

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: McGRAW-EDISON

Report Number: P192198

Luminaire Tested: **GLEON-AF-10-LED-E1-T2R-7050-600**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P192198
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P24657)
Test Lab: INNOVATION CENTER-P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: MCGRAW-EDISON
Catalog Number: GLEON-AF-10-LED-E1-T2R-7050-600
Description: GALLEON AREA AND ROADWAY LUMINAIRE
(10) 70 CRI, 5000K, 615mA LIGHTSQUARES WITH 16 LEDS EACH AND TYPE II
ROADWAY OPTICS
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 40441 lumens
Efficiency: N/A
Efficacy: 125.2 lumens/watt
Luminous Opening: Rectangular (W 2.5' x L: 1' x H: 0')
IES Classification: Type II - Short - Full Cutoff
BUG Rating: B3 - U0 - G4

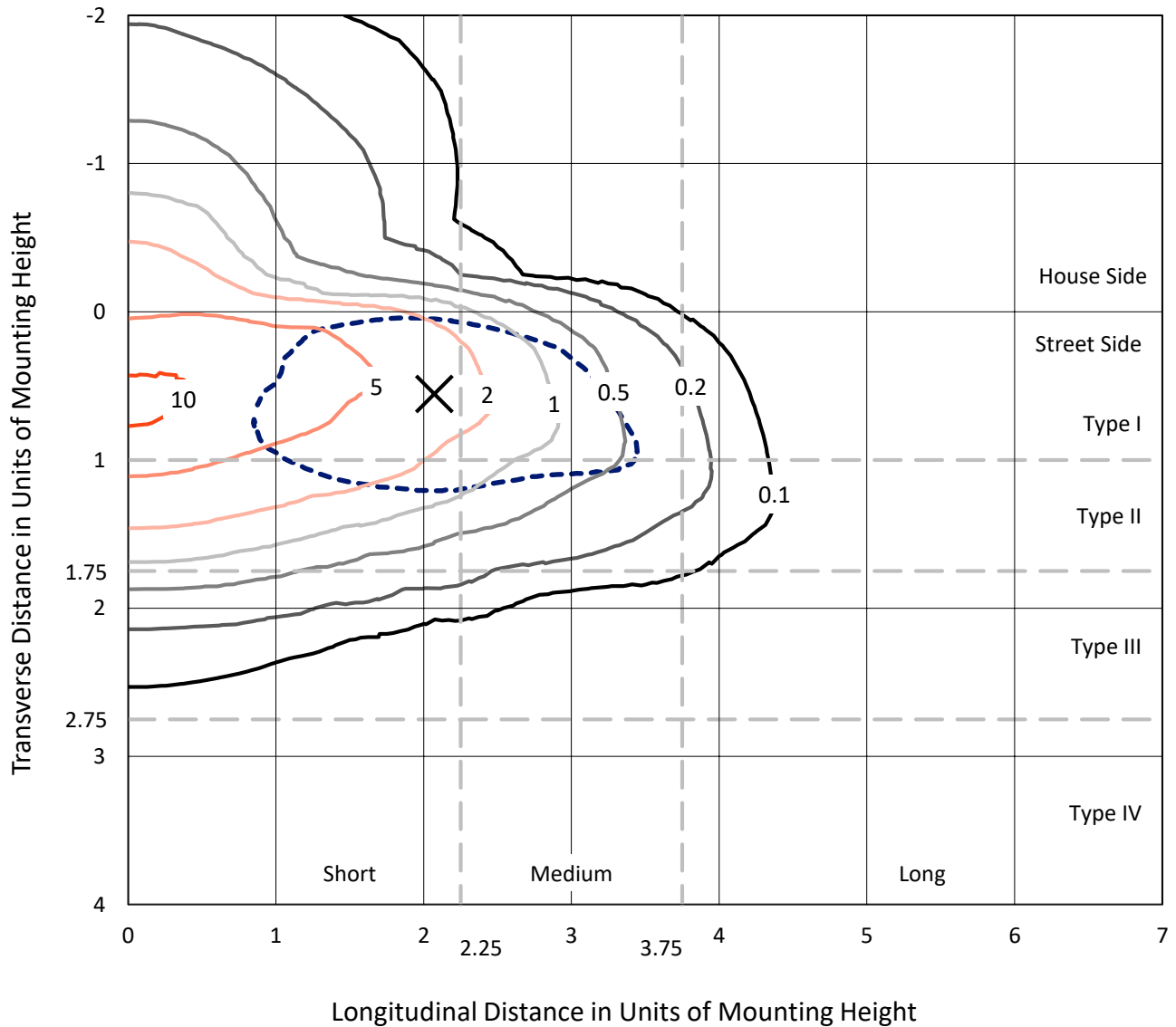
Input Watts (W): 323
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



