

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: P252669

Luminaire Tested: **LD6B15D010 EU6B10209035 6LBDW1H**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P252669
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-1712-453-9)
Test Lab: INNOVATION CENTER(G1)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: io LED
Catalog Number: LD6B15D010 EU6B10209035 6LBDW1H
Description: PORTFOLIO 6 INCH DOUBLE WALLWASH RECESSED DOWNLIGHT, WITH HAZE TRIM
Light Source: (1) HIGH LUMEN LED 90CRI / 3500K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 1186.0 lumens
Efficiency: N/A
Efficacy: 82.4 lumens/watt
Spacing Criteria (0/90/45): 1.22 / 1.25 / 1.21
Luminous Opening: Circular (Dia: 0.46' x H: 0')
CIE Type: Direct

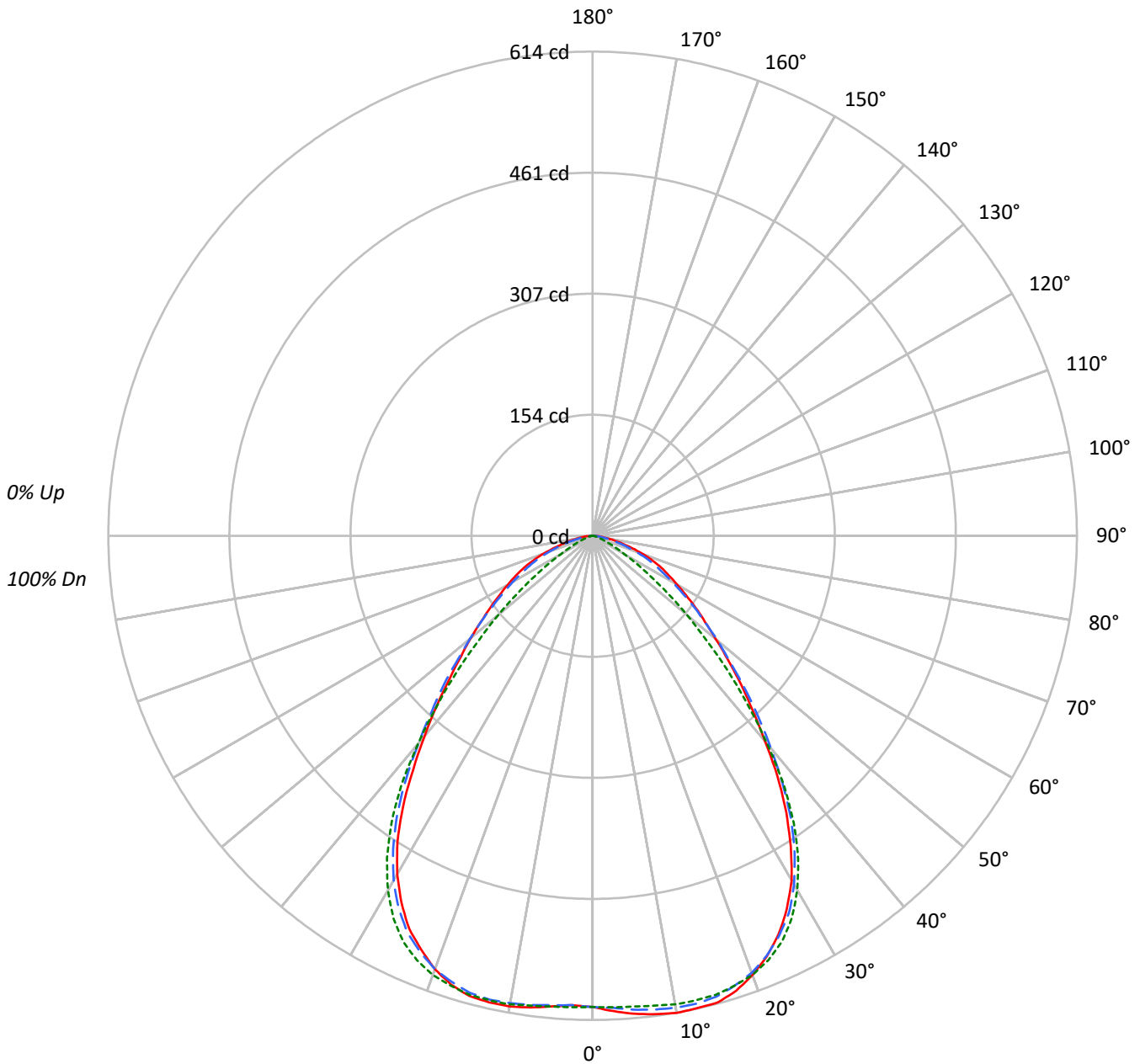
Input Watts (W): 14.39
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P252669

