

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: PORTFOLIO

Report Number: P859802

Luminaire Tested: **LX4C08D010 EX4C089030 4LBLWWH**

Issue Date: 2/14/2022



Test Information

Test Method: LM-79-08
Report Number: P859802
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-2107-320-2)
Test Lab: INNOVATION CENTER
Issue Date: 2/14/2022
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: PORTFOLIO
Catalog Number: LX4C08D010 EX4C089030 4LBLWWH
Description: 4 INCH 800 LUMEN PORTFOLIO LED DOWNLIGHT WITH, 3000K, 90CRI LEDS AND
4LRLWW TRIM WITH H FINISH, DIM TO WARM
Light Source: -
Ballast/Driver: -

Summary

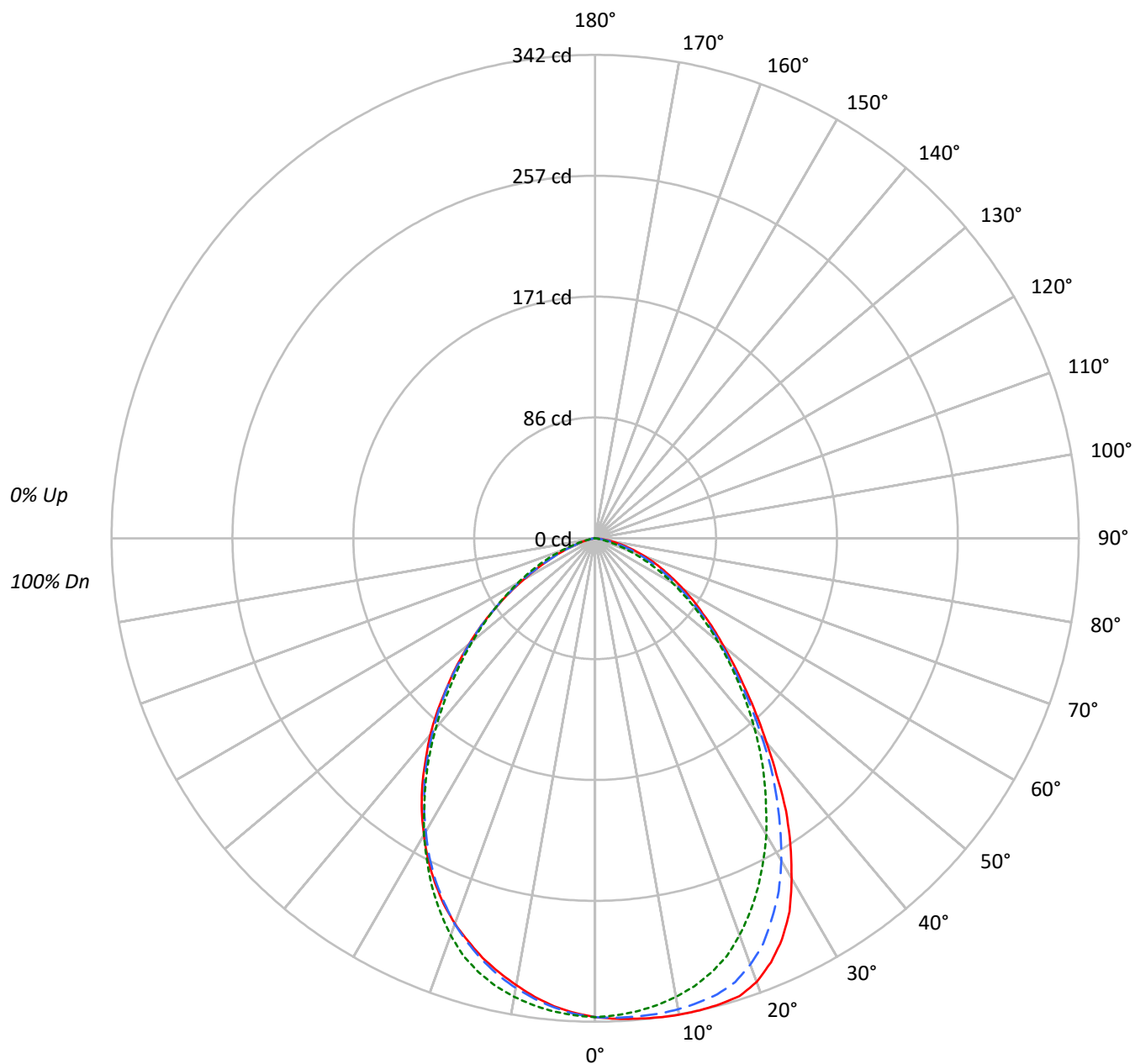
Lumens per Lamp: N/A
Luminaire Lumens: 638.4 lumens
Efficiency: N/A
Efficacy: 59.7 lumens/watt
Spacing Criteria (0/90/45): 1.15 / 1.09 / 1.17
Luminous Opening: Circular (Dia: 0.33' x H: 0')
CIE Type: Direct

