

Scaled data based on original data using

LM-41-14 Approved Method for Photometric Testing Of Indoor Fluorescent Luminaires

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: io LED

Report Number: P252251

Luminaire Tested: **LD6B15D010 EU6B10209027 6LBSW1H**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P252251
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-1712-453-7)
Test Lab: INNOVATION CENTER(G1)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: io LED
Catalog Number: LD6B15D010 EU6B10209027 6LBSW1H
Description: PORTFOLIO 6 INCH SINGLE WALLWASH RECESSED DOWNLIGHT, WITH HAZE TRIM
Light Source: (1) HIGH LUMEN LED 90CRI / 2700K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 1113.0 lumens
Efficiency: N/A
Efficacy: 77.3 lumens/watt
Spacing Criteria (0/90/45): 1.17 / 1.18 / 1.16
Luminous Opening: Circular (Dia: 0.46' x H: 0')
CIE Type: Direct

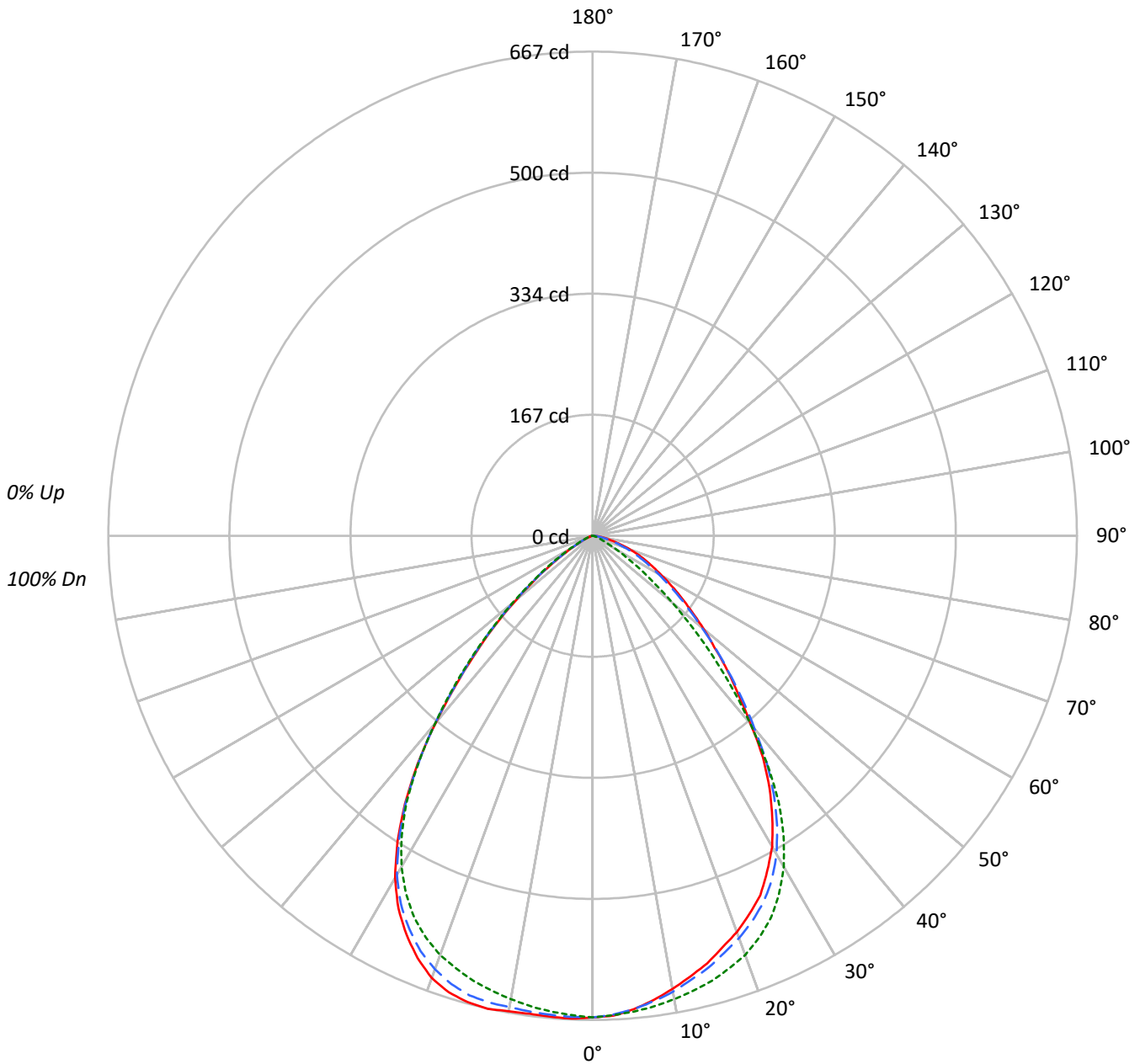
Input Watts (W): 14.39
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P252251