CATALOG NUMBER: LD6B15D010 EU6B10209035 6LBDW1H

Luminous Intensity Polar Plot





TEST NUMBER: P252669

CATALOG NUMBER: LD6B15D010 EU6B10209035 6LBDW1H

COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20									20									20									20									
RC	80									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	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100																			
1	111	107	104	101	109	105	102	99	101	98	96	97	95	93	94	92	91	89																			
2	103	96	91	86	101	95	89	85	91	87	83	88	84	81	85	82	80	78																			
3	95	87	80	75	93	85	79	74	82	77	73	80	75	71	77	74	70	68																			
4	89	78	71	65	87	77	70	65	75	69	64	73	67	63	71	66	62	61																			
5	82	71	64	58	80	70	63	58	68	62	57	66	61	56	65	60	56	54																			
6	77	65	57	52	75	64	57	51	63	56	51	61	55	51	59	54	50	48																			
7	72	60	52	47	70	59	52	46	58	51	46	56	50	46	55	50	45	44																			
8	67	55	47	42	66	54	47	42	53	47	42	52	46	42	51	45	41	40																			
9	63	51	43	38	62	50	43	38	49	43	38	48	42	38	47	42	38	36																			
10	59	47	40	35	58	47	40	35	46	39	35	45	39	35	44	39	35	33																			

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	38981	38981	38981
5°	39851	39242	39242
10°	40702	39973	40146
15°	41383	40701	40816
20°	41136	41136	40608
25°	40153	40888	39606
30°	38013	39090	37313
35°	34064	35410	33387
40°	28939	29297	28215
45°	24487	22383	23629
50°	20675	15783	20411
55°	18165	10191	17971
60°	16101	6067	16206
65°	14866	3659	14866
70°	12895	2098	12570
75°	10234	1286	9579
80°	7627	939	7289
85°	6962	599	6363



TEST NUMBER: P252669

CATALOG NUMBER: LD6B15D010 EU6B10209035 6LBDW1H

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	57.5	4.9
10°-20°	170.3	14.4
20°-30°	256.1	21.6
30°-40°	269.2	22.7
40°-50°	201.1	17.0
50°-60°	125.2	10.6
60°-70°	71.2	6.0
70°-80°	29.3	2.5
80°-90°	6.1	0.5
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°	483.9	40.8
0°-40°	753.1	63.5
0°-60°	1079.4	91.0
0°-90°	1186.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1186.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	598	598	598	598	598	
5°	608	603	599	598	599	58
15°	613	605	603	600	604	172
25°	558	560	568	555	550	255
35°	428	439	445	432	419	265
45°	265	271	243	266	256	206
55°	160	156	90	154	158	144
65°	96	86	24	86	96	95
75°	41	32	5	31	38	44
85°	9	6	1	5	8	10
90°	0	0	0	0	0	



