	1	1	1	9
125°	5	1	1	1	1	5
135°	1	1	1	1	1	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



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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
0°	329.3	329.3	329.3	329.3	329.3	329.3	329.3	329.3	329.3	329.3	329.3
1°	383.9	382.7	383.9	378.0	378.4	380.4	380.4	376.8	378.8	370.6	369.0
2°	422.4	421.6	421.6	416.5	416.5	418.1	417.3	413.0	413.0	404.3	400.8
3°	448.4	447.2	446.8	442.9	442.9	443.6	442.9	439.3	437.7	430.3	426.0
4°	462.9	462.5	461.3	458.6	458.6	459.4	458.6	456.2	455.0	448.7	444.8
5°	470.8	470.8	469.2	467.2	467.2	468.0	466.8	465.6	464.1	460.5	457.8
6°	476.6	475.9	475.5	473.1	473.1	473.5	472.7	471.5	470.4	468.0	466.0
7°	482.1	481.4	480.6	478.2	478.6	478.2	477.4	475.9	475.1	473.1	471.1
8°	487.6	486.9	486.5	483.7	483.7	483.3	482.5	480.6	479.8	477.4	475.5
9°	493.2	492.4	492.0	489.2	489.2	488.8	487.6	486.1	484.1	481.4	479.0
10°	499.4	498.7	498.3	495.5	495.1	494.3	493.2	491.6	488.8	486.1	482.9
11°	504.5	504.5	503.0	501.0	500.2	499.8	498.7	497.1	493.9	490.4	487.3
12°	509.3	509.3	507.7	505.7	504.9	504.5	503.4	501.8	498.3	495.5	491.2
13°	512.0	512.0	510.8	508.9	508.9	508.5	507.3	506.1	502.6	499.8	495.5
14°	514.0	514.0	512.8	510.8	511.2	510.8	510.0	509.3	506.1	503.8	499.8
15°	514.4	514.8	513.2	511.6	512.4	512.0	511.6	510.8	509.3	506.9	503.8
16°	513.6	514.4	512.8	511.2	512.4	512.0	512.0	511.2	510.8	509.3	506.9
17°	512.0	512.8	511.6	510.0	511.6	511.2	511.2	511.2	511.6	510.4	508.9
18°	509.3	510.4	509.7	508.5	510.0	510.4	510.4	510.0	511.6	511.2	510.4
19°	506.1	507.3	506.9	506.1	507.7	508.5	508.5	508.9	510.8	511.2	511.2
20°	501.8	503.4	503.0	502.6	504.9	505.3	506.1	506.9	509.7	510.4	511.2
21°	497.1	499.0	499.0	498.7	501.0	502.2	503.4	504.5	507.7	509.3	510.8
22°	492.0	493.9	493.9	493.9	496.7	498.3	499.4	502.2	505.7	508.5	510.4
23°	486.1	488.0	488.0	488.4	491.6	493.5	495.1	498.3	503.0	506.9	509.3
24°	480.2	481.8	482.1	482.5	486.1	488.0	489.6	493.5	499.4	504.5	507.3
25°	473.1	475.1	475.1	475.9	479.8	481.8	483.7	488.4	495.1	501.0	505.3
26°	464.9	467.2	468.0	468.8	472.7	474.7	477.0	482.1	490.0	496.3	502.6
27°	456.6	459.0	460.1	460.1	465.3	467.2	470.0	475.5	484.5	491.2	499.0
28°	447.6	449.9	449.9	451.9	456.6	459.0	461.7	468.0	477.4	484.9	494.3
29°	437.7	440.1	440.1	442.5	447.2	449.9	452.7	459.7	468.4	477.8	488.4
30°	426.7	429.1	429.5	431.5	436.6	439.3	442.5	450.3	459.0	469.6	481.4
32.5°	394.5	397.3	397.3	401.6	405.5	410.2	412.6	421.2	432.6	444.4	458.6
35°	358.8	361.5	361.1	363.5	369.8	372.5	377.2	386.3	398.1	412.6	427.5
37.5°	326.9	328.5	327.7	329.7	334.0	338.3	341.9	348.9	360.7	376.1	391.4
40°	306.9	307.3	306.5	306.1	308.1	309.6	311.6	315.9	324.6	337.5	352.5
42.5°	297.9	296.7	295.5	294.3	293.1	293.1	292.4	293.1	296.3	303.7	314.4
45°	291.2	290.8	289.2	287.6	285.3	284.5	282.9	279.8	277.8	279.4	283.7
47.5°	284.9	283.7	282.1	280.6	277.8	276.6	273.9	269.2	265.6	263.3	262.1
50°	272.7	271.1	269.6	268.4	266.0	264.8	262.1	257.8	254.2	249.9	246.4
52.5°	255.4	253.5	252.7	251.5	249.1	247.6	245.2	242.1	238.9	235.8	230.3
55°	232.6	231.4	230.7	231.1	228.3	227.5	225.9	222.0	219.3	216.1	211.8
57.5°	200.8	200.0	200.4	202.4	202.0	202.4	202.4	200.4	198.0	194.1	189.0
60°	165.8	165.0	165.8	167.8	168.2	169.4	170.5	172.1	172.5	169.4	163.9
62.5°	129.7	128.5	128.9	130.1	130.1	131.6	133.2	136.0	138.7	139.1	137.5
65°	95.5	94.3	94.3	94.7	94.3	95.5	96.3	97.1	100.2	104.5	106.9