REPORT NUMBER: P192198
 CATALOG NUMBER: GLEON-AF-10-LED-E1-T2R-7050-600

Iso-Footcandle Lines of Horizontal Illumination

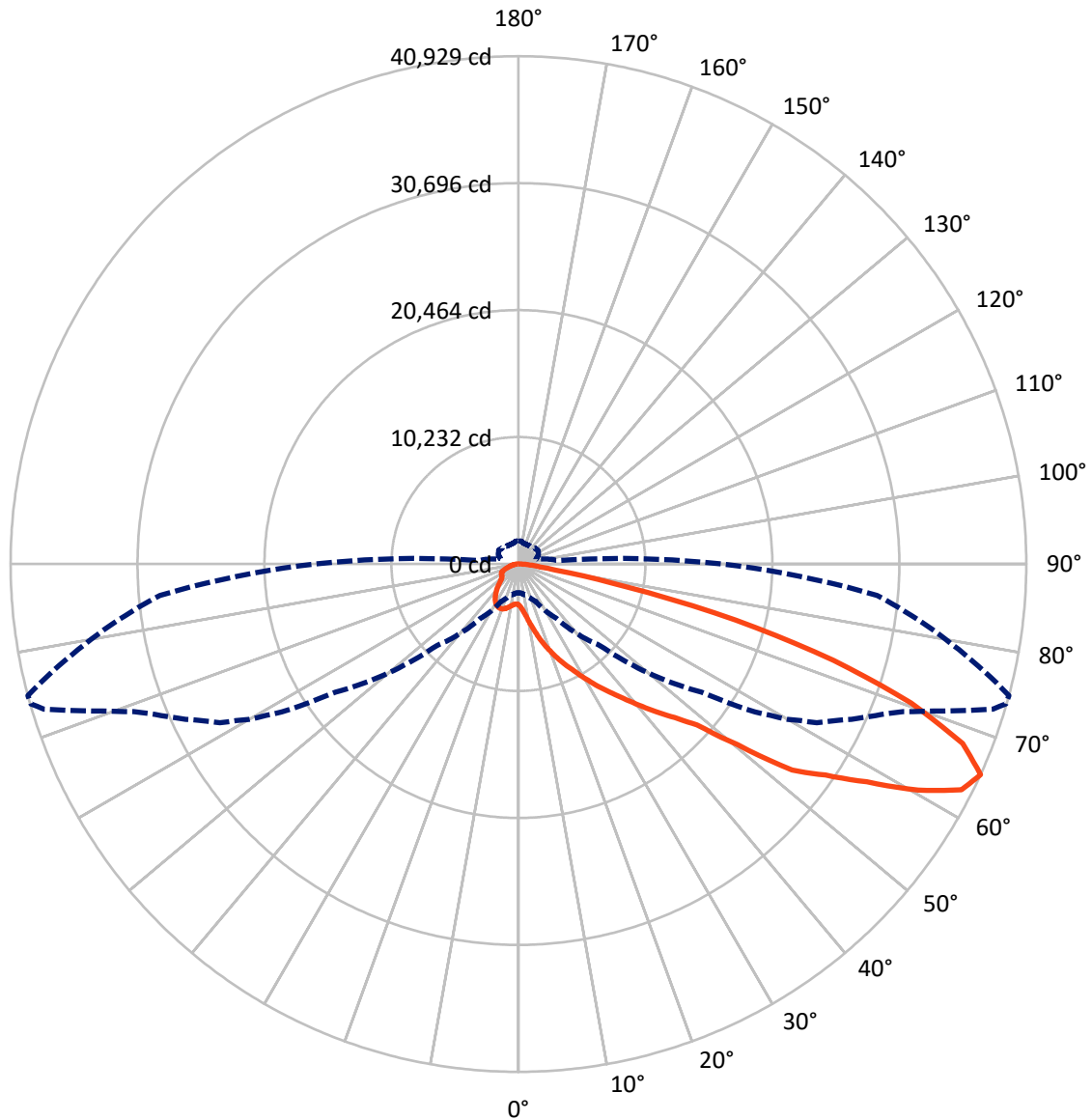
✕ Max cd
 - - - 1/2 Max cd



Based on 30 foot mounting height. Maximum calculated value = 11.3 fc
 Type II - Short - Full Cutoff

REPORT NUMBER: P192198
CATALOG NUMBER: GLEON-AF-10-LED-E1-T2R-7050-600

Luminous Intensity Polar Plot



— Vertical Plane Through 75-Deg Lateral - - - Horizontal Cone Through 65-Deg Vertical

REPORT NUMBER: P192198

CATALOG NUMBER: GLEON-AF-10-LED-E1-T2R-7050-600

FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	6235.1	0.0	6235.1