Input Watts (W): 10.7
Input Voltage (V):
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: P859802

CATALOG NUMBER: LX4C08D010 EX4C089030 4LBLWWH

Luminous Intensity Polar Plot





TEST NUMBER: P859802

CATALOG NUMBER: LX4C08D010 EX4C089030 4LBLWWH

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	119	119	119	119	116	116	116	116		111	111	111			106	106	106			102
1	111	107	104	101	108	105	102	99		101	98	96			97	95	93			94
2	103	96	90	86	100	94	89	85		91	86	83			88	84	81			85
3	95	86	79	74	93	85	78	73		82	76	72			79	75	71			77
4	88	78	70	64	86	77	69	64		74	68	63			72	67	62			70
5	82	71	63	57	80	69	62	57		67	61	56			66	60	55			64
6	76	64	56	51	74	63	56	50		62	55	50			60	54	50			59
7	71	59	51	46	69	58	51	45		57	50	45			55	49	45			54
8	67	54	47	41	65	54	46	41		52	46	41			51	45	41			50
9	62	50	43	38	61	50	42	37		49	42	37			47	41	37			47
10	59	47	39	34	58	46	39	34		45	39	34			44	38	34			43

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	41623	41623	41623
5°	42078	41436	40992
10°	42701	41092	40044
15°	43396	40433	39085
20°	43666	39064	37927
25°	42415	36952	36383
30°	39423	34344	34358
35°	35289	31300	31975
40°	30214	28065	29092
45°	26009	24741	25662
50°	22610	21540	22190
55°	19898	18527	18356
60°	17691	15455	14251
65°	15523	12384	10291
70°	13326	8729	6968
75°	10822	5031	4082
80°	7712	2193	1981
85°	2960	987	987



TEST NUMBER: P859802

CATALOG NUMBER: LX4C08D010 EX4C089030 4LBLWWH

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	31.9	5.0
10°-20°	90.4	14.2
20°-30°	129.0	20.2
30°-40°	135.0	21.1
40°-50°	113.1	17.7
50°-60°	79.2	12.4
60°-70°	43.1	6.8
70°-80°	15.0	2.3
80°-90°	1.7	0.3
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°	251.3	39.4
0°-40°	386.3	60.5
0°-60°	578.6	90.6
0°-90°	638.4	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	638.4	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	339	339	339	339	339	
5°	341	340	336	333	332	33
15°	341	334	318	309	307	96
25°	313	296	273	267	268	143
35°	235	224	209	210	213	146
45°	150	146	142	147	148	116
55°	93	90	86	86	86	84
65°	53	49	43	36	35	53
75°	23	18	11	9	9	25
85°	2	1	1	1	1	4
90°	0	0	0	0	0	