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CANDELA DISTRIBUTION (continued):

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
67.5°	68.4	67.6	67.6	67.6	67.6	68.0	67.6	68.4	69.9	72.7	75.8
70°	49.5	49.1	49.1	49.1	48.7	49.1	49.5	49.5	50.3	51.5	53.0
72.5°	40.1	39.7	39.7	39.3	38.5	38.5	38.1	37.7	37.3	37.7	38.5
75°	35.4	35.4	35.0	34.6	33.8	33.4	32.6	31.8	31.0	30.3	29.9
77.5°	33.8	33.8	33.4	32.6	31.8	31.0	30.6	29.1	27.9	26.7	25.5
80°	34.2	33.8	33.4	32.6	31.4	31.0	30.3	28.7	27.1	25.1	23.6
82.5°	35.0	35.0	34.6	33.4	32.2	31.4	30.6	29.1	27.1	25.1	22.8
85°	35.4	35.0	34.6	33.4	32.2	31.4	30.3	28.3	26.3	24.4	22.0
87.5°	33.4	33.0	32.6	31.4	29.9	29.5	28.3	26.3	24.8	22.4	20.4
90°	30.3	29.5	29.1	27.9	26.7	25.9	25.1	23.2	21.6	20.0	18.1
92.5°	25.5	25.1	24.8	23.6	22.8	22.0	21.2	19.6	18.5	17.3	16.1
95°	21.2	20.8	20.4	19.6	18.9	18.5	17.7	16.5	15.7	14.5	13.8
97.5°	17.7	17.3	16.9	16.5	15.7	15.3	14.9	14.1	13.4	12.6	11.8
100°	14.9	14.9	14.5	14.1	13.4	13.0	12.6	12.2	11.4	10.6	10.2
102.5°	13.0	13.0	12.6	12.2	11.8	11.4	11.0	10.6	9.8	9.0	8.6
105°	11.8	11.4	11.4	11.0	10.6	10.2	9.8	9.0	8.3	7.9	7.1
107.5°	11.0	10.6	10.6	10.2	9.4	9.4	9.0	8.3	7.5	6.7	6.3
110°	10.2	10.2	9.8	9.4	9.0	8.6	8.3	7.9	6.7	5.9	5.1
112.5°	9.8	9.8	9.4	9.0	8.6	8.3	7.9	7.1	6.3	5.5	4.3
115°	9.4	9.0	9.0	8.6	7.9	7.5	7.1	6.3	5.5	4.3	3.5
117.5°	8.3	8.3	8.3	7.5	7.1	6.7	6.3	5.5	4.7	3.5	2.8
120°	7.5	7.1	7.1	6.7	5.9	5.5	5.5	4.7	3.5	2.8	2.0
122.5°	6.3	5.9	5.9	5.5	5.1	4.7	4.3	3.5	2.8	2.0	1.6
125°	4.7	4.7	4.7	4.3	3.9	3.5	3.1	2.8	2.0	1.6	0.8
127.5°	3.9	3.5	3.5	3.1	2.8	2.8	2.4	2.0	1.2	0.8	0.8
130°	2.8	2.8	2.4	2.4	2.0	1.6	1.2	0.8	0.8	0.8	0.8
132.5°	1.6	1.6	1.6	1.2	0.8	0.8	0.8	0.8	0.8	0.8	0.8
135°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
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



