

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: P252473

Luminaire Tested: **LD6B20D010 EU6B10209030 6LBLWW1H**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P252473
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-1712-453-6)
Test Lab: INNOVATION CENTER(G1)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: io LED
Catalog Number: LD6B20D010 EU6B10209030 6LBLWW1H
Description: PORTFOLIO 6 INCH LENS WALLWASH RECESSED DOWNLIGHT, WITH HAZE TRIM
Light Source: (1) HIGH LUMEN LED 90CRI / 3000K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 1478.0 lumens
Efficiency: N/A
Efficacy: 71.1 lumens/watt
Spacing Criteria (0/90/45): 1.1 / 1.02 / 1.12
Luminous Opening: Circular (Dia: 0.46' x H: 0')
CIE Type: Direct

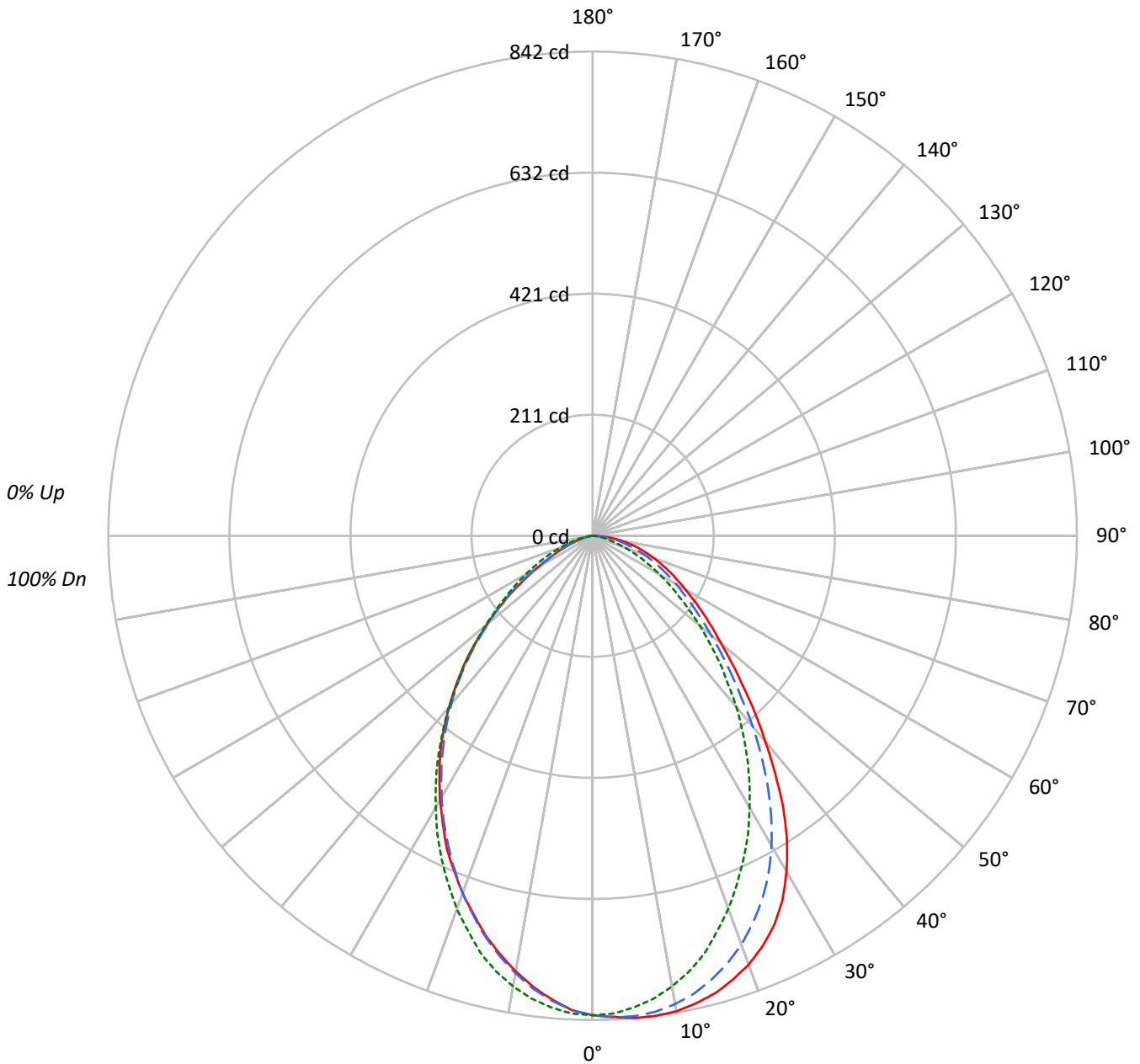
Input Watts (W): 20.8
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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Luminous Intensity Polar Plot





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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				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	0	
RCR																						
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100				100
1	111	107	103	100	108	105	101	99	100	98	96	97	95	93	93	91	90	88				88
2	103	96	90	85	100	94	89	84	90	86	82	87	84	80	84	81	79	77				77
3	95	86	79	73	93	84	78	73	81	76	71	79	74	70	76	72	69	67				67
4	88	78	70	64	86	76	69	64	74	68	63	72	66	62	70	65	61	59				59
5	82	70	62	57	80	69	62	56	67	61	56	65	60	55	64	59	55	53				53
6	76	64	56	51	74	63	56	50	62	55	50	60	54	50	59	53	49	47				47
7	71	59	51	46	69	58	51	45	57	50	45	55	49	45	54	49	45	43				43
8	67	54	47	41	65	54	46	41	52	46	41	51	45	41	50	45	41	39				39
9	63	50	43	38	61	50	43	38	49	42	37	48	42	37	47	41	37	35				35
10	59	47	39	35	58	46	39	35	45	39	34	44	38	34	44	38	34	33				33

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	54398	54398	54398
5°	55136	53924	53014
10°	55621	52706	50944
15°	55614	50765	48576
20°	55077	47919	45912
25°	53773	44681	43184
30°	50775	41094	39957
35°	46026	37265	36804
40°	39747	33138	33044