	% Fixture	15.4	0.0	15.4
Street Side	Lumens	34205.9	0.0	34205.9
	% Fixture	84.6	0.0	84.6
Total	Lumens	40441.0	0.0	40441.0
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	406.2	1.0
10°-20°	1587.3	3.9
20°-30°	3256.5	8.1
30°-40°	5478.9	13.5
40°-50°	7570.3	18.7
50°-60°	9450.1	23.4
60°-70°	8504.0	21.0
70°-80°	3564.8	8.8
80°-90°	622.8	1.5
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°-90°	40441.0	100.0
0°-180°	40441.0	100.0

Coefficient of Utilization



REPORT NUMBER: P192198

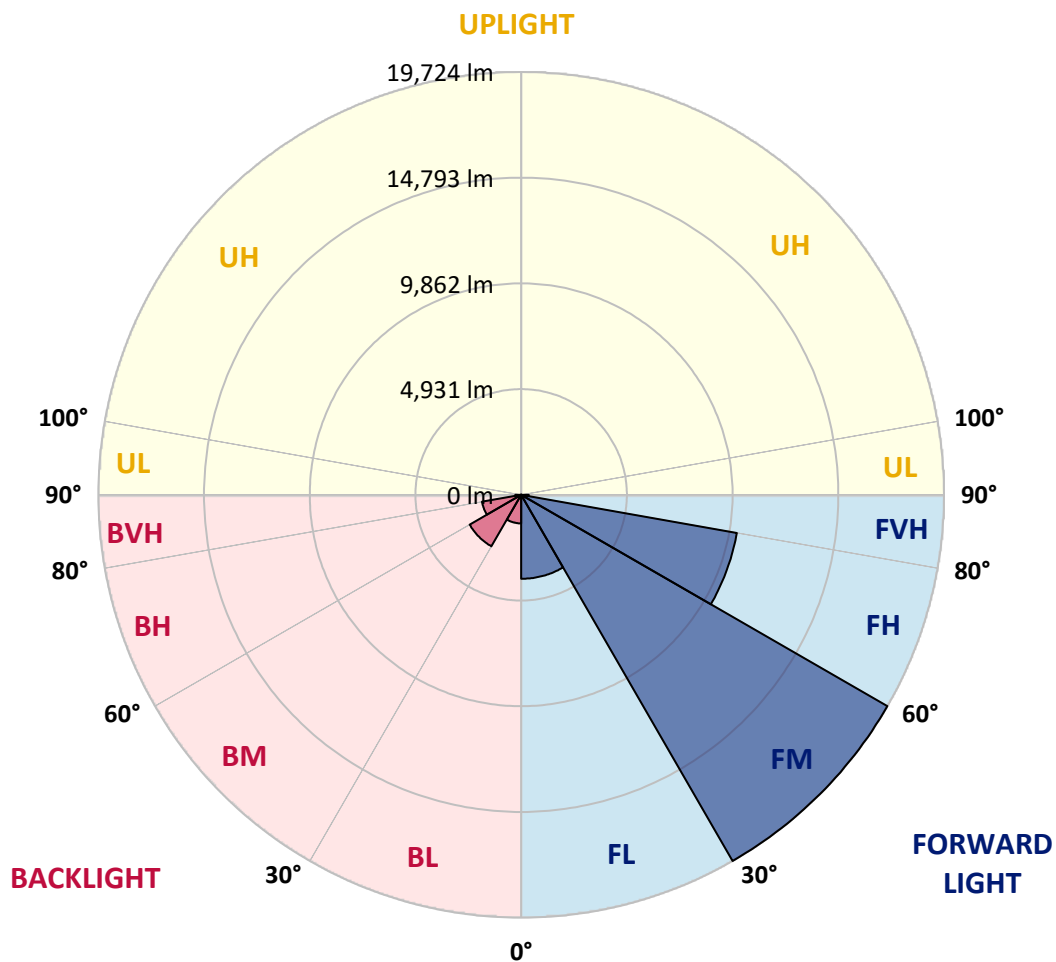
CATALOG NUMBER: GLEON-AF-10-LED-E1-T2R-7050-600