TEST NUMBER: P252669

CATALOG NUMBER: LD6B15D010 EU6B10209035 6LBDW1H

CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
0°	597.5	597.5	597.5	597.5	597.5	597.5	597.5	597.5	597.5	597.5	597.5
2.5°	603.4	602.6	603.4	601.8	600.9	600.9	601.8	600.1	599.2	600.1	599.2
5°	608.5	606.8	607.7	606.8	605.1	605.1	606.0	603.4	603.4	604.3	603.4
7.5°	611.9	611.9	611.9	610.2	609.4	608.5	610.2	607.7	606.8	606.8	606.0
10°	614.4	613.6	614.4	612.7	611.1	610.2	611.9	610.2	608.5	610.2	607.7
12.5°	613.6	613.6	613.6	612.7	611.1	610.2	611.9	609.4	608.5	609.4	607.7
15°	612.7	610.2	611.1	610.2	607.7	607.7	608.5	606.0	604.3	606.8	605.1
17.5°	605.1	603.4	604.3	602.6	600.9	600.1	600.9	600.1	598.4	600.1	598.4
20°	592.5	592.5	593.3	591.6	589.9	589.1	590.8	589.1	587.4	589.9	589.9
22.5°	577.2	577.2	577.2	576.4	575.6	575.6	575.6	574.7	573.9	575.6	576.4
25°	557.8	557.0	557.8	558.7	557.8	557.0	557.8	557.8	556.1	559.5	559.5
27.5°	533.3	533.3	535.0	534.1	534.1	533.3	535.0	535.0	534.1	536.7	539.2
30°	504.6	502.9	504.6	504.6	505.4	505.4	506.3	506.3	506.3	508.8	510.5
32.5°	467.4	468.2	470.8	469.9	469.1	471.6	471.6	473.3	474.1	475.8	476.7
35°	427.7	428.5	428.5	429.3	431.0	429.3	433.6	432.7	433.6	437.0	438.6
37.5°	385.4	382.9	387.1	385.4	386.2	386.2	387.9	388.8	391.3	395.5	395.5
40°	339.8	340.6	342.3	343.1	344.0	344.0	344.0	346.5	347.4	352.4	351.6
42.5°	300.0	300.0	301.7	302.6	302.6	302.6	302.6	305.1	306.8	308.5	310.2
45°	265.4	262.8	264.5	264.5	266.2	265.4	267.1	268.8	269.6	272.1	271.3
47.5°	232.4	231.6	232.4	233.3	232.4	233.3	234.1	235.0	235.8	235.8	235.8
50°	203.7	203.7	204.5	205.4	205.4	205.4	205.4	206.2	206.2	207.9	206.2
52.5°	180.0	180.9	180.9	180.0	180.9	180.9	181.7	181.7	180.9	180.9	178.3
55°	159.7	158.9	159.7	158.9	159.7	159.7	158.9	158.9	158.0	157.2	156.4
57.5°	140.3	140.3	140.3	140.3	139.5	140.3	139.5	138.6	138.6	136.9	134.4
60°	123.4	123.4	123.4	123.4	123.4	122.5	123.4	122.5	120.9	119.2	115.8
62.5°	109.0	108.2	109.0	108.2	108.2	107.3	107.3	106.5	104.8	103.1	99.7
65°	96.3	97.2	96.3	96.3	95.5	94.7	94.7	93.8	91.3	89.6	86.2
67.5°	82.8	82.0	82.0	82.0	81.1	81.1	81.1	79.4	77.8	75.2	71.8
70°	67.6	67.6	67.6	66.8	66.8	65.9	65.9	65.1	63.4	61.7	57.5
72.5°	53.2	53.2	53.2	51.6	52.4	51.6	51.6	49.9	49.0	46.5	43.9
75°	40.6	40.6	39.7	39.7	38.9	38.0	38.0	37.2	36.3	34.7	32.1
77.5°	29.6	29.6	29.6	28.7	27.9	27.0	27.0	26.2	25.4	24.5	22.8
80°	20.3	20.3	20.3	20.3	19.4	18.6	18.6	17.7	17.7	16.9	15.2
82.5°	13.5	13.5	13.5	13.5	12.7	12.7	12.7	11.8	11.0	11.0	9.3
85°	9.3	9.3	8.5	8.5	8.5	8.5	7.6	7.6	6.8	5.9	5.9
87.5°	5.1	5.1	5.1	5.1	4.2	4.2	4.2	4.2	3.4	3.4	2.5
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: P252669

CATALOG NUMBER: LD6B15D010 EU6B10209035 6LBDW1H

CANDELA DISTRIBUTION (continued):