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CANDELA DISTRIBUTION (continued):

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
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°	95°
0°	329.3	329.3	329.3	329.3	329.3	329.3	329.3	329.3	329.3	329.3	329.3
1°	366.6	358.0	354.8	352.5	349.7	345.8	343.4	340.7	335.6	331.3	326.1
2°	395.7	384.7	379.2	372.9	369.0	362.7	356.8	349.3	340.3	331.3	321.0
3°	419.7	407.9	399.6	391.0	386.3	378.4	368.6	357.6	344.2	330.5	315.1
4°	438.5	426.7	417.3	407.1	401.6	392.9	380.0	365.4	347.4	329.7	309.6
5°	452.3	441.7	432.2	421.2	415.3	406.3	390.6	371.7	350.5	327.7	303.4
6°	461.7	452.3	443.6	433.4	427.5	418.1	400.4	378.8	353.7	326.5	296.7
7°	468.0	460.1	452.7	443.6	437.4	428.7	409.5	385.5	356.0	324.6	290.0
8°	472.7	465.6	459.4	451.5	446.0	437.4	417.7	391.8	358.4	322.2	283.3
9°	475.9	469.2	464.1	457.0	452.3	444.8	424.8	396.5	359.5	319.1	275.5
10°	479.8	472.3	467.6	461.7	457.4	451.1	431.5	401.6	361.1	315.5	267.6
11°	483.7	475.5	470.8	465.3	461.3	455.8	437.0	405.9	362.3	312.0	259.3
12°	487.3	478.6	473.9	468.4	464.9	459.4	441.7	410.2	363.5	308.5	251.5
13°	491.6	481.4	476.6	471.5	467.6	462.5	446.0	414.2	364.3	304.5	243.2
14°	495.1	485.7	479.4	473.9	470.4	465.3	449.5	418.1	364.7	300.2	235.0
15°	498.7	489.2	482.1	475.9	472.3	467.2	452.7	420.8	365.0	295.9	226.3
16°	502.2	492.8	484.9	477.8	474.7	469.6	455.4	423.6	365.0	291.2	217.7
17°	505.7	496.7	487.6	480.2	477.0	472.3	457.8	426.3	364.7	285.7	208.7
18°	508.9	499.8	491.6	482.9	479.8	474.7	460.1	428.7	363.9	279.8	200.4
19°	510.4	502.6	494.3	486.1	481.8	477.0	462.5	431.1	362.7	273.9	191.4
20°	511.2	504.9	497.1	488.4	483.3	478.6	464.5	433.0	361.1	267.2	182.3
21°	511.6	506.9	499.0	490.8	485.7	480.6	466.4	434.6	359.5	260.5	174.1
22°	512.0	508.1	501.8	493.5	487.6	482.5	468.4	437.0	358.8	254.2	165.8
23°	511.2	508.5	503.0	495.1	490.0	484.1	470.4	438.9	357.2	248.3	157.6
24°	510.0	508.9	504.5	497.1	492.4	486.1	472.3	440.5	355.2	240.9	149.7
25°	509.3	508.9	504.9	498.3	494.3	488.4	473.5	441.7	352.9	233.8	142.2
26°	507.7	508.5	505.7	500.2	495.9	490.0	475.1	442.5	349.7	226.3	134.8
27°	505.3	507.3	506.5	502.2	497.9	492.4	477.0	443.2	346.2	218.5	128.1
28°	502.6	506.1	506.9	503.8	499.8	494.3	479.4	444.8	342.7	210.6	121.4
29°	499.0	504.2	506.1	504.9	502.2	497.1	481.4	446.8	338.7	203.9	115.5
30°	493.9	501.4	505.3	505.7	503.8	499.0	483.3	447.6	335.2	196.5	110.4
32.5°	475.9	490.4	499.8	506.9	507.3	504.2	489.2	450.3	324.6	178.4	98.2
35°	448.4	470.4	488.4	503.0	506.9	508.9	496.7	453.5	313.6	162.7	86.8
37.5°	416.1	440.1	467.6	491.6	501.0	506.9	502.6	456.2	300.2	147.7	79.4
40°	376.8	403.6	436.2	471.1	484.9	499.0	504.9	457.0	286.1	135.2	72.7
42.5°	336.0	363.1	397.7	438.9	459.7	481.0	501.4	454.2	269.2	124.6	67.6
45°	298.2	321.4	355.2	400.8	425.6	453.5	489.6	445.6	252.3	115.9	63.7
47.5°	267.2	282.5	311.6	357.2	384.3	418.9	472.7	433.8	234.2	107.3	60.1
50°	245.2	251.9	271.5	310.4	336.8	374.1	447.2	421.2	218.1	98.2	55.8
52.5°	227.1	227.5	236.9	264.1	288.0	324.2	411.0	403.6	205.1	90.8	51.5
55°	207.5	204.7	207.9	224.4	240.9	270.3	362.7	381.9	195.3	84.9	46.8
57.5°	185.9	180.8	180.8	189.0	199.2	221.2	301.8	349.7	186.7	80.2	42.8
60°	160.3	154.4	152.5	156.8	162.7	177.6	244.8	305.7	176.8	77.0	39.7
62.5°	132.8	127.3	125.4	126.9	129.7	140.3	189.0	252.3	163.5	73.5	36.5
65°	105.7	101.0	98.2	99.0	100.2	108.5	141.5	194.1	144.6	68.8	33.8



