Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269

Scaled data based on original data using

LM-79-2019 Approved Method: Electrical and Photometric Measurements of Solid-State Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

Brand: METALUX

Report Number: P1432496

Luminaire Tested: EHBR1-54-UNV-TASM-L830-UPL36

Issue Date: 3/20/2026

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1121 Highway 74 South
Peachtree City, GA 30269

Scaled Data Report

Test Information

Test Method:	LM-79-2019
Report Number:	P1432496
	REPORT IS A COMBINATION OF REPORTS P1431873 AND P1431635
Test Lab:	INNOVATION CENTER
Issue Date:	3/20/2026
Manufacturer:	COOPER LIGHTING SOLUTIONS
Product Line:	METALUX
Catalog Number:	EHBR1-54-UNV-TASM-L830-UPL36
Description:	Elevate Round Highbay at, 54000 lumens, 3000K 80CRI LEDs with TASM lens
Light Source:	-
Ballast/Driver:	-

Summary

Lumens per Lamp:	N/A
Luminaire Lumens:	53788.6 lumens
Efficiency:	N/A
Efficacy:	165.8 lumens/watt
Spacing Criteria (0/90/45):	0.99 / 0.84 / 0.9
Luminous Opening:	Vertical Cylinder (Dia: 1.71' x H: 0.1')
CIE Type:	Direct

Input Watts (W):	324.4
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:	24 FT

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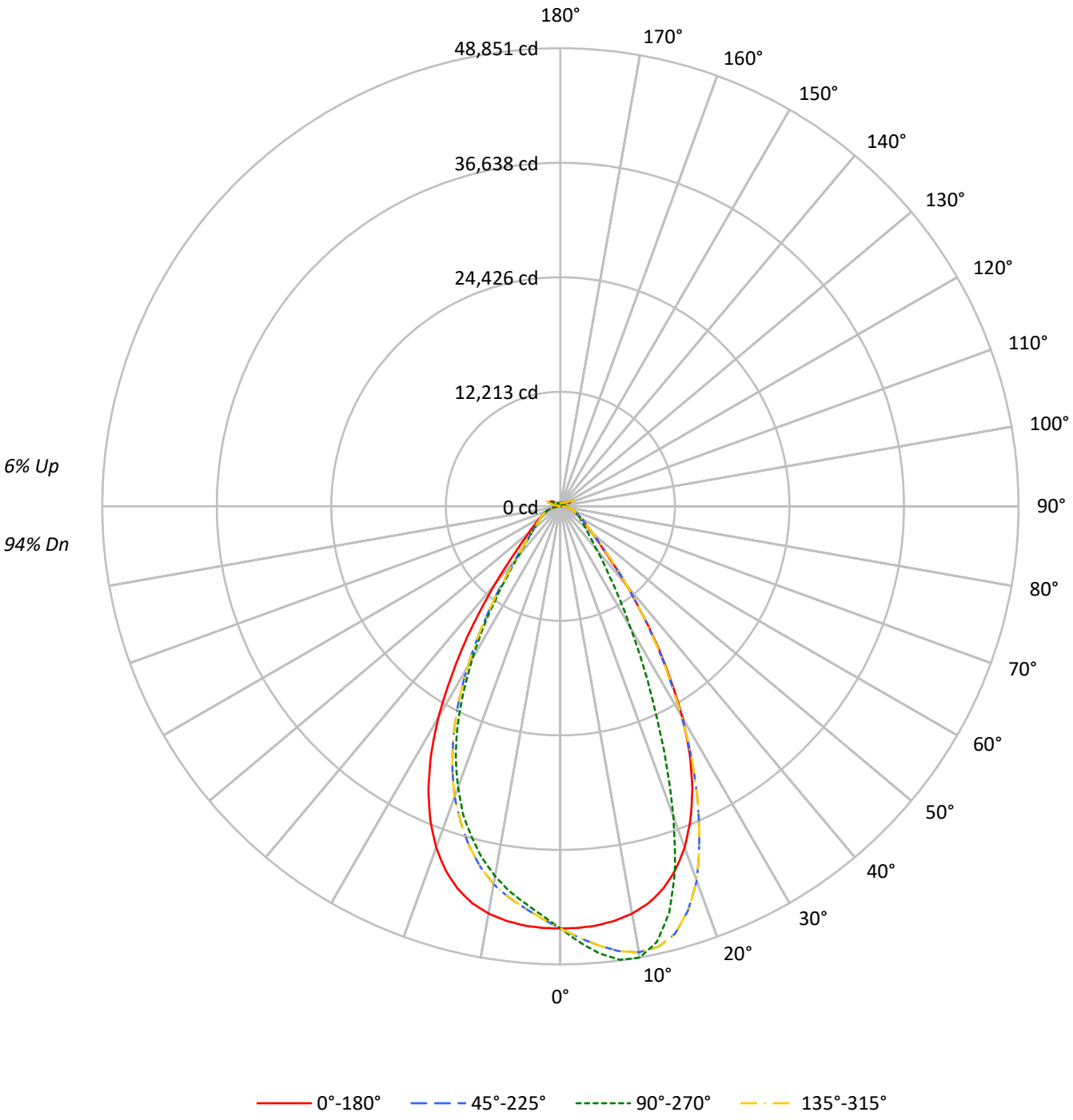
Luminous Intensity Polar Plot



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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	0
RCR																		
0	118	118	118	118	114	114	114	114	108	108	108	102	102	102	96	96	96	94
1	110	107	104	101	107	104	101	99	99	96	94	94	92	90	89	88	87	84
2	103	97	92	88	100	95	90	87	91	87	84	87	84	81	83	80	78	76
3	97	89	83	78	94	87	82	77	84	79	75	80	76	73	77	74	71	69
4	91	82	75	70	89	80	74	70	77	72	68	74	70	67	72	68	65	63
5	86	76	69	64	83	74	68	63	72	66	62	69	65	61	67	63	60	58
6	81	70	63	58	79	69	63	58	67	61	57	65	60	56	63	59	55	54
7	76	66	59	54	74	64	58	53	63	57	53	61	56	52	59	55	51	50
8	72	61	54	50	70	60	54	50	59	53	49	57	52	48	56	51	48	46
9	68	57	51	46	67	57	50	46	55	50	46	54	49	45	52	48	45	43
10	65	54	48	43	63	53	47	43	52	46	43	51	46	42	50	45	42	40

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°	270°
0°	211420	211420	211420	211420
5°	210133	224173	210133	199229
10°	207550	229928	207550	188553
15°	201423	213675	201423	174172
20°	188380	171338	188380	155139
25°	166732	118713	166732	130013
30°	135380	77232	135380	97276
35°	97099	50016	97099	64758
40°	62777	34474	62777	40840
45°	39832	26705	39832	29099
50°	29580	22692	29580	24238
55°	24151	20671	24151	21396
60°	20912	19691	20912	19810
65°	19064	18991	19064	18909
70°	18068	18607	18068	18367
75°	16899	18000	16899	17461
80°	14842	16994	14842	15886
85°	9604	12133	9604	11568

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 22.5°
Vertical Angle: 45°
Luminance: 56001 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	4280.7	8.0
10°-20°	11646.1	21.7
20°-30°	13658.4	25.4
30°-40°	9498.6	17.7
40°-50°	4720.3	8.8
50°-60°	2823.3	5.2
60°-70°	1987.1	3.7
70°-80°	1280.1	2.4
80°-90°	412.7	0.8
90°-100°	93.2	0.2
100°-110°	604.0	1.1
110°-120°	1115.1	2.1
120°-130°	663.4	1.2
130°-140°	402.1	0.7
140°-150°	279.0	0.5
150°-160°	183.0	0.3
160°-170°	106.0	0.2
170°-180°	35.4	0.1
0°-30°	29585.3	55.0
0°-40°	39083.8	72.7
0°-60°	46627.5	86.7
0°-90°	50307.3	93.5
90°-120°	1812.3	3.4
90°-150°	3156.8	5.9
90°-180°	3481.0	6.5
0°-180°	53788.6	100.0