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°	95°
0°	597.5	597.5	597.5	597.5	597.5	597.5	597.5	597.5	597.5	597.5	597.5
2.5°	601.8	601.8	600.9	598.4	599.2	598.4	599.2	598.4	595.8	598.4	595.8
5°	605.1	606.0	604.3	600.9	601.8	600.9	600.9	600.1	597.5	599.2	597.5
7.5°	608.5	607.7	606.8	603.4	604.3	603.4	603.4	601.8	599.2	600.9	598.4
10°	610.2	610.2	608.5	605.1	605.1	604.3	605.1	604.3	600.9	603.4	601.8
12.5°	610.2	609.4	609.4	605.1	606.0	605.1	606.0	604.3	601.8	603.4	602.6
15°	607.7	607.7	606.8	602.6	603.4	603.4	604.3	602.6	600.1	602.6	600.9
17.5°	602.6	602.6	601.8	598.4	600.1	600.1	600.9	599.2	596.7	598.4	598.4
20°	592.5	593.3	593.3	590.8	592.5	592.5	593.3	592.5	591.6	592.5	590.8
22.5°	580.6	582.3	582.3	579.8	581.5	581.5	584.0	583.2	581.5	582.3	581.5
25°	562.9	564.6	566.3	564.6	566.3	566.3	568.8	568.0	566.3	568.0	565.4
27.5°	542.6	543.4	545.1	543.4	546.0	545.1	547.7	546.8	544.3	546.8	546.0
30°	513.9	517.2	519.8	517.2	519.8	519.8	521.5	520.6	519.8	518.9	518.9
32.5°	481.7	485.1	485.1	484.3	486.0	486.0	486.8	485.1	484.3	485.1	486.0
35°	442.0	443.7	445.4	444.6	445.4	446.2	445.4	446.2	443.7	444.6	444.6
37.5°	398.9	400.6	400.6	398.1	399.8	399.8	398.1	398.1	396.4	398.1	394.7
40°	353.3	351.6	352.4	350.7	349.1	349.1	348.2	344.8	343.1	344.0	344.8
42.5°	308.5	308.5	305.9	301.7	297.5	297.5	295.0	293.3	289.9	291.6	290.7
45°	270.5	266.2	262.8	256.1	253.5	251.9	247.6	243.4	241.7	242.6	241.7
47.5°	234.1	230.7	222.3	213.0	210.4	207.9	202.8	197.8	196.1	194.4	194.4
50°	203.7	197.8	188.5	178.3	174.1	169.9	163.1	158.0	154.7	155.5	155.5
52.5°	175.8	169.0	158.0	145.4	140.3	135.2	129.3	123.4	120.9	120.0	120.0
55°	151.3	143.7	132.7	118.3	114.1	108.2	100.6	93.8	90.4	89.6	91.3
57.5°	129.3	122.5	109.9	95.5	90.4	84.5	76.9	71.0	66.8	65.9	66.8
60°	111.6	102.3	91.3	77.8	71.0	65.9	57.5	52.4	48.2	46.5	47.3
62.5°	93.8	85.4	74.4	60.9	55.8	50.7	43.1	37.2	33.8	33.0	33.8
65°	80.3	71.8	61.7	49.9	44.8	39.7	33.0	27.0	24.5	23.7	24.5
67.5°	66.8	59.2	50.7	39.7	35.5	31.3	24.5	20.3	16.9	16.1	16.9
70°	54.1	47.3	38.9	31.3	27.0	23.7	18.6	14.4	11.8	11.0	11.8
72.5°	40.6	35.5	29.6	22.8	20.3	17.7	13.5	10.1	8.5	7.6	8.5
75°	29.6	25.4	21.1	16.1	14.4	12.7	9.3	6.8	5.9	5.1	5.9
77.5°	20.3	17.7	14.4	11.0	9.3	8.5	5.9	5.1	4.2	3.4	3.4
80°	13.5	11.8	9.3	7.6	6.8	5.9	4.2	3.4	2.5	2.5	2.5
82.5°	8.5	6.8	5.9	4.2	3.4	3.4	2.5	1.7	1.7	1.7	1.7
85°	5.1	4.2	3.4	2.5	1.7	1.7	0.8	0.8	0.8	0.8	0.8
87.5°	2.5	1.7	1.7	0.8	0.8	0.8	0.8	0.8	0.0	0.0	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: P252669