45°	34082	28851	29063
50°	29617	24684	24329
55°	26605	20815	19496
60°	24178	17524	14353
65°	22708	14480	10544
70°	21650	11273	7725
75°	20720	8167	5243
80°	19574	5673	3494
85°	17366	3443	1722



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	78.0	5.3
10°-20°	213.6	14.5
20°-30°	296.6	20.1
30°-40°	307.2	20.8
40°-50°	252.4	17.1
50°-60°	173.5	11.7
60°-70°	99.7	6.7
70°-80°	45.9	3.1
80°-90°	11.2	0.8
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°	588.2	39.8
0°-40°	895.3	60.6
0°-60°	1321.3	89.4
0°-90°	1478.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1478.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	834	834	834	834	834	
5°	842	838	823	812	810	80
15°	823	799	752	722	719	232
25°	747	697	621	594	600	342
35°	578	530	468	454	462	358
45°	369	342	313	309	315	288
55°	234	212	183	173	171	211
65°	147	128	94	66	68	146
75°	82	65	32	21	21	87
85°	23	16	5	2	2	26
90°	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°	833.8	833.8	833.8	833.8	833.8	833.8	833.8	833.8	833.8	833.8	833.8
2.5°	837.3	844.2	839.6	838.4	840.8	840.8	840.8	837.3	839.6	836.1	838.4
5°	841.9	847.7	843.1	840.8	843.1	844.2	840.8	838.4	841.9	837.3	838.4
7.5°	841.9	847.7	843.1	841.9	843.1	843.1	841.9	837.3	839.6	835.0	835.0
10°	839.6	844.2	839.6	837.3	838.4	837.3	837.3	831.5	832.7	826.9	826.9
12.5°	832.7	838.4	832.7	830.3	830.3	830.3	826.9	822.2	823.4	816.4	815.3
15°	823.4	828.0	822.2	819.9	819.9	818.8	816.4	809.5	809.5	802.5	799.1
17.5°	809.5	814.1	809.5	806.0	804.9	802.5	800.2	793.3	791.0	782.9	779.4
20°	793.3	796.8	792.1	788.6	786.3	784.0	779.4	772.4	770.1	762.0	756.2
22.5°	772.4	777.1	770.1	766.6	764.3	760.9	756.2	749.3	745.8	735.4	728.4
25°	747.0	749.3	743.5	740.0	735.4	733.1	729.6	720.3	716.8	705.3	697.2
27.5°	714.5	716.8	709.9	707.6	701.8	699.5	694.8	686.7	682.1	670.5	662.4
30°	674.0	676.3	671.7	668.2	663.6	658.9	655.5	647.4	640.4	628.8	621.9
32.5°	628.8	632.3	627.7	623.0	614.9	616.1	610.3	602.2	596.4	586.0	577.9
35°	577.9	580.2	574.4	573.2	568.6	564.0	558.2	552.4	548.9	537.3	530.4
37.5°	521.1	526.9	521.1	516.5	514.2	510.7	507.2	499.1	496.8	489.9	480.6