TEST NUMBER: P859802

CATALOG NUMBER: LX4C08D010 EX4C089030 4LBLWWH

CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
0°	338.8	338.8	338.8	338.8	338.8	338.8	338.8	338.8	338.8	338.8	338.8
2.5°	340.3	339.9	340.1	340.1	340.1	339.9	340.1	339.9	339.9	339.8	339.5
5°	341.2	341.0	341.0	341.0	340.9	340.7	340.7	340.6	340.3	340.2	339.6
7.5°	341.9	341.6	341.6	341.5	341.3	341.2	341.0	340.7	340.3	340.1	339.4
10°	342.3	341.9	341.9	341.6	341.3	341.2	341.0	340.5	339.9	339.2	338.4
12.5°	342.0	341.6	341.5	341.2	340.7	340.5	340.2	339.5	338.6	337.7	336.5
15°	341.2	341.0	340.7	340.3	339.6	339.2	339.1	338.0	336.8	335.5	334.0
17.5°	339.6	339.2	338.8	338.2	337.3	337.0	336.3	335.0	333.3	331.5	329.3
20°	334.0	333.8	333.3	332.4	331.0	330.4	329.5	327.8	325.6	323.4	321.0
22.5°	324.8	324.4	323.7	322.8	321.6	320.6	319.9	317.5	315.0	312.7	310.5
25°	312.9	312.6	311.5	310.5	309.1	307.6	306.8	305.0	302.6	299.5	296.3
27.5°	297.7	296.4	296.0	294.9	292.9	292.4	291.2	288.9	286.5	283.9	281.2
30°	277.9	277.9	277.1	276.6	274.7	274.3	272.9	270.5	269.1	265.5	263.4
32.5°	257.0	256.7	256.0	255.6	254.6	253.6	252.4	251.1	248.2	246.3	243.5
35°	235.3	233.7	234.0	233.2	232.6	231.5	231.4	230.0	227.3	226.3	223.7
37.5°	210.7	210.0	210.9	209.8	209.1	209.3	208.2	207.3	206.2	204.4	203.9
40°	188.4	189.0	188.8	187.7	188.3	187.6	186.6	185.6	185.2	184.0	183.5
42.5°	168.4	167.7	167.4	167.4	167.6	167.6	167.0	166.3	166.3	165.2	164.1
45°	149.7	149.7	149.4	150.2	149.1	149.1	148.7	148.5	148.0	147.7	146.3
47.5°	133.6	133.4	133.3	133.2	133.0	133.0	132.2	131.6	131.5	130.7	129.9
50°	118.3	119.1	118.8	118.2	117.9	118.1	117.5	117.1	117.0	115.7	115.8
52.5°	105.5	105.4	105.6	105.3	104.6	104.8	104.2	103.7	103.2	102.5	102.0
55°	92.9	93.6	93.3	92.9	92.7	92.5	92.1	91.5	91.3	89.9	89.8
57.5°	82.4	82.2	82.0	81.3	81.1	80.8	80.8	80.3	79.5	78.7	78.1
60°	72.0	72.0	71.6	71.5	71.0	70.9	70.8	70.2	69.4	68.7	67.6
62.5°	62.1	62.4	62.1	61.8	61.4	60.8	60.6	60.2	59.4	58.8	57.9
65°	53.4	53.3	53.2	52.6	52.5	52.0	51.9	51.1	50.3	49.8	48.7
67.5°	45.1	44.6	44.6	44.5	44.2	43.8	43.5	42.8	41.8	41.3	40.3
70°	37.1	36.9	36.9	36.9	36.2	35.8	35.7	35.3	34.0	33.4	32.4
72.5°	29.8	29.7	29.5	29.2	28.8	28.8	28.3	27.5	26.9	26.2	25.4
75°	22.8	23.1	22.8	22.3	22.1	21.8	21.5	20.8	20.2	19.4	18.5
77.5°	16.7	16.4	16.2	16.2	15.9	15.4	15.2	14.7	14.0	13.4	12.5
80°	10.9	10.8	10.5	10.3	10.2	10.1	9.9	9.4	8.6	8.2	7.4
82.5°	6.0	5.9	5.9	5.7	5.3	5.3	5.2	4.7	4.3	4.1	3.6
85°	2.1	2.1	2.1	2.0	2.0	2.0	1.8	1.7	1.5	1.4	1.1
87.5°	0.3	0.1	0.3	0.1	0.3	0.1	0.1	0.1	0.1	0.1	0.1
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: P859802