CATALOG NUMBER: LD6B15D010 EU6B10209027 6LBSW1H

Luminous Intensity Polar Plot





TEST NUMBER: P252251

CATALOG NUMBER: LD6B15D010 EU6B10209027 6LBSW1H

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	111	111	111	106	106	106	102	102	102	100					100			
1	112	108	105	103	109	106	103	101	102	100	98	98	96	95	95	93	92	90					90			
2	104	98	93	89	102	96	92	88	93	89	86	90	87	84	87	85	82	80					80			
3	97	89	83	78	95	88	82	77	85	80	76	82	78	75	80	77	74	72					72			
4	91	81	74	69	89	80	74	69	78	72	68	76	71	67	74	69	66	64					64			
5	85	74	67	62	83	73	66	61	71	65	61	70	64	60	68	63	60	58					58			
6	79	68	61	55	78	67	60	55	66	59	55	64	59	54	63	58	54	52					52			
7	74	63	55	50	73	62	55	50	61	54	50	59	54	49	58	53	49	47					47			
8	70	58	51	46	68	57	50	46	56	50	45	55	49	45	54	49	45	43					43			
9	65	54	47	42	64	53	46	42	52	46	42	51	46	41	50	45	41	40					40			
10	62	50	43	39	61	50	43	38	49	43	38	48	42	38	47	42	38	37					37			

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	43281	43281	43281
5°	42870	43079	43551
10°	41987	42941	44054
15°	41180	42862	44915
20°	40331	42663	45003
25°	39333	41816	43659
30°	37245	39655	40981
35°	33825	35545	35864
40°	28863	28726	28590
45°	24247	21516	20842
50°	20249	14555	13824
55°	17039	8929	8110
60°	14431	4710	4071
65°	12489	2470	1976
70°	10396	1526	1068
75°	7663	1008	605
80°	6011	601	301
85°	4791	599	0



TEST NUMBER: P252251

CATALOG NUMBER: LD6B15D010 EU6B10209027 6LBSW1H

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	62.5	5.6
10°-20°	179.0	16.1
20°-30°	264.4	23.8
30°-40°	272.4	24.5
40°-50°	188.2	16.9
50°-60°	92.8	8.3
60°-70°	37.6	3.4
70°-80°	13.4	1.2
80°-90°	2.8	0.2
90°-100°	0.0	0.0
100°-110°	0.0	0.0
110°-120°	0.0	0.0
120°-130°	0.0	0.0
130°-140°	0.0	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°	505.9	45.5
0°-40°	778.3	69.9
0°-60°	1059.3	95.2
0°-90°	1113.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1113.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	663	663	663	663	663	
5°	655	655	658	663	665	62
15°	610	616	635	655	665	172
25°	546	557	581	598	606	250
35°	425	435	446	449	450	263
45°	263	264	233	230	226	203
55°	150	144	78	74	71	135
65°	81	73	16	13	13	80
75°	30	26	4	2	2	34
85°	6	5	1	0	0	8
90°	0	0	0	0	0	