CANDELA DISTRIBUTION:

	0°	90°	180°	270°	360°	Flux
0°	45020	45020	45020	45020	45020	
5°	44867	47864	44867	42538	44867	4258
15°	42257	44828	42257	36540	42257	11809
25°	33296	23707	33296	25963	33296	15074
35°	17821	9180	17821	11886	17821	11125
45°	6445	4321	6445	4708	6445	5274
55°	3264	2794	3264	2891	3264	2984
65°	1990	1982	1990	1974	1990	1998
75°	1190	1268	1190	1230	1190	1250
85°	330	417	330	398	330	367
90°	26	32	26	26	26	28
95°	50	49	50	43	50	53
105°	278	144	278	210	278	374
115°	1187	1015	1187	964	1187	1081
125°	760	798	760	696	760	700
135°	482	557	482	509	482	382
145°	437	457	437	425	437	274
155°	391	408	391	380	391	183
165°	372	384	372	365	372	106
175°	372	381	372	366	372	35
180°	372	372	372	372	372	

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CATALOG NUMBER: EHBR1-54-UNV-TASM-L830-UPL36

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°	202.5°	225°
0°	45020.4	45020.4	45020.4	45020.4	*45020.4*	45020.4	45020.4	45020.4	45020.4	45020.4	45020.4
2.5°	44994.3	45575.9	46046.9	46357.6	*46511.3*	46357.6	46046.9	45575.9	44994.3	44415.9	44018.3
5°	44866.8	46031.8	47018.7	47664.4	*47864.5*	47664.4	47018.7	46031.8	44866.8	43765.9	43035.7
7.5°	44562.0	46377.0	47843.4	48597.3	*48781.4*	48597.3	47843.4	46377.0	44562.0	43003.7	42080.9
10°	*44096.9*	*46594.8*	*48289.1*	*48829.4*	*48851.4*	*48829.4*	*48289.1*	*46594.8*	*44096.9*	*41997.3*	*40909.2*
12.5°	43354.8	46517.2	48139.7	47962.5	*47559.8*	47962.5	48139.7	46517.2	43354.8	40768.2	39395.5
15°	42257.4	46057.0	47193.4	45750.6	*44827.9*	45750.6	47193.4	46057.0	42257.4	39108.4	37516.3
17.5°	40710.8	45196.0	45217.9	42363.7	*40623.0*	42363.7	45217.9	45196.0	40710.8	37079.0	35325.6
20°	38717.6	43814.8	42497.9	37277.4	*35215.0*	37277.4	42497.9	43814.8	38717.6	34679.8	32959.3
22.5°	36218.8	41952.6	38710.0	32160.7	*29347.0*	32160.7	38710.0	41952.6	36218.8	31889.7	30099.2
25°	33296.2	39670.8	34635.0	26585.6	*23706.9*	26585.6	34635.0	39670.8	33296.2	28565.2	26946.0
27.5°	29858.5	36778.5	30295.9	21724.7	*19068.8*	21724.7	30295.9	36778.5	29858.5	25132.7	23478.9
30°	26040.2	33070.7	25780.2	17301.0	*14855.5*	17301.0	25780.2	33070.7	26040.2	21276.4	19795.7
32.5°	21765.2	29436.5	21443.5	13862.6	*11790.9*	13862.6	21443.5	29436.5	21765.2	17596.5	16049.1
35°	17821.1	24889.6	17533.2	10892.7	*9179.8*	10892.7	17533.2	24889.6	17821.1	14122.7	12603.0
37.5°	13985.9	20593.5	13976.6	8771.2	*7445.9*	8771.2	13976.6	20593.5	13985.9	10979.7	9746.3
40°	10880.9	16102.3	10951.0	7001.8	*5975.3*	7001.8	10951.0	16102.3	10880.9	8354.2	7564.9
42.5°	8244.4	12312.7	8607.5	5746.5	*5075.4*	5746.5	8607.5	12312.7	8244.4	6582.3	5991.3
45°	6444.7	9060.8	6721.5	4848.2	*4320.7*	4848.2	6721.5	9060.8	6444.7	5300.7	4904.0
47.5°	5248.4	7002.6	5447.6	4158.5	*3788.8*	4158.5	5447.6	7002.6	5248.4	4483.6	4186.4
50°	4408.4	5373.3	4523.3	3630.0	*3381.9*	3630.0	4523.3	5373.3	4408.4	3839.4	3641.1
52.5°	3787.1	4382.2	3852.1	3235.0	*3067.8*	3235.0	3852.1	4382.2	3787.1	3359.0	3235.9
55°	3263.7	3684.1	3349.8	2909.1	*2793.5*	2909.1	3349.8	3684.1	3263.7	2989.3	2898.2
57.5°	2866.0	3125.2	2909.1	2631.4	*2554.6*	2631.4	2909.1	3125.2	2866.0	2660.1	2611.1
60°	2514.0	2706.5	2567.2	2389.1	*2367.2*	2389.1	2567.2	2706.5	2514.0	2393.3	2361.3
62.5°	2243.0	2364.6	2270.0	2171.3	*2151.9*	2171.3	2270.0	2364.6	2243.0	2150.2	2156.1
65°	1989.8	2102.9	2028.6	1975.4	*1982.2*	1975.4	2028.6	2102.9	1989.8	1946.8	1956.0
67.5°	1793.9	1853.0	1821.0	1790.5	*1798.1*	1790.5	1821.0	1853.0	1793.9	1751.7	1766.1
70°	1585.4	1648.7	1615.8	1620.0	*1632.7*	1620.0	1615.8	1648.7	1585.4	1572.7	1583.7
72.5°	1386.1	1435.1	1424.2	1434.3	*1447.8*	1434.3	1424.2	1435.1	1386.1	1384.5	1385.3
75°	1190.4	1227.5	1232.5	1246.9	*1268.0*	1246.9	1232.5	1227.5	1190.4	1177.6	1192.9
77.5°	976.7	1019.0	1035.0	1054.5	*1085.6*	1054.5	1035.0	1019.0	976.7	985.1	992.8
80°	780.8	800.3	835.7	850.2	*894.0*	850.2	835.7	800.3	780.8	766.5	777.5
82.5°	571.5	589.3	619.6	646.7	*672.0*	646.7	619.6	589.3	571.5	564.7	565.6
85°	330.1	357.1	377.4	409.4	*417.0*	409.4	377.4	357.1	330.1	337.7	330.1
87.5°	115.7	124.1	141.8	154.5	*155.3*	154.5	141.8	124.1	115.7	118.2	107.3
90°	25.8	43.8	75.3	43.4	*31.7*	43.4	75.3	43.8	25.8	44.9	69.8
92.5°	33.4	59.2	106.0	56.8	*41.2*	56.8	106.0	59.2	33.4	58.4	111.9
95°	49.6	72.6	134.7	62.6	*48.9*	62.6	134.7	72.6	49.6	77.5	156.1
97.5°	76.4	89.8	151.9	66.4	*58.5*	66.4	151.9	89.8	76.4	94.7	179.0
100°	101.4	101.4	276.5	76.0	*66.1*	76.0	276.5	101.4	101.4	116.6	278.7
102.5°	153.1	197.9	639.5	149.6	*79.5*	149.6	639.5	197.9	153.1	218.2	591.0
105°	277.5	450.8	1124.2	381.4	*143.6*	381.4	1124.2	450.8	277.5	455.8	1052.7
107.5°	524.7	839.8	1448.0	749.3	*329.4*	749.3	1448.0	839.8	524.7	806.4	1388.9
110°	838.9	1173.1	1580.2	1025.2	*662.8*	1025.2	1580.2	1173.1	838.9	1107.2	1455.9