40°	466.7	470.2	466.7	462.1	458.6	458.6	454.0	449.3	443.5	436.6	433.1
42.5°	418.1	415.7	414.6	412.3	407.6	406.5	405.3	399.5	396.1	389.1	383.3
45°	369.4	370.6	368.3	367.1	363.6	361.3	359.0	354.4	353.2	346.3	341.6
47.5°	328.9	327.7	325.4	325.4	323.1	320.8	318.5	315.0	313.8	308.0	303.4
50°	291.8	293.0	291.8	290.7	287.2	286.0	283.7	281.4	279.1	273.3	268.7
52.5°	261.7	260.6	259.4	259.4	255.9	254.8	252.5	250.1	247.8	242.0	238.6
55°	233.9	233.9	232.8	231.6	228.1	227.0	225.8	223.5	220.0	215.4	211.9
57.5°	208.5	208.5	207.3	206.1	203.8	203.8	201.5	199.2	196.9	192.2	187.6
60°	185.3	186.4	185.3	184.1	181.8	181.8	180.7	177.2	176.0	170.2	166.8
62.5°	165.6	165.6	165.6	164.4	163.3	161.0	161.0	157.5	155.2	151.7	147.1
65°	147.1	147.1	147.1	145.9	143.6	142.4	141.3	139.0	136.7	133.2	128.5
67.5°	129.7	129.7	129.7	128.5	126.2	125.1	123.9	122.8	119.3	115.8	111.2
70°	113.5	113.5	112.3	111.2	110.0	108.9	107.7	105.4	103.1	98.4	95.0
72.5°	97.3	97.3	97.3	95.0	93.8	93.8	91.5	90.3	88.0	83.4	79.9
75°	82.2	81.1	81.1	79.9	78.7	77.6	76.4	75.3	71.8	69.5	64.9
77.5°	67.2	67.2	66.0	64.9	64.9	63.7	62.5	60.2	59.1	55.6	52.1
80°	52.1	52.1	52.1	52.1	51.0	49.8	49.8	47.5	46.3	42.8	40.5
82.5°	39.4	38.2	38.2	38.2	37.1	35.9	35.9	34.7	33.6	31.3	29.0
85°	23.2	22.0	22.0	22.0	20.8	20.8	19.7	19.7	18.5	16.2	16.2
87.5°	6.9	6.9	8.1	8.1	6.9	6.9	6.9	6.9	6.9	5.8	5.8
90°	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°	833.8	833.8	833.8	833.8	833.8	833.8	833.8	833.8	833.8	833.8	833.8
2.5°	836.1	839.6	835.0	833.8	838.4	836.1	835.0	832.7	833.8	831.5	828.0
5°	835.0	839.6	833.8	830.3	836.1	832.7	830.3	828.0	828.0	823.4	821.1
7.5°	831.5	833.8	828.0	824.5	828.0	824.5	822.2	818.8	817.6	811.8	808.3
10°	822.2	824.5	817.6	813.0	816.4	811.8	808.3	804.9	802.5	795.6	791.0
12.5°	809.5	810.6	802.5	796.8	799.1	795.6	789.8	785.2	782.9	775.9	770.1
15°	792.1	793.3	784.0	775.9	778.2	773.6	766.6	762.0	758.5	751.6	743.5
17.5°	771.3	770.1	759.7	751.6	752.7	747.0	740.0	733.1	728.4	720.3	714.5
20°	748.1	744.6	733.1	723.8	725.0	718.0	709.9	702.9	697.2	690.2	682.1
22.5°	719.2	714.5	704.1	692.5	693.7	687.9	676.3	670.5	664.7	655.5	648.5