CATALOG NUMBER: LX4C08D010 EX4C089030 4LBLWWH

CANDELA DISTRIBUTION (continued):

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°	95°
0°	338.8	338.8	338.8	338.8	338.8	338.8	338.8	338.8	338.8	338.8	338.8
2.5°	339.2	339.1	338.9	338.8	338.6	338.5	338.4	338.1	338.0	337.8	337.5
5°	339.2	338.8	338.5	338.1	337.8	337.5	337.2	336.8	336.4	336.0	335.6
7.5°	338.8	338.0	337.4	336.7	336.4	336.0	335.3	334.7	334.0	333.3	332.4
10°	337.4	336.5	335.5	334.5	334.0	333.4	332.4	331.5	330.4	329.4	328.4
12.5°	335.3	333.9	332.6	331.2	330.4	329.7	328.3	327.0	325.8	324.5	323.0
15°	332.2	330.5	328.9	326.9	325.9	325.2	323.1	321.6	319.5	317.9	316.3
17.5°	327.2	324.5	322.4	320.0	318.7	317.8	316.0	313.5	311.5	309.8	308.0
20°	318.4	316.0	313.1	310.4	308.9	307.7	305.1	302.6	300.6	298.8	296.8
22.5°	306.9	303.8	301.7	298.4	297.2	295.7	292.6	290.3	288.0	286.2	284.4
25°	293.0	290.3	287.4	284.3	282.8	281.2	278.5	276.1	274.6	272.6	270.4
27.5°	277.0	274.7	271.2	268.6	267.0	265.8	263.3	261.1	259.0	257.5	255.5
30°	260.0	257.4	254.3	251.5	250.7	249.1	246.9	245.2	243.0	242.1	241.2
32.5°	241.4	238.4	236.1	234.3	232.7	231.4	230.2	227.5	227.0	224.8	224.5
35°	221.1	219.8	217.6	216.0	214.7	213.8	211.8	210.5	209.1	208.7	207.8
37.5°	202.0	200.4	198.3	196.8	196.0	195.8	194.4	193.6	192.6	192.1	191.0
40°	181.9	181.3	179.5	179.2	177.7	177.6	176.8	175.8	175.0	175.0	175.1
42.5°	163.4	162.6	161.8	160.9	160.2	160.2	159.7	159.5	159.2	158.8	159.5
45°	146.0	145.0	144.5	143.5	143.9	143.2	142.9	142.9	142.5	142.4	143.4
47.5°	129.9	128.7	128.2	128.0	128.0	128.1	126.9	127.3	127.2	127.4	127.8
50°	115.1	114.1	113.3	113.3	113.5	113.0	112.5	112.9	112.5	112.7	113.6
52.5°	101.5	100.4	100.0	100.0	99.3	99.2	99.4	98.9	99.0	99.2	99.7
55°	88.8	88.2	87.6	86.9	87.0	86.7	86.3	86.2	86.4	86.5	87.2
57.5°	77.5	76.6	75.7	75.4	75.1	75.1	74.5	74.4	74.7	74.0	74.0
60°	66.7	66.2	65.0	64.6	64.6	63.9	63.5	63.7	63.1	62.9	63.1
62.5°	56.7	56.2	55.5	54.7	54.4	54.2	53.6	53.3	53.0	52.5	51.7
65°	48.0	47.0	46.1	45.6	45.2	44.6	44.2	43.6	42.8	42.6	41.8
67.5°	39.2	38.3	37.4	37.0	36.6	36.2	35.5	35.0	34.0	33.0	32.0
70°	31.5	30.4	29.8	28.8	28.5	28.0	27.1	26.4	25.6	24.3	23.5
72.5°	24.1	23.3	22.5	21.7	21.0	20.6	19.8	18.7	17.8	17.1	16.2
75°	17.3	16.9	15.9	14.8	14.6	14.1	13.2	12.5	11.7	10.6	9.9
77.5°	11.7	10.9	10.3	9.4	9.1	8.6	8.1	7.4	6.9	6.3	5.7
80°	6.9	6.3	5.9	5.2	4.9	4.7	4.3	3.8	3.4	3.1	3.0
82.5°	3.4	2.8	2.8	2.4	2.2	2.1	1.8	1.7	1.4	1.4	1.4
85°	1.1	1.0	1.0	0.8	0.7	0.7	0.7	0.7	0.7	0.7	0.7
87.5°	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.3	0.1
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: P859802