TEST NUMBER: P252251

CATALOG NUMBER: LD6B15D010 EU6B10209027 6LBSW1H

CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
0°	663.4	663.4	663.4	663.4	663.4	663.4	663.4	663.4	663.4	663.4	663.4
2.5°	661.8	659.4	661.0	657.8	661.8	657.8	658.6	659.4	658.6	659.4	660.2
5°	654.6	652.2	654.6	650.6	654.6	652.2	652.2	653.0	653.0	653.8	654.6
7.5°	645.0	642.6	645.0	641.0	645.8	643.4	643.4	645.0	644.2	645.0	646.6
10°	633.8	630.6	633.0	630.6	635.4	632.2	633.8	633.8	633.8	636.2	637.8
12.5°	621.8	618.5	621.8	617.7	622.6	620.2	621.0	623.4	624.2	625.8	626.6
15°	609.7	605.7	607.3	604.9	609.7	607.3	608.1	611.3	611.3	613.7	616.1
17.5°	594.5	591.3	594.5	591.3	595.3	593.7	595.3	597.7	597.7	600.1	602.5
20°	580.9	577.7	580.1	577.7	582.5	580.1	580.9	584.1	584.9	587.3	589.7
22.5°	564.1	561.7	563.3	560.9	565.7	564.1	564.9	568.1	568.9	570.5	574.5
25°	546.4	541.6	544.0	542.4	547.2	544.8	546.4	549.6	551.2	553.6	556.9
27.5°	520.8	518.4	520.0	520.0	524.0	521.6	522.4	525.6	528.0	530.4	534.4
30°	494.4	490.4	492.0	492.8	496.0	494.4	496.0	499.2	500.0	503.2	506.4
32.5°	460.7	459.1	462.3	460.7	462.3	462.3	463.1	465.5	467.1	468.7	472.7
35°	424.7	421.4	424.7	423.0	427.1	424.7	427.1	429.5	429.5	432.7	435.1
37.5°	385.4	381.4	383.0	383.0	384.6	383.8	383.8	387.8	388.6	391.0	393.4
40°	338.9	337.3	340.5	339.7	340.5	340.5	341.3	343.7	345.3	346.1	346.9
42.5°	297.3	298.1	298.9	298.9	298.9	298.9	298.9	302.1	301.3	303.7	304.5
45°	262.8	259.6	261.2	260.4	262.8	260.4	262.8	265.2	263.6	266.0	264.4
47.5°	227.5	227.5	227.5	226.7	228.3	227.5	229.2	230.0	230.0	230.0	229.2
50°	199.5	197.1	197.9	197.9	198.7	197.9	199.5	200.3	200.3	198.7	195.5
52.5°	172.3	171.5	171.5	173.1	173.1	172.3	172.3	172.3	172.3	169.9	168.3
55°	149.8	148.2	149.0	149.0	149.0	149.0	149.8	149.0	149.0	146.6	144.2
57.5°	129.8	128.2	128.2	128.2	129.0	128.2	128.2	128.2	127.4	125.0	121.8
60°	110.6	109.8	110.6	110.6	111.4	110.6	110.6	110.6	109.0	106.6	103.4
62.5°	94.5	94.5	94.5	95.3	95.3	94.5	94.5	93.7	92.9	89.7	86.5
65°	80.9	80.1	80.9	80.9	81.7	81.7	80.9	80.1	79.3	76.1	72.9
67.5°	67.3	66.5	67.3	67.3	68.1	67.3	67.3	67.3	64.9	63.3	60.1
70°	54.5	53.7	53.7	53.7	54.5	52.9	53.7	53.7	52.1	49.7	46.5
72.5°	41.7	41.7	41.7	41.7	41.7	41.7	40.9	40.9	39.3	36.9	35.3
75°	30.4	30.4	31.2	31.2	30.4	30.4	30.4	29.6	28.8	27.2	25.6
77.5°	22.4	22.4	22.4	22.4	21.6	21.6	21.6	20.8	20.0	19.2	17.6
80°	16.0	16.0	16.0	15.2	16.0	15.2	15.2	15.2	13.6	12.8	12.0
82.5°	11.2	10.4	10.4	10.4	10.4	10.4	10.4	9.6	9.6	8.8	8.0
85°	6.4	6.4	6.4	6.4	6.4	6.4	6.4	6.4	5.6	4.8	4.8
87.5°	3.2	4.0	4.0	4.0	4.0	4.0	4.0	3.2	3.2	3.2	2.4
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