TEST NUMBER: P273418

CATALOG NUMBER: 0.05-06W-827-90ASYM-STD-UNV-AN-3F0

CANDELA DISTRIBUTION (continued):

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°	95°
67.5°	78.6	77.8	76.2	76.6	78.2	81.3	104.1	140.7	118.7	62.5	30.3
70°	55.8	57.8	58.5	58.9	59.3	61.3	74.7	97.8	88.4	52.7	26.3
72.5°	39.7	41.7	44.0	45.2	45.6	46.4	53.8	66.8	62.5	40.9	20.8
75°	30.3	31.0	32.6	35.0	35.0	35.8	39.3	45.2	42.4	28.7	15.7
77.5°	24.8	24.8	25.5	27.1	27.5	27.9	29.5	31.4	27.9	19.3	10.6
80°	22.4	21.6	21.2	21.6	22.0	22.0	22.4	21.6	18.5	12.6	6.7
82.5°	20.8	19.6	18.5	18.1	17.7	17.3	16.9	14.9	12.2	7.5	3.5
85°	20.0	18.1	16.5	15.3	14.9	14.1	13.0	10.6	7.9	4.3	2.0
87.5°	18.5	16.5	14.9	13.4	12.6	11.8	9.8	7.5	4.7	2.4	0.8
90°	16.5	14.9	13.4	11.4	10.6	9.8	7.9	5.1	2.8	0.8	0.8
92.5°	14.5	13.4	11.8	10.2	9.0	8.3	5.9	3.5	1.6	0.8	0.8
95°	12.6	11.8	10.2	8.6	7.9	6.7	4.7	2.4	0.8	0.8	0.8
97.5°	11.0	10.2	8.6	7.1	6.3	5.5	3.1	1.2	0.8	0.8	0.8
100°	9.4	8.6	7.5	5.9	5.1	3.9	2.0	0.8	0.8	0.8	0.8
102.5°	7.9	7.1	5.9	4.3	3.5	2.8	1.2	0.8	0.8	0.8	0.8
105°	6.3	5.5	4.7	3.1	2.4	1.6	0.8	0.8	0.8	0.8	0.8
107.5°	5.5	4.3	3.5	2.4	1.6	1.2	0.8	0.8	0.8	0.8	0.8
110°	4.3	3.5	2.4	1.6	0.8	0.8	0.8	0.8	0.8	0.8	0.8
112.5°	3.5	2.4	1.6	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
115°	2.8	1.6	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
117.5°	2.0	1.2	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
120°	1.2	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
122.5°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
125°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
127.5°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
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	0.8	0.8	0.8	0.8
135°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
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



TEST NUMBER: P273418

CATALOG NUMBER: 0.05-06W-827-90ASYM-STD-UNV-AN-3F0

CANDELA DISTRIBUTION (continued):

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°	95°
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: P273418

CATALOG NUMBER: 0.05-06W-827-90ASYM-STD-UNV-AN-3F0

CANDELA DISTRIBUTION (continued):