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	3916.6	9.7			
FM	(30°-60°)	19724.0	48.8			
FH	(60°-80°)	10215.3	25.3			G4/12000
FVH	(80°-90°)	350.0	0.9			G3/500
BL	(0°-30°)	1333.4	3.3	B3/2500		
BM	(30°-60°)	2775.3	6.9	B3/5000		
BH	(60°-80°)	1853.6	4.6	B3/2500		G3/2500
BVH	(80°-90°)	272.7	0.7			G3/500
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B3-U0-G4

Type II Short





REPORT NUMBER: P192198

CATALOG NUMBER: GLEON-AF-10-LED-E1-T2R-7050-600

CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	56°	57°	58°	59°
0°	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6
2.5°	4172.9	4126.9	4138.4	4061.8	3968.0	3845.5	3709.6	3707.7	3709.6	3696.2	3646.5
5°	5786.5	5731.0	5709.9	5537.7	5285.0	4925.1	4534.6	4492.5	4475.3	4431.3	4329.8
7.5°	6963.7	6933.1	6900.5	6770.4	6540.7	6138.7	5614.2	5524.3	5438.1	5417.1	5302.2
10°	7723.6	7716.0	7647.1	7612.6	7469.0	7120.7	6609.6	6523.4	6429.6	6397.1	6276.5
12.5°	8324.7	8322.7	8290.2	8299.8	8175.4	7922.7	7482.4	7404.0	7335.0	7235.5	7149.4
15°	8740.0	8741.9	8789.8	8843.4	8824.3	8653.9	8240.4	8206.0	8146.6	8077.7	7976.3
17.5°	9080.8	9090.3	9140.1	9237.7	9343.0	9329.6	9002.3	8973.6	8921.9	8828.1	8774.5
20°	9850.2	9886.6	9790.9	9790.9	9802.4	9854.1	9697.1	9674.1	9601.4	9551.6	9509.5
22.5°	11150.0	11192.1	10975.8	10755.6	10539.3	10382.4	10225.4	10254.1	10204.4	10169.9	10145.0
25°	12838.2	12870.8	12520.5	12149.1	11708.9	11134.6	10746.1	10728.8	10702.0	10681.0	10669.5
27.5°	14427.0	14440.4	14109.2	13565.6	13054.5	12229.5	11274.4	11253.3	11220.8	11180.6	11146.1
30°	15786.0	15782.2	15441.5	14922.8	14375.3	13462.3	12076.4	12011.3	11915.6	11806.5	11722.3
32.5°	16963.2	16957.5	16584.2	16046.4	15472.1	14683.5	13175.1	13041.1	12891.8	12679.4	12551.1
35°	17889.7	17885.9	17533.7	16972.8	16314.3	15833.9	14434.6	14270.0	14080.5	13795.3	13598.2
37.5°	18240.0	18240.0	18042.8	17660.0	17078.1	16748.9	15833.9	15634.8	15431.9	15108.4	14886.4