TEST NUMBER: P252251

CATALOG NUMBER: LD6B15D010 EU6B10209027 6LBSW1H

CANDELA DISTRIBUTION (continued):

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°	95°
0°	663.4	663.4	663.4	663.4	663.4	663.4	663.4	663.4	663.4	663.4	663.4
2.5°	660.2	660.2	661.8	659.4	663.4	661.0	660.2	664.2	661.8	661.0	662.6
5°	654.6	655.4	656.2	654.6	658.6	656.2	656.2	660.2	658.6	657.8	660.2
7.5°	647.4	648.2	649.8	649.0	652.2	650.6	651.4	655.4	653.8	653.8	656.2
10°	638.6	640.2	641.8	641.8	645.8	644.2	644.2	649.0	647.4	648.2	651.4
12.5°	628.2	630.6	633.0	633.8	637.8	635.4	636.2	641.8	641.0	641.8	645.0
15°	616.9	620.2	622.6	622.6	627.4	625.0	627.4	633.0	631.4	634.6	638.6
17.5°	604.1	607.3	610.5	611.3	616.1	614.5	617.7	623.4	623.4	625.0	629.8
20°	592.1	596.1	597.7	600.1	604.9	604.1	605.7	612.1	612.1	614.5	619.3
22.5°	576.1	580.1	583.3	585.7	589.7	589.7	592.1	597.7	597.7	599.3	604.1
25°	558.5	563.3	565.7	568.1	572.1	571.3	573.7	578.5	579.3	580.9	585.7
27.5°	536.0	540.0	543.2	544.8	550.4	547.2	549.6	555.3	554.4	556.1	560.1
30°	508.0	512.0	515.2	515.2	520.0	520.0	522.4	524.8	524.8	526.4	529.6
32.5°	475.1	479.9	479.9	482.3	485.5	482.3	485.5	488.7	487.1	489.6	492.0
35°	437.5	439.9	440.7	440.7	443.1	442.3	441.5	443.9	442.3	446.3	448.7
37.5°	391.8	395.0	393.4	395.0	394.2	391.8	391.8	395.8	392.6	393.4	395.8
40°	347.7	347.7	346.9	342.9	343.7	341.3	340.5	341.3	338.1	337.3	340.5
42.5°	302.1	301.3	298.9	293.2	294.1	290.0	286.8	286.8	285.2	284.4	285.2
45°	261.2	258.8	254.8	248.4	246.8	243.6	237.2	235.6	233.2	233.2	234.0
47.5°	223.5	220.3	213.9	206.7	202.7	198.7	192.3	189.9	185.9	184.3	185.9
50°	192.3	186.7	178.7	168.3	164.3	159.4	153.0	149.0	145.0	143.4	142.6
52.5°	163.5	155.4	147.4	134.6	131.4	126.6	117.8	113.8	109.8	106.6	106.6
55°	138.6	131.4	120.2	108.2	103.4	98.6	89.7	84.1	80.1	78.5	76.9
57.5°	116.2	108.2	97.7	84.9	80.1	75.3	66.5	60.9	56.9	54.5	52.9
60°	97.7	88.9	78.5	67.3	61.7	56.9	48.1	42.5	38.5	36.1	34.5
62.5°	80.1	72.9	62.5	52.1	47.3	42.5	35.3	29.6	25.6	24.0	21.6
65°	67.3	60.1	50.5	41.7	37.7	32.9	26.4	21.6	18.4	16.0	14.4
67.5°	54.5	48.9	40.9	32.9	28.8	25.6	20.0	16.0	12.8	11.2	10.4
70°	43.3	37.7	31.2	24.8	22.4	19.2	15.2	11.2	9.6	8.0	7.2
72.5°	32.0	28.0	23.2	18.4	16.0	14.4	10.4	8.8	6.4	5.6	4.8
75°	23.2	20.0	16.8	12.8	11.2	10.4	8.0	5.6	4.8	4.0	3.2
77.5°	16.0	14.4	11.2	8.8	8.0	7.2	5.6	4.0	3.2	2.4	2.4
80°	10.4	8.8	7.2	5.6	5.6	4.8	3.2	2.4	2.4	1.6	1.6
82.5°	6.4	5.6	4.8	4.0	3.2	3.2	2.4	1.6	1.6	0.8	0.8
85°	4.0	3.2	2.4	2.4	1.6	1.6	1.6	0.8	0.8	0.8	0.8
87.5°	1.6	1.6	1.6	0.8	0.8	0.8	0.8	0.0	0.0	0.0	0.0
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