	100°	105°	110°	112.5°	115°	120°	125°	130°	135°	140°	145°
0°	329.3	329.3	329.3	329.3	329.3	329.3	329.3	329.3	329.3	329.3	329.3
1°	319.5	313.2	307.7	305.3	302.2	298.6	297.5	289.2	285.7	282.9	279.8
2°	309.6	299.0	289.2	286.9	279.4	271.5	266.8	255.0	248.0	242.8	236.9
3°	299.8	284.1	270.7	266.0	256.6	244.8	236.6	222.4	212.6	205.5	197.7
4°	288.8	269.2	251.9	244.8	234.2	219.3	208.3	192.5	180.8	172.5	163.9
5°	278.2	254.6	233.4	224.8	212.6	195.3	182.3	166.2	153.6	145.0	136.0
6°	267.2	239.7	215.3	205.1	192.5	173.3	159.5	143.0	130.5	121.8	113.6
7°	255.8	224.8	198.4	187.0	174.1	154.0	139.1	123.8	111.6	103.7	95.1
8°	244.8	210.6	182.3	170.5	157.2	136.7	122.2	107.7	95.5	88.0	81.7
9°	233.4	196.9	166.6	154.4	141.5	121.0	107.3	93.1	83.3	77.0	71.1
10°	222.0	183.5	152.5	140.3	127.7	108.1	94.3	82.5	73.5	68.0	63.3
11°	211.0	170.9	139.5	126.9	115.1	95.9	84.1	73.5	65.6	60.9	57.0
12°	200.0	158.8	127.7	115.5	103.7	86.4	75.4	66.4	59.7	55.8	52.3
13°	189.4	147.4	116.7	105.3	93.9	78.2	68.4	60.5	55.0	51.5	48.3
14°	178.8	136.0	107.3	95.1	85.7	71.5	62.9	55.8	51.1	47.9	45.2
15°	169.0	126.1	97.5	87.2	78.6	65.6	58.2	51.9	47.9	44.8	42.4
16°	159.1	116.7	89.6	80.6	72.3	60.9	53.8	48.7	45.2	42.0	40.1
17°	149.3	108.5	82.9	74.3	66.8	56.6	50.7	46.0	42.4	39.7	37.7
18°	140.7	100.6	76.6	68.8	62.1	53.0	47.5	43.2	40.1	37.7	35.4
19°	132.0	93.1	71.1	64.1	58.2	50.3	45.2	41.3	38.1	35.4	33.4
20°	123.8	86.8	66.4	60.1	54.6	47.5	42.8	38.9	35.8	33.4	31.4
21°	116.3	80.9	62.5	56.6	51.5	45.2	40.9	36.9	33.8	31.4	29.9
22°	109.2	75.8	58.9	53.4	49.1	43.2	38.9	35.0	32.2	29.9	28.3
23°	102.2	71.5	55.8	50.7	46.8	40.9	36.9	33.0	30.6	28.7	27.1
24°	95.5	67.6	53.0	48.3	44.8	39.3	35.0	31.4	29.1	27.1	25.5
25°	90.0	64.1	50.3	46.4	42.4	37.3	33.4	30.3	27.9	25.9	24.4
26°	85.3	60.5	47.9	44.4	40.9	35.4	31.8	28.7	26.7	24.8	23.2
27°	80.6	57.8	46.0	42.4	38.9	33.8	30.3	27.5	25.5	23.6	22.0
28°	76.6	55.0	44.0	40.5	37.3	32.6	29.1	26.3	24.4	22.4	20.8
29°	72.7	52.7	42.4	38.9	35.8	31.0	27.9	25.1	23.2	21.2	19.6
30°	69.2	50.3	40.5	37.3	34.2	29.9	26.7	24.0	22.0	20.0	18.1
32.5°	62.1	45.6	36.9	33.8	31.0	27.1	24.4	21.6	19.3	17.3	16.1
35°	56.2	41.7	33.4	30.6	28.3	24.8	21.6	19.3	16.9	15.3	14.1
37.5°	51.5	38.1	30.6	27.9	25.9	22.4	19.6	16.9	14.9	13.4	12.2
40°	47.2	35.4	28.3	25.9	23.6	20.4	17.3	14.9	13.0	11.8	10.6
42.5°	44.4	33.0	25.9	24.0	22.0	18.5	15.7	13.4	11.4	10.2	9.0
45°	42.0	31.0	24.4	22.0	20.0	16.9	14.1	11.8	10.2	9.0	7.9
47.5°	39.7	29.1	22.8	20.4	18.5	15.3	12.6	10.6	9.0	7.9	7.1
50°	37.3	27.1	21.2	18.9	16.9	13.8	11.4	9.4	7.9	6.7	5.9
52.5°	34.6	25.1	19.3	17.3	15.3	12.6	10.2	8.3	6.7	5.9	5.5
55°	31.8	23.2	17.7	15.7	14.1	11.4	9.0	7.1	5.5	5.1	4.7
57.5°	28.3	20.8	15.7	14.1	12.6	10.2	7.5	5.9	4.7	4.3	4.3
60°	25.5	18.5	13.8	12.6	11.4	8.6	6.3	4.7	3.9	3.5	3.5
62.5°	22.8	16.1	12.2	11.0	9.8	7.5	5.1	3.9	3.5	3.1	2.8
65°	20.0	13.8	10.6	9.4	8.3	5.9	3.9	3.1	2.8	2.4	2.4



TEST NUMBER: P273418

CATALOG NUMBER: 0.05-06W-827-90ASYM-STD-UNV-AN-3F0

CANDELA DISTRIBUTION (continued):