40°	18035.2	18039.0	18081.1	18010.3	17727.0	17474.3	17139.3	17020.7	16846.5	16555.5	16323.9
42.5°	17348.0	17369.0	17648.5	17991.1	18132.8	18092.6	18297.4	18243.8	18121.3	17897.4	17713.6
45°	16477.0	16542.1	16848.4	17495.4	18245.7	18626.6	19267.9	19273.6	19250.7	19130.1	18988.4
47.5°	15280.7	15372.6	15776.5	16651.2	17981.6	19145.4	20253.7	20305.4	20353.2	20274.7	20209.7
50°	13692.0	13801.1	14405.9	15565.9	17443.7	19683.3	22116.2	22349.7	22567.9	22541.1	22585.1
52.5°	11990.3	12118.5	12859.3	14151.4	16519.2	19807.7	23306.8	23687.7	24068.6	24380.6	24711.7
55°	10455.1	10386.2	11127.0	12487.9	14999.3	19246.8	24376.8	24836.2	25261.1	25643.9	26038.3
57.5°	8374.4	8487.4	9230.1	10575.7	12987.5	17663.8	25113.7	25785.6	26396.2	27029.8	27588.7
60°	6121.5	6234.4	7040.3	8407.0	10803.5	15263.5	24551.0	25569.3	26547.4	27517.9	28275.9
62.5°	3696.2	3780.5	4490.6	5792.2	8330.4	12417.1	22043.4	23379.5	24818.9	25978.9	27140.8
65°	2300.8	2348.7	2610.9	3326.8	5350.1	9270.3	18010.3	19467.0	21017.4	22489.4	23697.2
67.5°	1883.5	1900.8	1948.6	2101.7	2938.2	6044.9	13404.8	14695.0	16094.2	17518.4	18862.1
70°	1694.0	1682.5	1682.5	1692.1	1883.5	3250.2	8776.4	9616.7	10782.4	12020.9	13249.8
72.5°	1529.4	1517.9	1496.9	1468.2	1537.1	1983.1	4536.5	5170.1	6010.4	7111.1	8288.3
75°	1374.4	1359.1	1334.2	1297.8	1345.7	1496.9	2178.3	2444.4	2854.0	3439.7	4096.3
77.5°	1213.6	1194.4	1171.5	1144.7	1205.9	1163.8	1276.7	1372.4	1529.4	1717.0	1963.9
80°	1031.7	1014.5	1006.8	993.4	1066.2	886.3	901.6	960.9	1052.8	1154.2	1269.1
82.5°	807.8	807.8	838.4	844.1	924.5	637.4	673.8	725.5	773.3	826.9	880.5
85°	532.1	536.0	639.3	679.5	729.3	428.8	505.3	522.6	560.8	591.5	614.4
87.5°	166.5	179.9	390.5	432.6	419.2	243.1	310.1	317.7	344.5	365.6	384.7
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



REPORT NUMBER: P192198

CATALOG NUMBER: GLEON-AF-10-LED-E1-T2R-7050-600

CANDELA DISTRIBUTION (continued):