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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°	202.5°	225°
112.5°	1091.8	1307.3	1543.8	1136.3	*915.7*	1136.3	1543.8	1307.3	1091.8	1222.1	1394.6
115°	1186.6	1288.2	1379.0	1132.5	*1015.4*	1132.5	1379.0	1288.2	1186.6	1193.4	1245.2
117.5°	1146.3	1178.9	1191.2	1063.5	*1021.1*	1063.5	1191.2	1178.9	1146.3	1073.6	1057.4
120°	1035.3	1021.9	1004.3	962.0	*963.7*	962.0	1004.3	1021.9	1035.3	937.6	883.0
122.5°	896.2	867.5	849.1	859.3	*885.1*	859.3	849.1	867.5	896.2	798.5	757.4
125°	760.1	731.5	740.7	771.2	*797.8*	771.2	740.7	731.5	760.1	678.6	668.2
127.5°	646.0	632.7	662.3	696.4	*719.2*	696.4	662.3	632.7	646.0	594.3	605.0
130°	564.6	567.5	606.7	636.0	*650.3*	636.0	606.7	567.5	564.6	539.6	565.6
132.5°	513.6	528.1	565.4	590.9	*599.4*	590.9	565.4	528.1	513.6	506.8	538.5
135°	481.9	503.2	537.5	553.6	*557.2*	553.6	537.5	503.2	481.9	484.7	513.6
137.5°	463.6	484.8	510.6	523.8	*520.8*	523.8	510.6	484.8	463.6	470.1	492.3
140°	452.9	474.3	485.7	500.9	*498.7*	500.9	485.7	474.3	452.9	456.7	474.0
142.5°	442.3	461.7	467.4	478.7	*475.7*	478.7	467.4	461.7	442.3	446.2	457.6
145°	437.3	451.9	447.2	461.4	*457.4*	461.4	447.2	451.9	437.3	438.5	445.0
147.5°	427.8	438.5	432.7	445.0	*441.0*	445.0	432.7	438.5	427.8	427.8	430.5
150°	417.1	424.8	416.3	430.5	*430.3*	430.5	416.3	424.8	417.1	415.2	418.0
152.5°	402.7	410.3	402.7	418.8	*417.8*	418.8	402.7	410.3	402.7	400.7	403.5
155°	390.9	394.7	390.9	407.1	*407.9*	407.1	390.9	394.7	390.9	390.0	391.7
157.5°	383.0	385.8	383.9	398.1	*398.9*	398.1	383.9	385.8	383.0	383.0	383.9
160°	376.8	380.7	379.6	391.9	*392.8*	391.9	379.6	380.7	376.8	377.9	378.7
162.5°	374.7	374.7	374.5	386.8	*388.5*	386.8	374.5	374.7	374.7	374.7	376.6
165°	371.5	373.4	371.2	380.6	*384.1*	380.6	371.2	373.4	371.5	372.5	372.5
167.5°	371.2	369.3	371.0	379.3	*382.9*	379.3	371.0	369.3	371.2	372.3	372.3
170°	368.2	369.1	368.9	377.1	*380.8*	377.1	368.9	369.1	368.2	370.2	371.2
172.5°	370.7	370.7	369.4	375.8	*381.4*	375.8	369.4	370.7	370.7	371.9	373.7
175°	372.4	371.4	371.1	375.7	*381.2*	375.7	371.1	371.4	372.4	371.6	371.6
177.5°	370.6	372.2	373.9	378.4	*385.9*	378.4	373.9	372.2	370.6	371.6	371.6
180°	372.2	372.2	372.2	372.2	*372.2*	372.2	372.2	372.2	372.2	372.2	372.2

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CANDELA DISTRIBUTION (continued):

	247.5°	270°	292.5°	315°	337.5°	360°
0°	45020.4	45020.4	45020.4	45020.4	45020.4	45020.4
2.5°	43712.7	43684.1	43712.7	44018.3	44415.9	44994.3
5°	42697.2	42538.5	42697.2	43035.7	43765.9	44866.8
7.5°	41514.5	41422.4	41514.5	42080.9	43003.7	44562.0
10°	*40269.2*	*40060.7*	*40269.2*	*40909.2*	*41997.3*	*44096.9*
12.5°	38734.5	38458.5	38734.5	39395.5	40768.2	43354.8
15°	36782.7	36540.4	36782.7	37516.3	39108.4	42257.4
17.5°	34688.2	34468.7	34688.2	35325.6	37079.0	40710.8
20°	32057.7	31885.5	32057.7	32959.3	34679.8	38717.6
22.5°	29298.0	29136.8	29298.0	30099.2	31889.7	36218.8
25°	26051.2	25963.4	26051.2	26946.0	28565.2	33296.2
27.5°	22542.7	22393.2	22542.7	23478.9	25132.7	29858.5
30°	18958.2	18710.9	18958.2	19795.7	21276.4	26040.2
32.5°	15452.2	15274.2	15452.2	16049.1	17596.5	21765.2
35°	12063.6	11885.5	12063.6	12603.0	14122.7	17821.1
37.5°	9400.2	9085.3	9400.2	9746.3	10979.7	13985.9
40°	7129.3	7078.6	7129.3	7564.9	8354.2	10880.9
42.5°	5803.8	5666.2	5803.8	5991.3	6582.3	8244.4
45°	4762.1	4708.1	4762.1	4904.0	5300.7	6444.7
47.5°	4095.2	4118.9	4095.2	4186.4	4483.6	5248.4
50°	3598.0	3612.3	3598.0	3641.1	3839.4	4408.4
52.5°	3231.6	3218.9	3231.6	3235.9	3359.0	3787.1
55°	2907.5	2891.4	2907.5	2898.2	2989.3	3263.7
57.5°	2623.8	2635.6	2623.8	2611.1	2660.1	2866.0
60°	2370.5	2381.5	2370.5	2361.3	2393.3	2514.0
62.5°	2157.0	2163.7	2157.0	2156.1	2150.2	2243.0
65°	1966.2	1973.7	1966.2	1956.0	1946.8	1989.8
67.5°	1783.8	1783.8	1783.8	1766.1	1751.7	1793.9
70°	1612.5	1611.6	1612.5	1583.7	1572.7	1585.4
72.5°	1406.5	1426.7	1406.5	1385.3	1384.5	1386.1
75°	1206.4	1230.0	1206.4	1192.9	1177.6	1190.4
77.5°	1003.8	1040.0	1003.8	992.8	985.1	976.7
80°	796.1	835.7	796.1	777.5	766.5	780.8
82.5°	588.4	617.9	588.4	565.6	564.7	571.5
85°	350.3	397.6	350.3	330.1	337.7	330.1
87.5°	112.3	143.5	112.3	107.3	118.2	115.7
90°	41.1	25.8	41.1	69.8	44.9	25.8
92.5°	62.2	37.3	62.2	111.9	58.4	33.4
95°	71.8	43.0	71.8	156.1	77.5	49.6
97.5°	79.4	55.4	79.4	179.0	94.7	76.4
100°	92.8	72.6	92.8	278.7	116.6	101.4
102.5°	196.2	122.4	196.2	591.0	218.2	153.1
105°	412.8	210.5	412.8	1052.7	455.8	277.5
107.5°	738.5	363.8	738.5	1388.9	806.4	524.7
110°	979.9	678.0	979.9	1455.9	1107.2	838.9

Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269

Scaled Data Report

TEST NUMBER: P1432496
CATALOG NUMBER: EHBR1-54-UNV-TASM-L830-UPL36

CANDELA DISTRIBUTION (continued):

	247.5°	270°	292.5°	315°	337.5°	360°
112.5°	1052.7	915.6	1052.7	1394.6	1222.1	1091.8
115°	1012.5	963.5	1012.5	1245.2	1193.4	1186.6
117.5°	924.3	930.9	924.3	1057.4	1073.6	1146.3
120°	822.8	862.0	822.8	883.0	937.6	1035.3
122.5°	729.8	775.7	729.8	757.4	798.5	896.2
125°	649.2	696.1	649.2	668.2	678.6	760.1
127.5°	593.7	625.3	593.7	605.0	594.3	646.0
130°	550.5	577.3	550.5	565.6	539.6	564.6
132.5°	520.7	538.0	520.7	538.5	506.8	513.6
135°	494.7	509.2	494.7	513.6	484.7	481.9
137.5°	472.6	485.1	472.6	492.3	470.1	463.6
140°	453.2	463.9	453.2	474.0	456.7	452.9
142.5°	432.9	440.6	432.9	457.6	446.2	442.3
145°	419.3	425.1	419.3	445.0	438.5	437.3
147.5°	407.6	411.4	407.6	430.5	427.8	427.8
150°	395.9	399.7	395.9	418.0	415.2	417.1
152.5°	383.3	388.0	383.3	403.5	400.7	402.7
155°	375.3	380.0	375.3	391.7	390.0	390.9
157.5°	371.3	374.9	371.3	383.9	383.0	383.0
160°	368.1	370.8	368.1	378.7	377.9	376.8
162.5°	364.0	366.8	364.0	376.6	374.7	374.7
165°	363.8	364.7	363.8	372.5	372.5	371.5
167.5°	362.7	364.7	362.7	372.3	372.3	371.2
170°	363.5	364.4	363.5	371.2	370.2	368.2
172.5°	365.2	366.1	365.2	373.7	371.9	370.7
175°	365.0	365.9	365.0	371.6	371.6	372.4
177.5°	367.8	368.6	367.8	371.6	371.6	370.6
180°	372.2	372.2	372.2	372.2	372.2	372.2

Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269

Scaled Data Report

TEST NUMBER: P1432496
CATALOG NUMBER: EHBR1-54-UNV-TASM-L830-UPL36

CIE UGR TABLE:

Reflectances:											
	Ceiling	0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3
	Wall	0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3
	Reference plane	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2
Room dimensions		Viewed crosswise					Viewed endwise				
X=2H	Y=2H	19.26	20.36	19.74	20.81	21.29	18.58	19.68	19.06	20.13	20.61
	3H	20.80	21.79	21.30	22.25	22.78	20.42	21.41	20.92	21.87	22.40
	4H	21.44	22.36	21.96	22.84	23.38	21.20	22.12	21.72	22.61	23.15
	6H	21.92	22.77	22.45	23.27	23.82	21.85	22.69	22.38	23.19	23.74
	8H	22.07	22.87	22.62	23.39	23.95	22.07	22.87	22.61	23.39	23.95
	12H	22.14	22.91	22.69	23.42	24.00	22.20	22.96	22.74	23.47	24.05
4H	2H	19.67	20.59	20.19	21.07	21.62	19.15	20.07	19.67	20.55	21.09
	3H	21.47	22.23	22.00	22.76	23.32	21.21	21.97	21.73	22.50	23.06
	4H	22.24	22.93	22.79	23.47	24.06	22.11	22.80	22.66	23.34	23.93
	6H	22.86	23.45	23.43	24.01	24.63	22.89	23.48	23.46	24.04	24.66
	8H	23.05	23.60	23.63	24.17	24.79	23.16	23.71	23.73	24.27	24.89
	12H	23.16	23.64	23.75	24.24	24.86	23.32	23.81	23.92	24.40	25.03
8H	4H	22.49	23.04	23.07	23.61	24.23	22.39	22.94	22.97	23.51	24.13
	6H	23.23	23.68	23.84	24.29	24.92	23.30	23.74	23.91	24.36	24.98
	8H	23.50	23.90	24.13	24.53	25.17	23.65	24.05	24.28	24.67	25.31
	12H	23.68	24.02	24.30	24.63	25.35	23.90	24.25	24.52	24.85	25.57
12H	4H	22.50	22.99	23.10	23.58	24.21	22.40	22.89	23.00	23.49	24.11
	6H	23.28	23.68	23.90	24.30	24.94	23.34	23.74	23.97	24.37	25.01
	8H	23.59	23.94	24.22	24.55	25.26	23.75	24.10	24.37	24.70	25.42

Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269

LM-79-2019: Approved Method: Electrical and Photometric Measurements of Solid-State Lighting Products

Report Prepared for

Cooper Lighting Solutions

Metalux

Report Number: SP1-2506-472-2

Test Date: 07/31/2025

Luminaire Tested: EHBR-60-L830-N

Data in this report applies to families of products including EHBR-60-L830-N

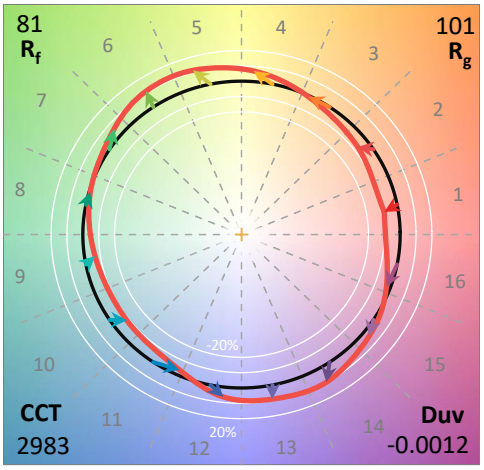
Report Generated By FNC07603 / LDUCLS01DT446
Version: v7.04

Test Information

Test Method:	LM-79-2019
Report Number:	SP1-2506-472-2
Test Lab:	COOPER LIGHTING SOLUTIONS
Photometer:	SP1 - 76IN SPHERE
Measurement Geometry:	4π
Issue Date:	08/05/2025
Manufacturer:	COOPER LIGHTING SOLUTIONS
Product Line:	Metalux
Catalog Number:	**EHBR-60-L830-N**
Description:	Elevate Round Highbay at, 60000 lumens, 3000K 80CRI LEDs with N lens

Spectral Parameters

CCT (K):	2983	CRI (Ra):	83.4		
CIE u':	0.2516	R1:	84.0	R9:	29.4
CIE v':	0.5201	R2:	87.5	R10:	68.6
Duv:	-0.0012	R3:	88.9	R11:	82.2
CIE x:	0.4364	R4:	83.8	R12:	61.6
CIE y:	0.4010	R5:	81.9	R13:	83.9
CIE z:	0.1626	R6:	83.1	R14:	92.5
Peak Wavelength (nm):	630	R7:	87.1	R15:	79.8
Dominant Wavelength (nm):	583	R8:	70.9		
Purity:	51.34918				
Rf:	81.2				
Rg:	101.5				