	100°	105°	110°	112.5°	115°	120°	125°	130°	135°	140°	145°
67.5°	17.3	11.4	8.6	7.5	6.7	4.3	3.1	2.4	2.0	2.0	2.0
70°	14.1	9.4	6.7	5.9	4.7	3.1	2.4	2.0	2.0	2.0	2.0
72.5°	11.0	7.1	5.1	4.3	3.1	2.4	2.0	2.0	2.0	2.0	2.0
75°	7.9	5.1	3.1	2.8	2.0	1.6	1.6	1.6	2.0	2.0	2.0
77.5°	5.5	3.5	2.0	1.6	1.6	1.6	1.6	1.6	2.0	2.0	2.0
80°	3.5	2.0	1.2	1.6	1.6	1.6	1.6	1.6	1.6	2.0	2.0
82.5°	2.0	1.2	1.2	1.2	1.2	1.6	1.6	1.6	1.6	1.6	1.6
85°	0.8	1.2	1.2	1.2	1.2	1.2	1.6	1.6	1.6	1.6	1.6
87.5°	0.8	0.8	1.2	1.2	1.2	1.2	1.2	1.2	1.6	1.6	1.6
90°	0.8	0.8	0.8	1.2	1.2	1.2	1.2	1.2	1.2	1.6	1.6
92.5°	0.8	0.8	0.8	0.8	0.8	1.2	1.2	1.2	1.2	1.2	1.2
95°	0.8	0.8	0.8	0.8	0.8	0.8	1.2	1.2	1.2	1.2	1.2
97.5°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	1.2	1.2	1.2	1.2
100°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	1.2	1.2
102.5°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
105°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
107.5°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
110°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
112.5°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
115°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
117.5°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
120°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
122.5°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
125°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
127.5°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
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	0.8	0.8	0.8	0.8
135°	0.8	0.8	0.8	1.2	0.8	1.2	1.2	1.2	0.8	0.8	0.8
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



TEST NUMBER: P273418

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CANDELA DISTRIBUTION (continued):

	100°	105°	110°	112.5°	115°	120°	125°	130°	135°	140°	145°
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: P273418

CATALOG NUMBER: 0.05-06W-827-90ASYM-STD-UNV-AN-3F0

CANDELA DISTRIBUTION (continued):