	60°	61°	62°	63°	64°	65°	66°	67°	68°	69°	70°
0°	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6
2.5°	3646.5	3623.5	3602.4	3600.5	3585.2	3564.2	3571.8	3539.3	3541.2	3524.0	3504.8
5°	4287.7	4272.4	4195.8	4174.8	4117.3	4081.0	4075.2	3998.7	3989.1	3945.1	3897.2
7.5°	5210.3	5160.6	5053.4	5001.7	4904.1	4831.3	4796.9	4695.4	4645.7	4530.8	4479.1
10°	6177.0	6113.8	5981.7	5909.0	5815.2	5698.4	5635.3	5487.9	5430.5	5325.2	5198.8
12.5°	7072.8	7009.6	6873.7	6818.2	6693.8	6569.4	6500.5	6333.9	6259.3	6090.8	5991.3
15°	7901.6	7838.5	7719.8	7662.4	7537.9	7436.5	7344.6	7180.0	7091.9	6935.0	6804.8
17.5°	8705.6	8638.6	8535.2	8483.5	8362.9	8259.6	8160.0	8005.0	7915.0	7758.1	7641.3
20°	9452.1	9402.3	9327.7	9258.8	9138.2	9044.4	8925.7	8791.7	8661.6	8546.7	8435.7
22.5°	10102.9	10083.8	10003.4	9972.7	9869.4	9789.0	9685.6	9553.5	9459.8	9314.3	9210.9
25°	10663.8	10658.0	10619.7	10610.2	10537.4	10460.9	10437.9	10328.8	10242.6	10114.4	10007.2
27.5°	11146.1	11151.9	11142.3	11169.1	11150.0	11115.5	11117.4	11081.0	11031.3	10924.1	10830.3
30°	11682.1	11651.5	11668.7	11707.0	11718.5	11722.3	11785.5	11806.5	11802.7	11731.9	11685.9
32.5°	12440.1	12367.4	12300.4	12294.6	12332.9	12348.2	12455.4	12510.9	12558.8	12576.0	12583.7
35°	13406.7	13261.3	13121.5	13046.9	12981.8	12999.0	13075.6	13165.6	13270.8	13343.6	13429.7
37.5°	14624.1	14446.1	14199.2	14023.1	13979.1	13883.4	13933.1	14004.0	14107.3	14220.3	14369.6
40°	16100.0	15830.1	15552.5	15319.0	15192.7	15016.5	15014.6	15001.2	15064.4	15169.7	15380.2
42.5°	17520.3	17281.0	16986.2	16741.2	16576.6	16341.1	16293.3	16168.9	16197.6	16289.5	16494.3
45°	18850.6	18653.4	18473.5	18190.2	18050.5	17795.9	17715.5	17568.1	17485.8	17527.9	17732.7
47.5°	20138.8	20012.5	19824.9	19641.1	19534.0	19306.2	19202.8	19097.5	18992.2	18988.4	19202.8
50°	22650.2	22583.2	22361.2	22169.7	22221.4	21942.0	21959.2	21675.9	21804.1	21819.5	22269.3
52.5°	25010.4	25243.9	25408.5	25609.5	25739.6	25764.5	25850.7	25978.9	26134.0	26440.2	26857.5
55°	26361.7	26654.6	26825.0	26978.1	27230.8	27284.4	27427.9	27598.3	27734.2	28078.7	28432.9
57.5°	27967.7	28511.3	28775.5	29018.6	29359.3	29489.5	29728.7	29914.4	30090.5	30498.2	30927.0
60°	28957.3	29619.6	30157.5	30542.3	30969.1	31275.4	31637.2	31928.1	32341.6	32829.7	33469.0
62.5°	28170.6	29143.0	29857.0	30517.4	31097.4	31683.1	32201.8	32745.5	33373.3	34112.2	35103.7
65°	25037.2	26026.8	27249.9	27935.2	28702.8	29606.2	30394.9	31275.4	32131.0	33206.8	34673.0
67.5°	20156.1	21306.5	22680.8	23371.8	24254.3	25263.0	26147.4	27223.1	28222.3	29525.8	31338.6
70°	14528.4	16015.7	17171.9	17893.5	18923.3	19962.7	20816.4	22068.3	22895.2	24231.3	26105.3
72.5°	9199.4	10372.8	11789.3	12698.5	13613.5	14666.3	15539.1	16618.7	17390.1	18607.5	20305.4
75°	4946.2	5811.4	7055.6	7918.9	8898.9	9798.6	10820.7	11544.3	12114.7	13077.5	14455.7
77.5°	2318.0	2844.4	3474.2	4138.4	4802.6	5495.5	6169.3	6755.1	7000.1	7551.3	8364.9
80°	1406.9	1577.3	1761.0	1965.8	2243.4	2467.3	2764.0	2978.4	2993.7	3167.9	3416.8
82.5°	939.9	1003.0	1058.5	1110.2	1181.0	1236.5	1299.7	1374.4	1405.0	1445.2	1525.6
85°	641.2	671.9	683.4	715.9	708.2	727.4	752.3	777.1	790.5	788.6	825.0
87.5°	394.3	409.6	417.3	424.9	419.2	411.5	423.0	436.4	440.3	428.8	432.6
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



REPORT NUMBER: P192198

CATALOG NUMBER: GLEON-AF-10-LED-E1-T2R-7050-600

CANDELA DISTRIBUTION (continued):