25°	687.9	680.9	670.5	658.9	658.9	652.0	642.7	635.8	630.0	620.7	612.6
27.5°	650.8	647.4	633.5	624.2	623.0	616.1	608.0	599.9	592.9	584.8	576.7
30°	610.3	604.5	594.1	583.7	581.4	575.6	567.5	558.2	553.6	545.5	538.5
32.5°	567.5	561.7	550.1	539.7	538.5	533.9	526.9	517.7	513.0	507.2	502.6
35°	518.8	516.5	504.9	496.8	496.8	492.2	485.2	477.1	473.7	467.9	462.1
37.5°	472.5	469.0	458.6	451.6	451.6	445.9	438.9	435.4	432.0	427.3	423.9
40°	423.9	421.5	413.4	406.5	407.6	403.0	398.4	393.7	391.4	389.1	385.6
42.5°	378.7	376.4	370.6	364.8	364.8	361.3	356.7	353.2	350.9	347.4	346.3
45°	338.2	334.7	330.1	324.3	324.3	320.8	318.5	316.2	315.0	312.7	309.2
47.5°	298.8	296.5	291.8	286.0	286.0	286.0	281.4	277.9	277.9	275.6	274.5
50°	265.2	261.7	258.2	253.6	253.6	251.3	247.8	244.4	244.4	243.2	240.9
52.5°	233.9	231.6	227.0	222.3	222.3	220.0	216.6	215.4	214.2	210.8	209.6
55°	207.3	205.0	201.5	195.7	194.6	193.4	189.9	187.6	186.4	183.0	183.0
57.5°	183.0	180.7	174.9	171.4	170.2	167.9	164.4	162.1	161.0	158.7	156.3
60°	162.1	158.7	154.0	149.4	148.2	145.9	142.4	140.1	139.0	134.3	132.0
62.5°	142.4	139.0	134.3	129.7	128.5	126.2	121.6	119.3	117.0	112.3	110.0
65°	123.9	120.4	115.8	111.2	108.9	107.7	103.1	99.6	97.3	93.8	89.2
67.5°	106.5	103.1	98.4	92.6	92.6	89.2	85.7	82.2	78.7	75.3	71.8
70°	90.3	86.9	82.2	77.6	76.4	74.1	70.6	66.0	63.7	59.1	55.6
72.5°	75.3	71.8	67.2	62.5	61.4	59.1	55.6	51.0	47.5	44.0	40.5
75°	61.4	57.9	53.3	49.8	48.6	46.3	42.8	38.2	34.7	32.4	29.0
77.5°	48.6	45.2	41.7	38.2	37.1	34.7	31.3	29.0	25.5	23.2	19.7
80°	37.1	34.7	31.3	29.0	27.8	25.5	23.2	19.7	17.4	15.1	13.9
82.5°	26.6	24.3	22.0	18.5	18.5	16.2	15.1	12.7	10.4	9.3	8.1
85°	15.1	12.7	11.6	10.4	9.3	9.3	8.1	6.9	5.8	4.6	4.6
87.5°	4.6	4.6	3.5	3.5	3.5	3.5	2.3	2.3	2.3	2.3	2.3
90°	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):

	100°	105°	110°	112.5°	115°	120°	125°	130°	135°	140°	145°
0°	833.8	833.8	833.8	833.8	833.8	833.8	833.8	833.8	833.8	833.8	833.8
2.5°	828.0	829.2	826.9	829.2	826.9	828.0	825.7	828.0	825.7	828.0	823.4
5°	819.9	819.9	816.4	818.8	816.4	817.6	813.0	814.1	811.8	814.1	809.5
7.5°	806.0	807.2	801.4	803.7	800.2	800.2	796.8	797.9	794.4	795.6	792.1