Test Conditions

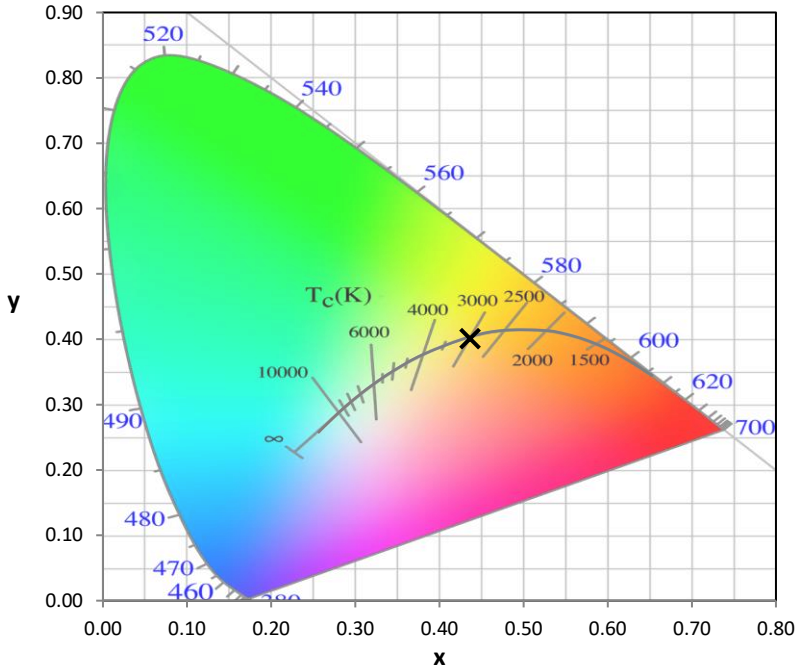
Stabilization Time:	38M
Operation Time:	1H 38M
Sphere Temperature (°C):	25.0

REPORT NUMBER: SP1-2506-472-2

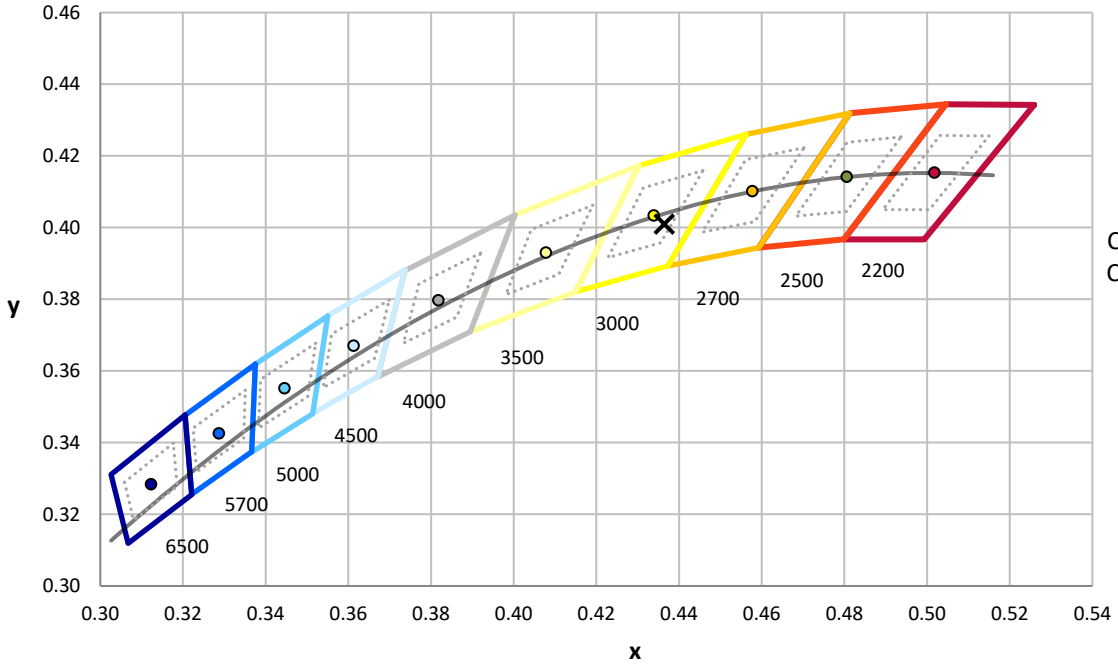
Measurement and Test Equipment			
Instrument	Identification Number	Calibration Date	Calibration Due Date
Photometer	76INCH SPHERE IN0058	6/16/2025	12/16/2025
Power Meter	XITRON INXT2011004	1/21/2025	1/21/2026
AC Power Source	CHROMA 61603 IN0063	10/22/2024	10/22/2025
DC Power Source	AGILENT E3634A IN0208	10/22/2024	10/22/2025
Sphere Thermometer	ONSET IN0085	10/22/2024	10/22/2025
Room Thermometer	ONSET IN0046	10/22/2024	10/22/2025