CATALOG NUMBER: LX4C08D010 EX4C089030 4LBLWWH

CANDELA DISTRIBUTION (continued):

	100°	105°	110°	112.5°	115°	120°	125°	130°	135°	140°	145°
0°	338.8	338.8	338.8	338.8	338.8	338.8	338.8	338.8	338.8	338.8	338.8
2.5°	337.4	337.3	337.2	337.1	337.1	337.0	337.0	336.8	336.8	336.7	336.7
5°	335.1	334.7	334.5	334.2	334.2	333.8	333.5	333.3	333.2	333.2	332.9
7.5°	331.8	331.4	330.8	330.4	330.3	329.6	329.1	329.1	328.6	328.3	328.0
10°	327.6	326.6	325.8	325.5	324.9	324.5	323.9	323.5	323.1	322.4	322.3
12.5°	321.7	321.0	319.9	319.3	319.1	318.2	317.3	316.7	316.6	316.1	315.7
15°	315.0	313.6	312.6	311.9	311.9	310.6	310.1	309.3	308.8	308.4	308.3
17.5°	306.5	305.0	304.0	303.0	302.8	301.7	301.0	300.7	300.0	300.3	299.6
20°	295.4	294.2	293.5	292.2	292.2	291.6	291.4	290.7	290.4	290.1	290.4
22.5°	283.5	282.1	280.7	280.6	280.6	279.8	279.6	279.5	278.9	279.3	279.2
25°	269.6	268.6	267.7	267.6	267.6	267.0	266.6	266.9	267.2	267.0	267.5
27.5°	255.1	254.0	253.8	253.6	253.4	253.3	253.6	253.6	253.9	254.4	255.0
30°	239.5	239.2	238.8	238.7	238.4	239.1	239.3	239.7	239.6	240.4	240.9
32.5°	223.8	223.3	223.2	223.4	223.8	223.7	224.5	224.8	225.1	225.9	226.3
35°	208.0	208.0	207.7	207.7	207.8	208.8	208.8	209.8	210.3	210.5	211.6
37.5°	191.1	191.6	191.9	192.3	192.5	192.8	193.1	194.0	194.6	195.0	195.6
40°	175.7	175.4	176.5	175.8	176.0	177.2	177.7	177.6	178.4	179.2	179.6
42.5°	159.1	159.5	159.7	160.0	160.6	160.7	161.4	162.4	162.6	163.5	163.8
45°	143.1	143.2	143.7	144.2	144.6	145.6	145.9	146.3	147.1	147.1	147.4
47.5°	128.0	128.4	128.4	129.2	129.9	129.8	130.7	130.9	130.8	131.5	131.8
50°	113.5	114.3	114.1	114.7	115.0	115.0	115.8	116.1	115.5	116.2	116.4
52.5°	99.7	100.0	100.6	100.7	100.4	101.1	100.9	101.4	101.3	101.7	101.3
55°	87.0	86.9	86.9	87.2	86.9	87.2	87.4	86.9	86.5	87.0	86.9
57.5°	74.4	74.4	74.1	74.5	74.1	73.7	73.6	73.2	72.9	72.9	72.7
60°	62.5	62.3	61.8	61.7	61.7	61.0	60.7	60.2	60.2	59.7	59.2
62.5°	51.5	50.8	50.4	50.4	50.2	49.5	48.4	47.6	47.3	46.6	46.4
65°	41.0	40.4	40.0	39.2	38.6	38.3	37.1	36.2	35.8	35.1	35.2
67.5°	31.5	30.5	29.4	28.8	28.4	27.5	27.1	26.4	26.0	26.0	26.0
70°	22.7	21.8	20.6	20.2	20.0	19.2	18.7	18.6	19.0	18.9	19.0
72.5°	15.2	14.3	13.8	13.6	13.3	12.9	13.2	13.3	13.0	13.2	13.3
75°	9.2	9.0	8.6	8.5	8.5	8.6	8.5	8.5	8.6	8.6	8.7
77.5°	5.3	5.0	5.0	4.9	5.2	5.0	5.0	5.0	5.2	5.2	5.2
80°	2.8	2.8	2.8	2.8	3.0	2.8	3.0	3.0	3.0	3.0	3.0
82.5°	1.4	1.4	1.4	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.4
85°	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.7
87.5°	0.1	0.3	0.3	0.3	0.3	0.3	0.1	0.1	0.1	0.1	0.1
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: P859802