10°	789.8	788.6	782.9	785.2	780.5	780.5	777.1	777.1	772.4	773.6	769.0
12.5°	766.6	765.5	758.5	760.9	756.2	756.2	752.7	752.7	748.1	750.4	745.8
15°	740.0	738.8	731.9	733.1	728.4	728.4	723.8	725.0	721.5	723.8	719.2
17.5°	709.9	708.7	701.8	702.9	697.2	698.3	694.8	693.7	691.4	692.5	689.1
20°	678.6	676.3	669.4	670.5	668.2	664.7	662.4	663.6	661.3	663.6	660.1
22.5°	646.2	641.6	635.8	635.8	633.5	633.5	630.0	632.3	627.7	631.1	628.8
25°	609.1	605.7	601.0	603.4	598.7	598.7	595.2	596.4	594.1	596.4	594.1
27.5°	573.2	570.9	564.0	566.3	562.8	564.0	560.5	561.7	560.5	562.8	560.5
30°	535.0	533.9	529.2	529.2	528.1	526.9	525.8	525.8	524.6	528.1	525.8
32.5°	499.1	495.7	491.0	494.5	488.7	492.2	489.9	492.2	489.9	492.2	491.0
35°	462.1	460.9	455.1	456.3	455.1	455.1	454.0	454.0	454.0	457.4	457.4
37.5°	422.7	421.5	418.1	419.2	416.9	415.7	415.7	418.1	418.1	420.4	420.4
40°	384.5	385.6	382.2	382.2	381.0	381.0	381.0	383.3	382.2	384.5	383.3
42.5°	346.3	346.3	342.8	343.9	342.8	343.9	343.9	346.3	346.3	347.4	346.3
45°	310.4	310.4	309.2	310.4	308.0	309.2	308.0	310.4	309.2	310.4	310.4
47.5°	274.5	274.5	274.5	273.3	273.3	273.3	273.3	273.3	272.1	274.5	273.3
50°	240.9	242.0	240.9	240.9	239.7	240.9	239.7	239.7	237.4	238.6	238.6
52.5°	210.8	210.8	208.5	208.5	208.5	207.3	207.3	207.3	206.1	206.1	203.8
55°	181.8	181.8	179.5	179.5	178.3	177.2	176.0	176.0	172.6	172.6	169.1
57.5°	155.2	154.0	150.5	150.5	148.2	147.1	145.9	144.8	142.4	140.1	139.0
60°	130.9	128.5	126.2	125.1	122.8	120.4	118.1	115.8	113.5	112.3	111.2
62.5°	107.7	104.2	101.9	100.8	98.4	95.0	92.6	90.3	88.0	86.9	84.5
65°	86.9	83.4	79.9	78.7	76.4	74.1	70.6	68.3	66.0	64.9	64.9
67.5°	68.3	64.9	60.2	60.2	57.9	55.6	53.3	51.0	49.8	51.0	51.0
70°	51.0	48.6	45.2	44.0	41.7	39.4	38.2	38.2	38.2	39.4	38.2
72.5°	38.2	34.7	32.4	31.3	30.1	29.0	29.0	29.0	27.8	29.0	29.0
75°	26.6	24.3	22.0	22.0	20.8	20.8	20.8	20.8	20.8	20.8	20.8
77.5°	18.5	16.2	15.1	15.1	15.1	13.9	13.9	13.9	13.9	13.9	13.9
80°	11.6	11.6	10.4	10.4	9.3	9.3	9.3	9.3	9.3	9.3	9.3
82.5°	6.9	6.9	5.8	5.8	5.8	5.8	5.8	5.8	5.8	5.8	5.8
85°	3.5	3.5	3.5	3.5	3.5	2.3	2.3	2.3	2.3	2.3	2.3