REPORT NUMBER: SP1-2506-472-2

CIE 1931 Chromaticity Diagram



CIE 1931 Chromaticity Diagram with 2017 ANSI 7-Step and 4-Step Quadrangles

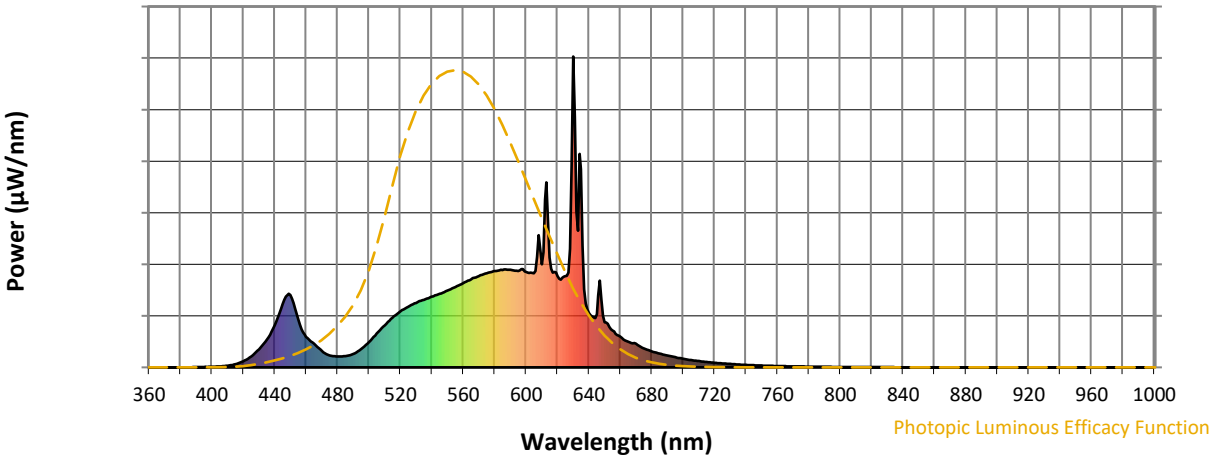


CCT = 2983K
CIE x = 0.4364
CIE y = 0.4010
Duv = -0.0012

Point lies inside the ANSI 3000K 4-step quadrangle

REPORT NUMBER: SP1-2506-472-2

Photopic Flux vs. Wavelength

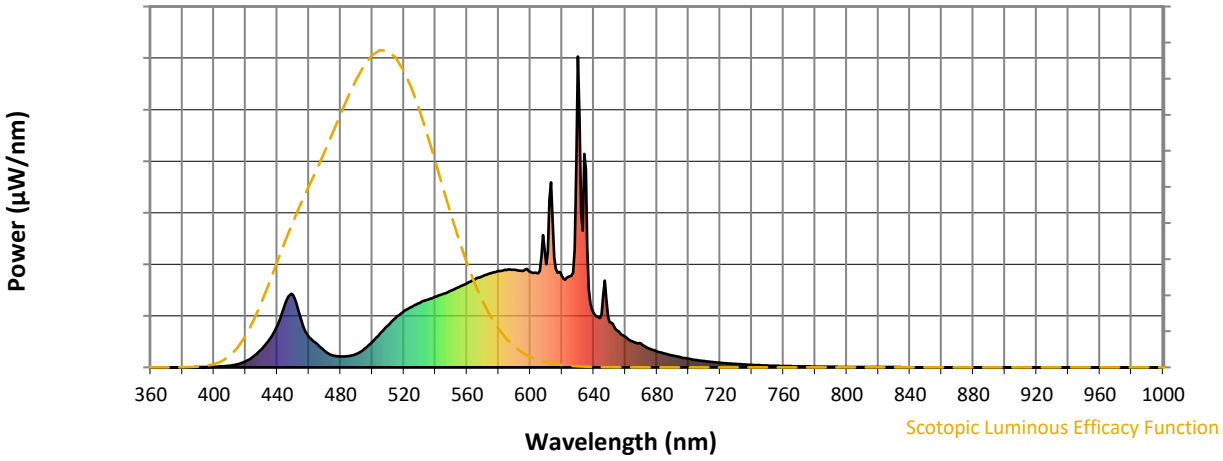


Photopic Lumens: NR

λ (nm)	Power W^/nm	Lumens (ϕ/nm)	λ (nm)	Power W^/nm	Lumens (ϕ/nm)	λ (nm)	Power W^/nm	Lumens (ϕ/nm)	λ (nm)	Power W^/nm	Lumens (ϕ/nm)	λ (nm)	Power W^/nm	Lumens (ϕ/nm)
360	0	NR	490	43	NR	620	294	NR	750	6	NR	880	0	NR
365	0	NR	495	59	NR	625	294	NR	755	5	NR	885	0	NR
370	0	NR	500	81	NR	630	1000	NR	760	4	NR	890	0	NR
375	0	NR	505	109	NR	635	637	NR	765	4	NR	895	0	NR
380	0	NR	510	135	NR	640	175	NR	770	3	NR	900	0	NR
385	0	NR	515	160	NR	645	171	NR	775	3	NR	905	0	NR
390	1	NR	520	180	NR	650	146	NR	780	2	NR	910	0	NR
395	1	NR	525	195	NR	655	119	NR	785	2	NR	915	0	NR
400	2	NR	530	207	NR	660	99	NR	790	2	NR	920	0	NR
405	3	NR	535	218	NR	665	82	NR	795	2	NR	925	0	NR
410	5	NR	540	227	NR	670	76	NR	800	1	NR	930	0	NR
415	10	NR	545	237	NR	675	61	NR	805	1	NR	935	0	NR
420	20	NR	550	247	NR	680	52	NR	810	1	NR	940	0	NR
425	35	NR	555	259	NR	685	44	NR	815	1	NR	945	0	NR
430	58	NR	560	271	NR	690	38	NR	820	1	NR	950	0	NR
435	90	NR	565	283	NR	695	33	NR	825	1	NR	955	0	NR
440	135	NR	570	293	NR	700	27	NR	830	1	NR	960	0	NR
445	204	NR	575	303	NR	705	24	NR	835	1	NR	965	0	NR
450	233	NR	580	310	NR	710	20	NR	840	0	NR	970	0	NR
455	153	NR	585	313	NR	715	17	NR	845	0	NR	975	0	NR
460	98	NR	590	314	NR	720	15	NR	850	0	NR	980	0	NR
465	76	NR	595	310	NR	725	13	NR	855	0	NR	985	0	NR
470	53	NR	600	307	NR	730	11	NR	860	0	NR	990	0	NR
475	39	NR	605	303	NR	735	9	NR	865	0	NR	995	0	NR
480	35	NR	610	331	NR	740	8	NR	870	0	NR	1000	0	NR
485	36	NR	615	353	NR	745	7	NR	875	0	NR			

REPORT NUMBER: SP1-2506-472-2

Scotopic Flux vs. Wavelength

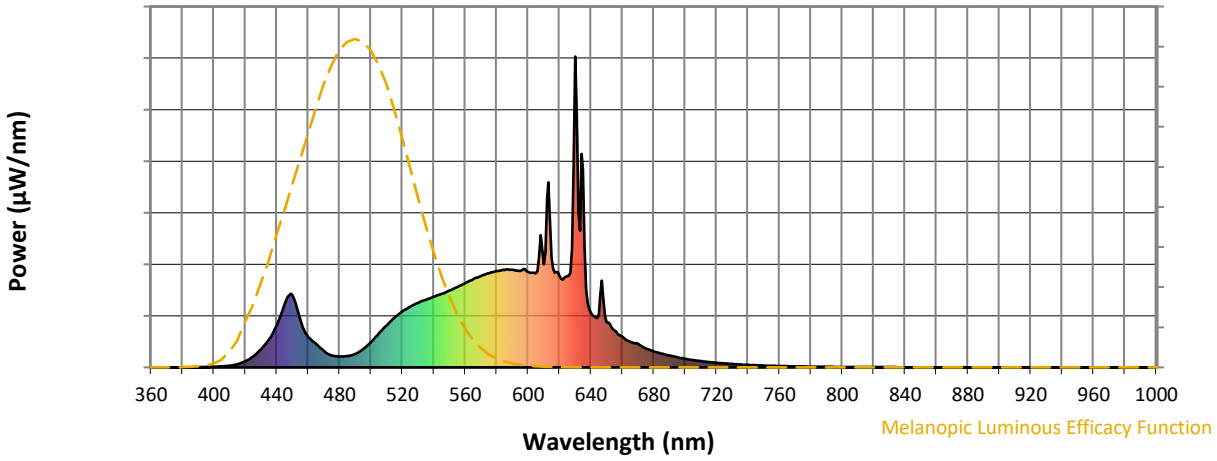


Scotopic Lumens: NR **S/P: 1.27**

λ (nm)	Power W^/nm	Lumens (ϕ/nm)	λ (nm)	Power W^/nm	Lumens (ϕ/nm)	λ (nm)	Power W^/nm	Lumens (ϕ/nm)	λ (nm)	Power W^/nm	Lumens (ϕ/nm)	λ (nm)	Power W^/nm	Lumens (ϕ/nm)
360	0	NR	490	43	NR	620	294	NR	750	6	NR	880	0	NR
365	0	NR	495	59	NR	625	294	NR	755	5	NR	885	0	NR
370	0	NR	500	81	NR	630	1000	NR	760	4	NR	890	0	NR
375	0	NR	505	109	NR	635	637	NR	765	4	NR	895	0	NR
380	0	NR	510	135	NR	640	175	NR	770	3	NR	900	0	NR
385	0	NR	515	160	NR	645	171	NR	775	3	NR	905	0	NR
390	1	NR	520	180	NR	650	146	NR	780	2	NR	910	0	NR
395	1	NR	525	195	NR	655	119	NR	785	2	NR	915	0	NR
400	2	NR	530	207	NR	660	99	NR	790	2	NR	920	0	NR
405	3	NR	535	218	NR	665	82	NR	795	2	NR	925	0	NR
410	5	NR	540	227	NR	670	76	NR	800	1	NR	930	0	NR
415	10	NR	545	237	NR	675	61	NR	805	1	NR	935	0	NR
420	20	NR	550	247	NR	680	52	NR	810	1	NR	940	0	NR
425	35	NR	555	259	NR	685	44	NR	815	1	NR	945	0	NR
430	58	NR	560	271	NR	690	38	NR	820	1	NR	950	0	NR
435	90	NR	565	283	NR	695	33	NR	825	1	NR	955	0	NR
440	135	NR	570	293	NR	700	27	NR	830	1	NR	960	0	NR
445	204	NR	575	303	NR	705	24	NR	835	1	NR	965	0	NR
450	233	NR	580	310	NR	710	20	NR	840	0	NR	970	0	NR
455	153	NR	585	313	NR	715	17	NR	845	0	NR	975	0	NR
460	98	NR	590	314	NR	720	15	NR	850	0	NR	980	0	NR
465	76	NR	595	310	NR	725	13	NR	855	0	NR	985	0	NR
470	53	NR	600	307	NR	730	11	NR	860	0	NR	990	0	NR
475	39	NR	605	303	NR	735	9	NR	865	0	NR	995	0	NR
480	35	NR	610	331	NR	740	8	NR	870	0	NR	1000	0	NR
485	36	NR	615	353	NR	745	7	NR	875	0	NR			