CATALOG NUMBER: LX4C08D010 EX4C089030 4LBLWWH

CANDELA DISTRIBUTION (continued):

	150°	155°	157.5°	160°	165°	170°	175°	180°
0°	338.8	338.8	338.8	338.8	338.8	338.8	338.8	338.8
2.5°	336.4	336.4	336.4	336.1	336.3	336.3	336.1	336.1
5°	332.8	332.6	332.4	332.4	332.1	332.4	332.2	332.4
7.5°	327.8	327.8	327.4	327.4	327.3	327.2	327.0	327.2
10°	322.0	322.0	321.7	321.6	321.7	321.2	321.2	321.0
12.5°	315.4	315.2	314.9	315.0	314.9	314.5	314.4	314.5
15°	307.9	307.5	307.6	307.2	307.2	307.1	307.3	307.3
17.5°	299.5	299.2	299.1	299.2	298.9	299.1	298.9	298.8
20°	290.3	290.1	290.1	289.7	289.8	289.7	289.8	290.1
22.5°	279.6	279.5	279.6	279.2	279.5	279.5	279.9	279.9
25°	267.9	267.7	268.0	268.1	268.3	268.7	268.3	268.4
27.5°	254.9	255.3	255.6	255.7	256.3	255.9	255.6	256.0
30°	241.7	241.7	241.6	242.1	242.4	242.8	242.2	242.2
32.5°	226.6	227.2	227.2	227.3	227.7	227.7	227.7	228.3
35°	212.1	212.5	212.6	212.1	212.3	212.2	213.2	213.2
37.5°	196.0	196.0	196.1	197.0	197.0	196.6	196.8	196.8
40°	180.6	180.7	180.2	180.4	181.1	180.9	181.1	181.4
42.5°	163.8	164.7	164.2	164.4	164.3	164.4	164.5	164.5
45°	147.7	148.0	148.0	148.1	148.4	148.7	147.9	147.7
47.5°	132.1	132.2	132.6	132.0	132.8	132.0	132.8	131.9
50°	116.4	116.8	116.5	116.8	116.4	116.4	116.2	116.1
52.5°	101.4	101.3	101.3	101.1	101.1	101.4	101.1	101.5
55°	86.4	86.5	86.3	86.2	86.0	86.4	86.0	85.7
57.5°	72.2	72.5	71.9	72.2	71.2	71.6	71.8	71.9
60°	59.0	58.6	58.6	58.1	58.1	58.5	58.0	58.0
62.5°	45.7	46.0	45.6	46.1	46.1	46.6	46.4	46.6
65°	35.1	35.2	35.3	35.3	35.3	36.1	35.8	35.4
67.5°	26.4	26.6	26.7	26.6	27.0	26.7	26.7	26.9
70°	19.2	19.3	19.4	19.4	19.3	19.4	19.4	19.4
72.5°	13.3	13.4	13.3	13.4	13.6	13.4	13.4	13.6
75°	8.7	8.7	8.6	8.6	8.6	8.6	8.7	8.6
77.5°	5.0	5.2	5.0	5.2	5.2	5.2	5.2	5.2
80°	3.0	3.0	3.0	2.8	3.0	3.0	3.0	2.8
82.5°	1.5	1.5	1.4	1.4	1.5	1.5	1.5	1.5
85°	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.7
87.5°	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



Report Generated By 670246072 / DESKTOP-50001EG





— 0°-180° - - 45°-225° - - - 90°-270°













(END OF REPORT)