TEST NUMBER: P252251

CATALOG NUMBER: LD6B15D010 EU6B10209027 6LBSW1H

CANDELA DISTRIBUTION (continued):

	100°	105°	110°	112.5°	115°	120°	125°	130°	135°	140°	145°
0°	663.4	663.4	663.4	663.4	663.4	663.4	663.4	663.4	663.4	663.4	663.4
2.5°	662.6	662.6	664.2	661.8	663.4	663.4	665.0	661.8	663.4	664.2	665.8
5°	659.4	660.2	661.8	661.0	661.8	661.8	663.4	659.4	662.6	662.6	665.0
7.5°	656.2	656.2	657.8	657.0	658.6	659.4	661.0	657.8	661.0	661.0	663.4
10°	652.2	652.2	654.6	653.8	656.2	657.0	659.4	656.2	659.4	660.2	662.6
12.5°	646.6	647.4	649.8	649.8	652.2	653.8	656.2	654.6	658.6	659.4	662.6
15°	640.2	641.8	645.0	644.2	646.6	649.0	652.2	649.8	655.4	657.0	660.2
17.5°	632.2	633.8	636.2	636.2	638.6	640.2	644.2	642.6	647.4	648.2	652.2
20°	620.2	622.6	625.8	625.0	627.4	629.0	632.2	630.6	635.4	637.0	641.0
22.5°	605.7	607.3	609.7	609.7	612.1	613.7	616.9	614.5	619.3	620.2	623.4
25°	586.5	588.1	589.7	590.5	592.9	593.7	595.3	593.7	597.7	598.5	602.5
27.5°	561.7	562.5	564.9	564.9	566.5	567.3	569.7	566.5	572.1	572.1	574.5
30°	532.0	531.2	534.4	532.8	534.4	534.4	536.8	535.2	539.2	537.6	540.0
32.5°	492.8	494.4	494.4	492.8	496.0	495.2	495.2	493.6	496.0	496.8	498.4
35°	447.1	449.5	449.5	450.3	451.1	448.7	449.5	444.7	448.7	449.5	450.3
37.5°	397.4	395.0	396.6	394.2	398.2	393.4	393.4	390.2	393.4	393.4	394.2
40°	340.5	339.7	341.3	339.7	338.9	338.1	336.5	334.1	337.3	335.7	338.1
42.5°	286.8	286.0	286.0	284.4	283.6	283.6	282.0	280.4	279.6	279.6	283.6
45°	231.6	233.2	231.6	230.8	232.4	230.8	231.6	228.3	230.0	228.3	230.0
47.5°	185.1	185.9	184.3	182.7	185.1	182.7	182.7	180.3	183.5	183.5	181.9
50°	143.4	142.6	141.0	142.6	141.8	141.8	141.8	139.4	141.0	138.6	140.2
52.5°	105.8	105.0	105.0	104.2	105.0	104.2	104.2	103.4	103.4	102.6	103.4
55°	76.9	76.1	74.5	74.5	74.5	75.3	74.5	73.7	73.7	72.9	73.7
57.5°	52.1	50.5	50.5	50.5	50.5	49.7	49.7	48.9	49.7	48.9	49.7
60°	33.7	33.7	32.0	32.0	32.0	32.0	32.0	31.2	32.0	32.0	32.0
62.5°	20.8	20.8	20.0	19.2	20.0	19.2	19.2	19.2	20.0	19.2	20.0
65°	13.6	12.8	12.8	12.8	12.8	12.8	12.8	12.8	12.8	12.8	12.8
67.5°	9.6	8.8	8.8	8.8	8.8	8.8	8.8	8.0	8.8	8.8	8.8
70°	6.4	6.4	5.6	5.6	5.6	5.6	5.6	5.6	5.6	5.6	5.6
72.5°	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0
75°	3.2	2.4	2.4	2.4	2.4	2.4	2.4	2.4	2.4	2.4	2.4
77.5°	2.4	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6
80°	1.6	1.6	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
82.5°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
85°	0.8	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	0.0	0.0	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