	71°	72°	73°	74°	75°	85°	90°	95°	105°	115°	125°
0°	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6
2.5°	3508.6	3491.4	3474.2	3462.7	3458.9	3357.4	3313.4	3284.7	3223.4	3173.7	3133.5
5°	3870.4	3834.1	3805.3	3770.9	3751.7	3495.2	3401.5	3336.4	3229.2	3166.0	3108.6
7.5°	4452.3	4350.9	4291.5	4224.5	4167.1	3703.9	3548.8	3447.4	3298.1	3213.9	3148.8
10°	5112.7	5007.4	4913.6	4810.3	4720.3	3981.4	3755.6	3598.6	3401.5	3292.3	3206.2
12.5°	5849.7	5746.3	5627.6	5495.5	5380.7	4333.6	4019.7	3795.8	3525.9	3380.4	3259.8
15°	6720.6	6538.8	6395.2	6242.1	6108.1	4754.8	4327.9	4017.8	3658.0	3460.8	3300.0
17.5°	7530.3	7338.9	7143.6	7009.6	6854.6	5227.6	4638.0	4243.7	3767.1	3512.5	3307.7
20°	8320.8	8112.2	7943.7	7763.8	7601.1	5717.6	4969.1	4442.8	3837.9	3514.4	3259.8
22.5°	9017.6	8887.4	8699.8	8504.6	8340.0	6207.6	5279.2	4611.2	3864.7	3470.4	3175.6
25°	9810.0	9672.2	9442.5	9277.9	9094.2	6707.2	5583.6	4741.4	3849.4	3388.1	3045.4
27.5°	10656.1	10503.0	10267.5	10095.3	9873.2	7225.9	5863.1	4835.2	3791.9	3254.1	2871.2
30°	11538.5	11398.8	11167.2	10993.0	10769.0	7775.3	6175.1	4898.3	3677.1	3068.4	2668.3
32.5°	12486.0	12369.3	12139.6	11957.7	11718.5	8370.6	6466.0	4917.5	3502.9	2848.3	2453.9
35°	13385.7	13305.3	13112.0	12941.6	12692.8	8933.4	6774.2	4907.9	3296.2	2607.1	2258.7
37.5°	14398.3	14350.4	14254.7	14038.4	13734.1	9697.1	7143.6	4867.7	3043.5	2367.8	2109.4
40°	15477.9	15481.7	15378.3	15230.9	14947.6	10623.6	7583.9	4789.2	2767.9	2157.3	1973.5
42.5°	16620.6	16680.0	16630.2	16524.9	16253.1	11557.7	8110.3	4693.5	2499.9	1952.4	1839.5
45°	17929.9	18002.6	18079.2	17924.2	17660.0	12790.4	8803.2	4569.1	2210.8	1782.1	1747.6
47.5°	19440.2	19555.0	19623.9	19625.8	19361.7	14317.9	9928.7	4494.4	1954.4	1667.2	1703.6
50°	22627.2	22663.6	22826.3	23109.6	22906.7	17853.3	11894.6	4448.5	1780.2	1596.4	1671.1
52.5°	27219.3	27619.3	27900.7	27881.6	27605.9	20098.6	12978.0	4211.1	1676.8	1569.6	1655.7
55°	29089.4	29589.0	30109.7	30247.5	30033.1	22014.7	14002.0	3973.8	1627.0	1588.7	1661.5
57.5°	31581.6	32423.9	33137.9	33438.4	33128.3	24466.7	15349.6	3849.4	1611.7	1640.4	1697.9
60°	34493.1	35534.4	36472.3	37012.1	37012.1	27284.4	16746.9	3797.7	1590.7	1717.0	1759.1
62.5°	36363.2	37892.6	39309.1	40099.6	40076.7	29246.4	17367.1	3621.6	1542.8	1770.6	1843.3
65°	36370.9	38189.3	39994.4	40882.5	40928.5	29005.2	16343.1	3198.6	1454.8	1778.3	1927.6
67.5°	33338.8	35277.9	37381.5	38375.0	38604.7	26700.6	14147.5	2630.0	1311.2	1701.7	1958.2
70°	28157.2	30050.3	32198.0	33174.2	33581.9	22761.2	11395.0	2027.1	1127.4	1533.2	1895.0
72.5°	22183.1	24039.9	25534.8	26248.8	26566.6	17397.8	8297.9	1531.3	924.5	1292.1	1724.7
75°	15705.6	17099.2	17893.5	18052.4	18102.2	10487.7	5041.9	1138.9	761.8	1004.9	1456.7
77.5°	8864.5	9461.7	9396.6	9467.4	8877.9	4048.4	2195.5	815.4	627.8	763.7	1129.4
80°	3460.8	3568.0	3351.7	3284.7	3012.9	1506.4	968.6	568.5	501.5	578.1	790.5
82.5°	1525.6	1575.3	1529.4	1540.9	1473.9	777.1	580.0	411.5	382.8	423.0	524.5
85°	840.3	855.6	851.8	876.7	840.3	310.1	275.6	252.7	268.0	287.1	336.9
87.5°	409.6	413.5	400.1	421.1	407.7	157.0	135.9	143.6	157.0	160.8	160.8
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