	150°	155°	157.5°	160°	165°	170°	175°	180°
0°	329.3	329.3	329.3	329.3	329.3	329.3	329.3	329.3
1°	283.7	277.8	276.2	267.6	268.0	265.6	266.8	266.8
2°	238.1	231.1	228.3	220.1	219.3	216.1	216.5	216.1
3°	196.9	189.4	186.3	178.4	176.8	173.7	173.7	173.3
4°	161.5	154.0	150.5	144.2	142.2	139.1	138.7	137.5
5°	132.8	125.7	122.2	117.5	115.1	112.4	112.0	111.2
6°	109.6	103.7	100.2	95.9	93.5	91.2	91.2	90.4
7°	91.6	86.4	83.7	80.6	78.6	76.6	76.2	75.8
8°	78.2	72.7	71.5	69.2	67.6	66.0	65.6	64.8
9°	68.4	63.7	62.9	60.9	59.3	58.2	57.8	57.4
10°	60.5	57.0	56.2	54.6	53.4	52.3	52.3	51.5
11°	54.2	51.9	51.1	49.9	48.7	47.9	47.9	47.5
12°	49.9	47.9	47.2	46.4	45.2	44.4	44.4	44.0
13°	46.4	44.4	44.0	43.2	42.0	41.3	41.3	40.9
14°	43.2	41.7	40.9	40.5	39.3	38.9	38.5	38.1
15°	40.9	38.9	38.5	37.7	36.5	36.2	35.8	35.4
16°	38.1	36.5	35.8	35.0	34.2	33.8	33.4	33.4
17°	35.8	34.2	33.8	33.4	32.2	31.8	31.4	31.4
18°	33.8	32.2	31.8	31.4	30.3	29.9	29.9	29.5
19°	31.8	30.6	29.9	29.5	28.7	28.3	27.9	27.9
20°	30.3	29.1	28.3	27.9	27.1	26.7	26.7	26.3
21°	28.7	27.5	26.7	26.3	25.5	25.1	25.1	24.8
22°	27.1	25.9	25.5	25.1	24.4	24.0	23.6	23.6
23°	25.9	24.8	24.0	23.6	22.8	22.4	22.0	22.0
24°	24.4	23.2	22.8	22.4	21.6	20.8	20.8	20.4
25°	23.2	22.0	21.2	20.8	20.0	19.6	19.3	19.3
26°	22.0	20.4	20.0	19.6	18.9	18.5	18.1	18.1
27°	20.4	19.3	18.9	18.5	17.7	17.3	16.9	16.9
28°	19.3	18.1	17.7	17.3	16.5	16.1	16.1	15.7
29°	18.1	16.9	16.5	16.1	15.7	15.3	14.9	14.9
30°	16.9	16.1	15.7	15.3	14.9	14.1	14.1	13.8
32.5°	14.9	13.8	13.4	13.4	12.6	12.2	12.2	11.8
35°	13.0	11.8	11.4	11.4	11.0	10.6	10.6	10.2
37.5°	11.0	10.2	10.2	9.8	9.4	9.4	9.0	9.4
40°	9.8	9.0	8.6	8.6	8.3	8.3	8.3	8.3
42.5°	8.3	7.9	7.9	7.5	7.5	7.5	7.5	7.5
45°	7.5	7.1	7.1	7.1	7.1	7.1	7.1	7.1
47.5°	6.7	6.3	6.3	6.3	6.3	6.3	6.3	6.3
50°	5.9	5.9	5.9	5.9	5.9	5.9	5.9	5.9
52.5°	5.1	5.1	5.1	5.1	5.1	5.1	5.1	5.1
55°	4.7	4.7	4.3	4.3	4.3	4.3	4.3	4.3
57.5°	3.9	3.9	3.5	3.5	3.5	3.5	3.1	3.1
60°	3.1	2.8	2.8	2.8	2.4	2.4	2.4	2.4
62.5°	2.4	2.4	2.4	2.4	2.4	2.4	2.4	2.4
65°	2.0	2.0	2.4	2.4	2.4	2.4	2.4	2.4



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CANDELA DISTRIBUTION (continued):

	150°	155°	157.5°	160°	165°	170°	175°	180°