REPORT NUMBER: SP1-2506-472-2

Melanopic Flux vs. Wavelength



Melanopic Lumens: NR **M/P: 2.34**

λ (nm)	Power W^/nm	Lumens (ϕ/nm)	λ (nm)	Power W^/nm	Lumens (ϕ/nm)	λ (nm)	Power W^/nm	Lumens (ϕ/nm)	λ (nm)	Power W^/nm	Lumens (ϕ/nm)	λ (nm)	Power W^/nm	Lumens (ϕ/nm)
360	0	NR	490	43	NR	620	294	NR	750	6	NR	880	0	NR
365	0	NR	495	59	NR	625	294	NR	755	5	NR	885	0	NR
370	0	NR	500	81	NR	630	1000	NR	760	4	NR	890	0	NR
375	0	NR	505	109	NR	635	637	NR	765	4	NR	895	0	NR
380	0	NR	510	135	NR	640	175	NR	770	3	NR	900	0	NR
385	0	NR	515	160	NR	645	171	NR	775	3	NR	905	0	NR
390	1	NR	520	180	NR	650	146	NR	780	2	NR	910	0	NR
395	1	NR	525	195	NR	655	119	NR	785	2	NR	915	0	NR
400	2	NR	530	207	NR	660	99	NR	790	2	NR	920	0	NR
405	3	NR	535	218	NR	665	82	NR	795	2	NR	925	0	NR
410	5	NR	540	227	NR	670	76	NR	800	1	NR	930	0	NR
415	10	NR	545	237	NR	675	61	NR	805	1	NR	935	0	NR
420	20	NR	550	247	NR	680	52	NR	810	1	NR	940	0	NR
425	35	NR	555	259	NR	685	44	NR	815	1	NR	945	0	NR
430	58	NR	560	271	NR	690	38	NR	820	1	NR	950	0	NR
435	90	NR	565	283	NR	695	33	NR	825	1	NR	955	0	NR
440	135	NR	570	293	NR	700	27	NR	830	1	NR	960	0	NR
445	204	NR	575	303	NR	705	24	NR	835	1	NR	965	0	NR
450	233	NR	580	310	NR	710	20	NR	840	0	NR	970	0	NR
455	153	NR	585	313	NR	715	17	NR	845	0	NR	975	0	NR
460	98	NR	590	314	NR	720	15	NR	850	0	NR	980	0	NR
465	76	NR	595	310	NR	725	13	NR	855	0	NR	985	0	NR
470	53	NR	600	307	NR	730	11	NR	860	0	NR	990	0	NR
475	39	NR	605	303	NR	735	9	NR	865	0	NR	995	0	NR
480	35	NR	610	331	NR	740	8	NR	870	0	NR	1000	0	NR
485	36	NR	615	353	NR	745	7	NR	875	0	NR			

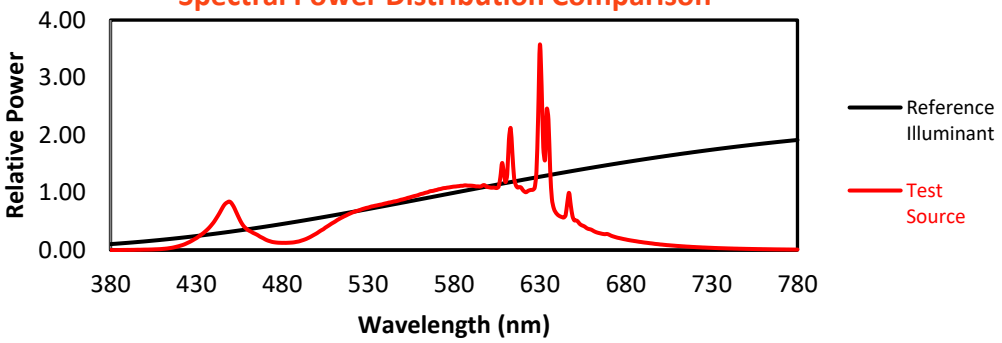
REPORT NUMBER: SP1-2506-472-2

TM-30-18

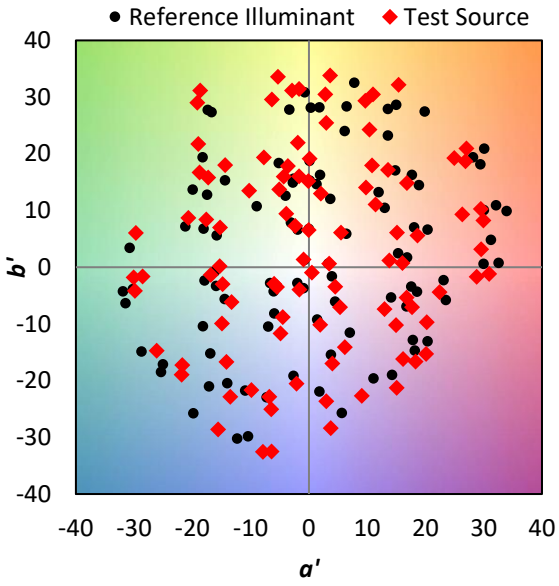
Summary

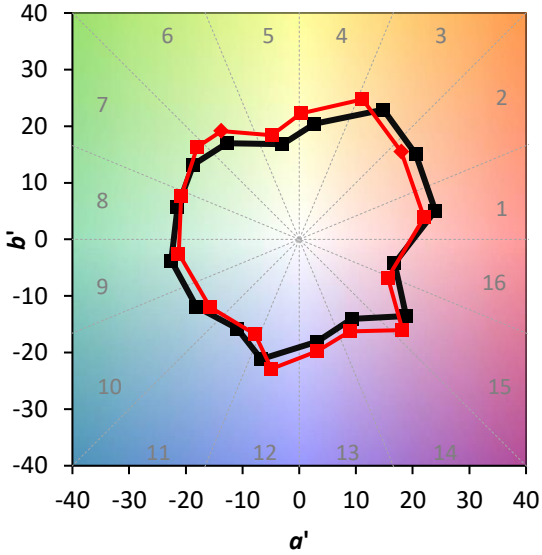
R_f = 81.2
R_g = 101.5
CIE R_a = 83.4
R_9 = 29.4