REPORT NUMBER: P192198

CATALOG NUMBER: GLEON-AF-10-LED-E1-T2R-7050-600

CANDELA DISTRIBUTION (continued):

	135°	145°	155°	165°	175°	180°
0°	3286.6	3286.6	3286.6	3286.6	3286.6	3286.6
2.5°	3104.8	3089.4	3091.4	3087.5	3079.9	3079.9
5°	3078.0	3062.6	3062.6	3058.8	3049.2	3051.2
7.5°	3104.8	3079.9	3070.3	3056.9	3043.5	3043.5
10°	3135.4	3091.4	3064.6	3041.6	3024.4	3024.4
12.5°	3158.4	3089.4	3045.4	3014.8	2997.6	2997.6
15°	3166.0	3076.0	3014.8	2978.4	2963.1	2961.2
17.5°	3141.1	3024.4	2949.7	2907.6	2888.5	2882.7
20°	3064.6	2930.6	2840.6	2792.8	2766.0	2756.4
22.5°	2949.7	2796.6	2691.3	2641.5	2607.1	2601.3
25°	2788.9	2624.3	2520.9	2473.1	2453.9	2448.2
27.5°	2601.3	2448.2	2360.2	2329.5	2312.3	2310.4
30°	2423.3	2293.2	2228.1	2205.1	2184.1	2180.2
32.5°	2256.8	2174.5	2149.6	2117.1	2067.3	2061.5
35°	2138.1	2130.5	2113.2	2040.5	1979.2	1962.0
37.5°	2065.4	2136.2	2048.1	1904.6	1860.6	1856.7
40°	2023.3	2076.9	1925.6	1875.9	1879.7	1875.9
42.5°	1927.6	1983.1	1929.5	1906.5	1921.8	1925.6
45°	1831.8	1893.1	1958.2	1942.9	1979.2	1979.2
47.5°	1778.3	1870.1	1956.3	1956.3	2009.9	2029.0
50°	1717.0	1851.0	1925.6	1952.4	1994.5	1979.2
52.5°	1713.2	1818.4	1881.6	1929.5	1948.6	1931.4
55°	1718.9	1791.6	1837.6	1891.2	1914.2	1916.1
57.5°	1726.6	1776.3	1807.0	1831.8	1900.8	1900.8
60°	1745.7	1762.9	1780.2	1793.6	1883.5	1885.4
62.5°	1776.3	1749.5	1745.7	1759.1	1874.0	1866.3
65°	1824.2	1730.4	1701.7	1715.1	1864.4	1841.4
67.5°	1889.3	1701.7	1646.2	1655.7	1856.7	1807.0
70°	1948.6	1655.7	1577.3	1567.7	1784.0	1695.9
72.5°	1954.4	1602.1	1481.6	1452.8	1550.5	1466.2
75°	1858.6	1565.8	1376.3	1292.1	1280.6	1269.1
77.5°	1674.9	1544.7	1253.8	1121.7	1098.7	1106.4
80°	1401.2	1466.2	1106.4	949.4	1073.8	1060.4
82.5°	1047.0	1294.0	939.9	840.3	838.4	740.8
85°	581.9	1008.8	765.7	629.8	438.3	424.9
87.5°	162.7	560.8	536.0	356.0	243.1	252.7
90°	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)