TEST NUMBER: P252251

CATALOG NUMBER: LD6B15D010 EU6B10209027 6LBSW1H

CANDELA DISTRIBUTION (continued):

	150°	155°	157.5°	160°	165°	170°	175°	180°
0°	663.4	663.4	663.4	663.4	663.4	663.4	663.4	663.4
2.5°	663.4	664.2	662.6	663.4	661.8	663.4	664.2	665.8
5°	661.8	662.6	661.0	662.6	661.0	662.6	663.4	665.0
7.5°	660.2	661.8	660.2	661.8	660.2	661.8	662.6	664.2
10°	660.2	662.6	661.0	663.4	661.0	662.6	664.2	665.0
12.5°	660.2	662.6	661.8	663.4	662.6	664.2	665.8	667.4
15°	658.6	661.0	659.4	661.8	661.0	661.8	665.0	665.0
17.5°	649.8	652.2	652.2	653.8	653.8	656.2	657.8	659.4
20°	638.6	641.0	640.2	642.6	642.6	645.0	646.6	648.2
22.5°	621.8	625.0	624.2	626.6	625.8	627.4	630.6	629.8
25°	600.1	604.1	603.3	604.9	604.1	604.1	605.7	606.5
27.5°	573.7	576.1	575.3	576.9	575.3	576.9	578.5	579.3
30°	539.2	540.8	540.0	540.8	540.0	541.6	542.4	544.0
32.5°	497.6	500.0	497.6	499.2	498.4	498.4	501.6	500.0
35°	447.9	448.7	449.5	449.5	447.9	448.7	450.3	450.3
37.5°	392.6	396.6	391.8	394.2	393.4	393.4	393.4	395.8
40°	334.9	335.7	334.1	334.1	334.1	333.3	336.5	335.7
42.5°	280.4	281.2	280.4	278.0	278.8	278.8	281.2	278.0
45°	227.5	229.2	228.3	228.3	226.7	226.7	227.5	225.9
47.5°	180.3	181.9	179.5	180.3	178.7	180.3	179.5	181.1
50°	137.0	138.6	137.8	138.6	138.6	137.0	139.4	136.2
52.5°	102.6	103.4	102.6	101.8	101.0	101.0	102.6	101.8
55°	72.9	72.1	72.1	72.1	72.9	72.9	72.1	71.3
57.5°	48.9	48.9	48.1	48.1	48.9	47.3	48.1	47.3
60°	31.2	31.2	31.2	31.2	30.4	31.2	31.2	31.2
62.5°	19.2	19.2	19.2	19.2	19.2	19.2	19.2	19.2
65°	12.8	12.8	12.8	12.8	12.8	12.8	12.8	12.8
67.5°	8.0	8.8	8.8	8.8	8.0	8.0	8.0	8.0
70°	5.6	5.6	5.6	5.6	5.6	5.6	5.6	5.6
72.5°	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0
75°	2.4	2.4	2.4	2.4	2.4	2.4	2.4	2.4
77.5°	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6
80°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
82.5°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
85°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	0.8	0.8	0.8	0.8	0.8	0.0	0.0	0.0
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



Report Generated By E9808895 / USPTCWHP6082093





— 0°-180° - - 45°-225° - - - - 90°-270°













(END OF REPORT)