67.5°	2.0	2.0	2.0	2.0	2.4	2.4	2.4	2.4
70°	2.0	2.0	2.4	2.4	2.4	2.4	2.4	2.4
72.5°	2.0	2.0	2.0	2.0	2.4	2.4	2.4	2.4
75°	2.0	2.0	2.0	2.0	2.0	2.4	2.0	2.0
77.5°	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0
80°	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0
82.5°	1.6	2.0	2.0	2.0	2.0	2.0	2.0	2.0
85°	1.6	1.6	1.6	2.0	2.0	2.0	2.0	2.0
87.5°	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6
90°	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6
92.5°	1.2	1.6	1.6	1.6	1.6	1.6	1.6	1.6
95°	1.2	1.2	1.2	1.2	1.2	1.6	1.6	1.6
97.5°	1.2	1.2	1.2	1.2	1.2	1.2	1.2	1.2
100°	1.2	1.2	1.2	1.2	1.2	1.2	1.2	1.2
102.5°	0.8	1.2	1.2	1.2	1.2	1.2	1.2	1.2
105°	0.8	0.8	0.8	0.8	1.2	1.2	1.2	1.2
107.5°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
110°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
112.5°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
115°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
117.5°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
120°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
122.5°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
125°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
127.5°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
130°	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	0.8
135°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
137.5°	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
142.5°	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
147.5°	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
152.5°	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
157.5°	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
162.5°	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
167.5°	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
172.5°	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
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



TEST NUMBER: P273418

CATALOG NUMBER: 0.05-06W-827-90ASYM-STD-UNV-AN-3F0

CANDELA DISTRIBUTION (continued):

	150°	155°	157.5°	160°	165°	170°	175°	180°
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)