87.5°	1.2	1.2	1.2	1.2	1.2	2.3	2.3	2.3	2.3	2.3	2.3
90°	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):

	150°	155°	157.5°	160°	165°	170°	175°	180°
0°	833.8	833.8	833.8	833.8	833.8	833.8	833.8	833.8
2.5°	823.4	826.9	822.2	825.7	824.5	823.4	821.1	825.7
5°	809.5	810.6	806.0	810.6	809.5	807.2	804.9	809.5
7.5°	789.8	793.3	787.5	792.1	791.0	788.6	786.3	791.0
10°	767.8	771.3	766.6	770.1	770.1	767.8	764.3	769.0
12.5°	743.5	745.8	741.2	745.8	744.6	742.3	741.2	744.6
15°	716.8	720.3	715.7	719.2	718.0	716.8	715.7	719.2
17.5°	687.9	691.4	687.9	691.4	691.4	687.9	686.7	689.1
20°	658.9	661.3	657.8	661.3	660.1	660.1	657.8	661.3
22.5°	626.5	630.0	627.7	630.0	628.8	628.8	627.7	630.0
25°	594.1	597.6	594.1	597.6	596.4	596.4	594.1	599.9
27.5°	561.7	564.0	560.5	565.1	564.0	561.7	562.8	564.0
30°	526.9	529.2	526.9	530.4	530.4	530.4	528.1	530.4
32.5°	492.2	495.7	492.2	495.7	494.5	494.5	493.3	495.7
35°	457.4	458.6	456.3	459.8	459.8	460.9	458.6	462.1
37.5°	421.5	422.7	421.5	422.7	425.0	421.5	423.9	425.0
40°	384.5	386.8	385.6	386.8	386.8	388.0	386.8	388.0
42.5°	347.4	349.7	347.4	350.9	349.7	349.7	350.9	350.9
45°	309.2	312.7	310.4	312.7	313.8	312.7	312.7	315.0
47.5°	273.3	275.6	274.5	275.6	275.6	275.6	275.6	277.9
50°	237.4	238.6	238.6	239.7	239.7	240.9	238.6	239.7
52.5°	201.5	203.8	203.8	203.8	202.7	203.8	203.8	203.8
55°	169.1	170.2	167.9	170.2	170.2	169.1	169.1	171.4
57.5°	137.8	137.8	137.8	137.8	137.8	136.7	137.8	137.8
60°	108.9	110.0	108.9	108.9	108.9	108.9	107.7	110.0
62.5°	84.5	84.5	83.4	84.5	84.5	84.5	85.7	85.7
65°	66.0	67.2	66.0	67.2	67.2	67.2	67.2	68.3
67.5°	52.1	52.1	52.1	52.1	52.1	52.1	52.1	52.1
70°	39.4	39.4	39.4	40.5	39.4	39.4	39.4	40.5
72.5°	29.0	29.0	29.0	29.0	29.0	29.0	30.1	30.1
75°	20.8	20.8	20.8	20.8	20.8	20.8	20.8	20.8
77.5°	13.9	13.9	13.9	15.1	13.9	15.1	13.9	13.9
80°	9.3	9.3	9.3	9.3	9.3	9.3	9.3	9.3
82.5°	5.8	5.8	5.8	5.8	5.8	5.8	5.8	5.8
85°	2.3	2.3	2.3	2.3	2.3	2.3	2.3	2.3
87.5°	2.3	2.3	2.3	2.3	1.2	1.2	1.2	1.2
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



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













(END OF REPORT)