CATALOG NUMBER: LD6B15D010 EU6B10209035 6LBDW1H

CANDELA DISTRIBUTION (continued):

	100°	105°	110°	112.5°	115°	120°	125°	130°	135°	140°	145°
0°	597.5	597.5	597.5	597.5	597.5	597.5	597.5	597.5	597.5	597.5	597.5
2.5°	597.5	595.8	595.8	596.7	597.5	598.4	596.7	595.8	595.8	598.4	596.7
5°	597.5	596.7	596.7	596.7	598.4	599.2	597.5	596.7	597.5	600.1	599.2
7.5°	600.1	598.4	599.2	599.2	600.1	601.8	600.1	599.2	600.1	602.6	600.9
10°	601.8	600.1	600.9	600.1	602.6	603.4	601.8	600.9	601.8	605.1	604.3
12.5°	602.6	601.8	601.8	600.9	603.4	604.3	602.6	601.8	602.6	605.1	604.3
15°	600.9	600.1	600.1	600.1	601.8	603.4	600.9	600.1	600.1	602.6	601.8
17.5°	597.5	595.8	595.8	595.8	596.7	597.5	595.0	594.2	593.3	595.8	595.0
20°	591.6	589.9	588.2	588.2	589.1	589.1	587.4	584.9	584.9	585.7	584.0
22.5°	580.6	579.8	578.1	577.2	578.9	578.1	574.7	572.2	571.3	572.2	570.5
25°	565.4	563.7	562.9	562.0	562.9	562.0	558.7	555.3	555.3	555.3	552.7
27.5°	544.3	542.6	541.8	541.8	542.6	540.9	537.5	534.1	532.5	532.5	529.9
30°	517.2	517.2	516.4	515.6	514.7	514.7	509.6	506.3	504.6	505.4	503.7
32.5°	484.3	483.4	482.6	480.1	480.9	480.1	475.8	473.3	470.8	469.1	468.2
35°	442.0	442.0	441.2	441.2	441.2	440.3	436.1	433.6	431.9	431.0	428.5
37.5°	395.5	394.7	393.8	393.8	393.8	393.8	391.3	388.8	388.8	387.9	386.2
40°	343.1	344.0	344.8	344.0	346.5	349.1	345.7	344.0	343.1	345.7	342.3
42.5°	292.4	291.6	295.8	296.7	296.7	300.9	301.7	302.6	301.7	303.4	303.4
45°	243.4	242.6	246.8	248.5	252.7	257.8	260.3	264.5	266.2	267.9	266.2
47.5°	196.9	200.3	203.7	207.9	211.3	219.7	224.8	229.0	230.7	233.3	233.3
50°	158.0	161.4	167.3	170.7	174.9	185.1	193.5	199.5	202.8	205.4	204.5
52.5°	121.7	127.6	135.2	138.6	144.5	156.4	165.7	172.4	176.6	179.2	180.0
55°	93.8	98.9	106.5	111.6	117.5	130.2	142.0	149.6	153.8	157.2	158.9
57.5°	69.3	75.2	83.7	87.9	94.7	109.0	119.2	128.5	133.5	137.8	138.6
60°	50.7	56.6	64.2	69.3	76.1	90.4	102.3	110.7	116.6	120.0	121.7
62.5°	36.3	42.3	49.9	54.9	60.9	73.5	85.4	93.8	99.7	104.0	106.5
65°	26.2	32.1	39.7	43.9	49.0	60.9	71.8	80.3	86.2	91.3	93.0
67.5°	19.4	23.7	30.4	34.7	39.7	49.0	58.3	65.9	71.8	76.1	77.8
70°	14.4	17.7	23.7	26.2	29.6	38.0	45.6	52.4	57.5	60.9	62.5
72.5°	10.1	12.7	16.9	19.4	22.0	28.7	34.7	39.7	43.1	46.5	48.2
75°	6.8	8.5	11.8	13.5	15.2	20.3	24.5	28.7	31.3	33.8	34.7
77.5°	4.2	5.9	8.5	9.3	11.0	13.5	16.9	19.4	21.1	22.8	24.5
80°	2.5	3.4	5.1	5.9	6.8	9.3	11.0	12.7	14.4	16.1	16.9
82.5°	1.7	2.5	3.4	3.4	4.2	5.1	6.8	8.5	9.3	10.1	11.0
85°	0.8	0.8	1.7	1.7	2.5	2.5	3.4	4.2	5.1	5.9	6.8
87.5°	0.8	0.8	0.8	0.8	1.7	1.7	2.5	2.5	2.5	3.4	3.4
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: P252669

CATALOG NUMBER: LD6B15D010 EU6B10209035 6LBDW1H

CANDELA DISTRIBUTION (continued):

	150°	155°	157.5°	160°	165°	170°	175°	180°
0°	597.5	597.5	597.5	597.5	597.5	597.5	597.5	597.5
2.5°	595.0	597.5	595.0	596.7	595.8	595.8	595.0	595.8
5°	597.5	600.9	597.5	600.1	598.4	598.4	598.4	599.2
7.5°	600.1	603.4	600.9	603.4	602.6	601.8	601.8	603.4
10°	602.6	605.1	603.4	606.0	605.1	604.3	604.3	606.0
12.5°	602.6	606.0	604.3	606.8	606.0	605.1	605.1	606.0
15°	600.1	604.3	601.8	604.3	603.4	602.6	602.6	604.3
17.5°	592.5	595.8	594.2	595.8	595.8	595.0	595.8	596.7
20°	582.3	584.9	583.2	584.9	584.9	583.2	584.0	584.9
22.5°	568.0	570.5	568.8	570.5	569.6	568.8	568.8	568.0
25°	550.2	553.6	551.0	552.7	551.0	549.4	549.4	550.2
27.5°	528.2	530.8	527.4	529.1	527.4	525.7	525.7	524.8
30°	499.5	500.3	497.8	499.5	497.8	497.0	495.3	495.3
32.5°	464.8	465.7	463.2	463.2	461.5	461.5	458.1	460.6
35°	424.3	425.1	424.3	423.4	420.9	420.0	419.2	419.2
37.5°	382.0	382.0	379.5	378.6	376.9	375.3	376.1	373.6
40°	338.9	338.1	335.5	336.4	335.5	333.0	332.2	331.3
42.5°	298.3	298.3	295.8	296.7	295.0	294.1	291.6	292.4
45°	262.8	262.8	260.3	260.3	259.5	256.9	257.8	256.1
47.5°	230.7	230.7	229.9	229.9	227.3	226.5	226.5	226.5
50°	202.8	202.8	202.8	202.8	202.0	201.1	200.3	201.1
52.5°	179.2	180.9	180.0	180.0	179.2	178.3	177.5	177.5
55°	158.0	158.9	158.9	159.7	158.9	158.0	158.9	158.0
57.5°	139.5	141.1	141.1	141.1	141.1	141.1	140.3	139.5
60°	123.4	124.2	124.2	125.1	125.1	125.1	124.2	124.2
62.5°	107.3	109.0	109.9	109.9	110.7	109.9	109.9	109.9
65°	94.7	96.3	97.2	96.3	97.2	97.2	96.3	96.3
67.5°	79.4	81.1	81.1	81.1	81.1	82.0	81.1	81.1
70°	64.2	65.9	65.1	65.9	65.9	65.9	65.9	65.9
72.5°	49.0	49.9	50.7	50.7	51.6	50.7	50.7	50.7
75°	35.5	37.2	37.2	37.2	37.2	38.0	38.0	38.0
77.5°	25.4	26.2	26.2	27.0	27.0	27.0	27.0	27.9
80°	17.7	17.7	18.6	18.6	19.4	19.4	19.4	19.4
82.5°	11.8	12.7	12.7	12.7	12.7	12.7	12.7	12.7
85°	6.8	7.6	7.6	7.6	7.6	8.5	8.5	8.5
87.5°	4.2	4.2	4.2	4.2	4.2	4.2	3.4	3.4
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)