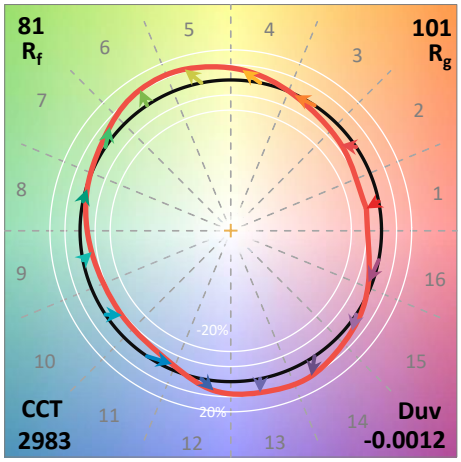
Spectral Power Distribution Comparison

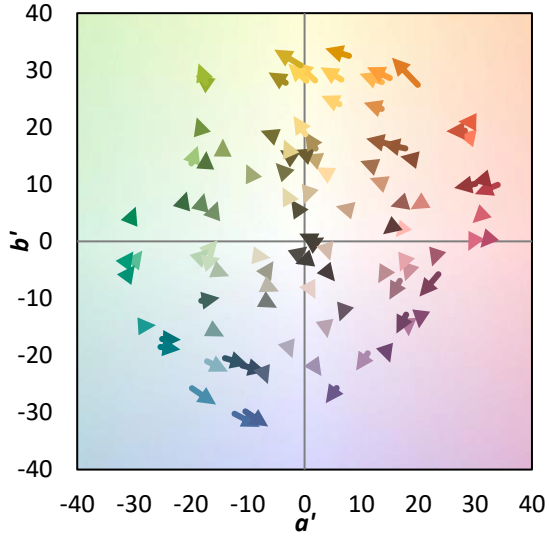


Color Vector Graphics









REPORT NUMBER: SP1-2506-472-2

TM-30-18

Individual Sample Fidelity Index ($R_{f,i}$)

CES01 = 86	CES26 = 71	CES51 = 89	CES76 = 65
CES02 = 63	CES27 = 89	CES52 = 89	CES77 = 82
CES03 = 31	CES28 = 86	CES53 = 80	CES78 = 67
CES04 = 70	CES29 = 68	CES54 = 92	CES79 = 89
CES05 = 50	CES30 = 77	CES55 = 90	CES80 = 85
CES06 = 51	CES31 = 70	CES56 = 81	CES81 = 75
CES07 = 43	CES32 = 64	CES57 = 79	CES82 = 93
CES08 = 41	CES33 = 74	CES58 = 81	CES83 = 89
CES09 = 29	CES34 = 76	CES59 = 92	CES84 = 91
CES10 = 76	CES35 = 87	CES60 = 96	CES85 = 81
CES11 = 59	CES36 = 99	CES61 = 91	CES86 = 74
CES12 = 65	CES37 = 81	CES62 = 93	CES87 = 83
CES13 = 44	CES38 = 83	CES63 = 79	CES88 = 86
CES14 = 74	CES39 = 94	CES64 = 81	CES89 = 74
CES15 = 72	CES40 = 89	CES65 = 78	CES90 = 85
CES16 = 48	CES41 = 88	CES66 = 76	CES91 = 87
CES17 = 50	CES42 = 80	CES67 = 74	CES92 = 73
CES18 = 57	CES43 = 75	CES68 = 79	CES93 = 84
CES19 = 72	CES44 = 99	CES69 = 83	CES94 = 64
CES20 = 67	CES45 = 83	CES70 = 72	CES95 = 80
CES21 = 87	CES46 = 82	CES71 = 70	CES96 = 86
CES22 = 79	CES47 = 79	CES72 = 90	CES97 = 85
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CES24 = 91	CES49 = 79	CES74 = 94	CES99 = 82
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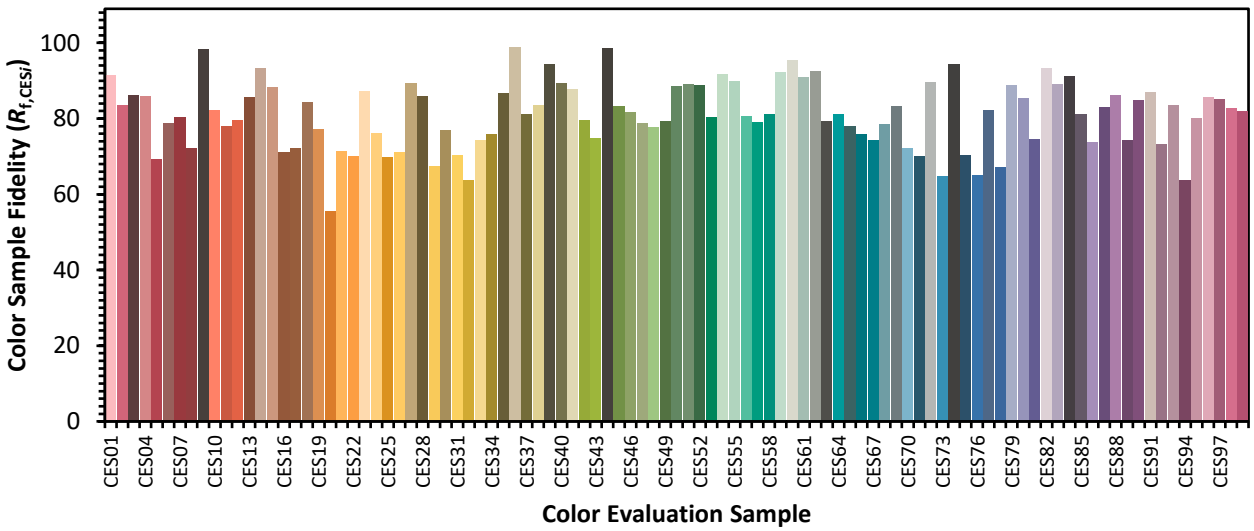

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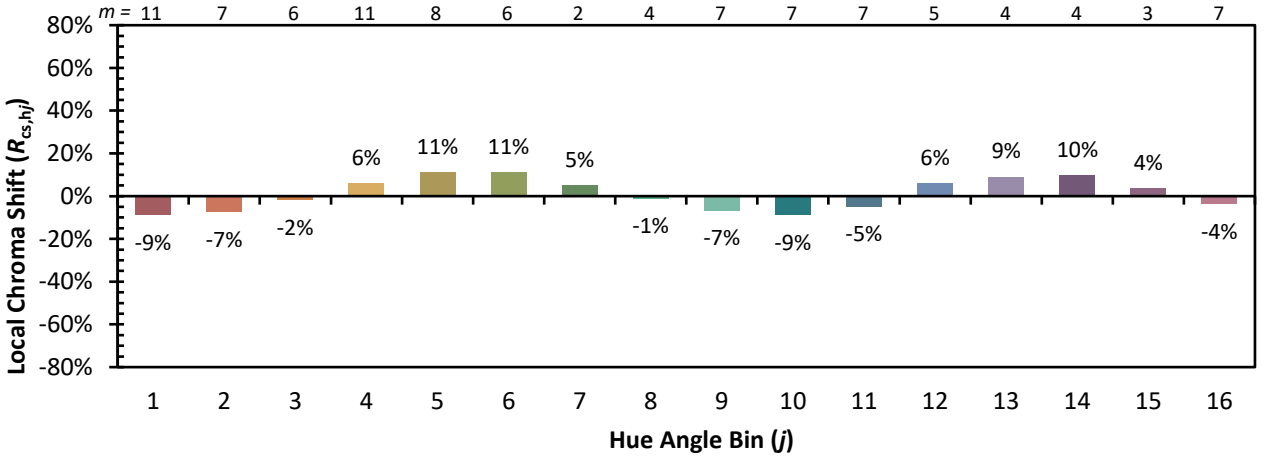
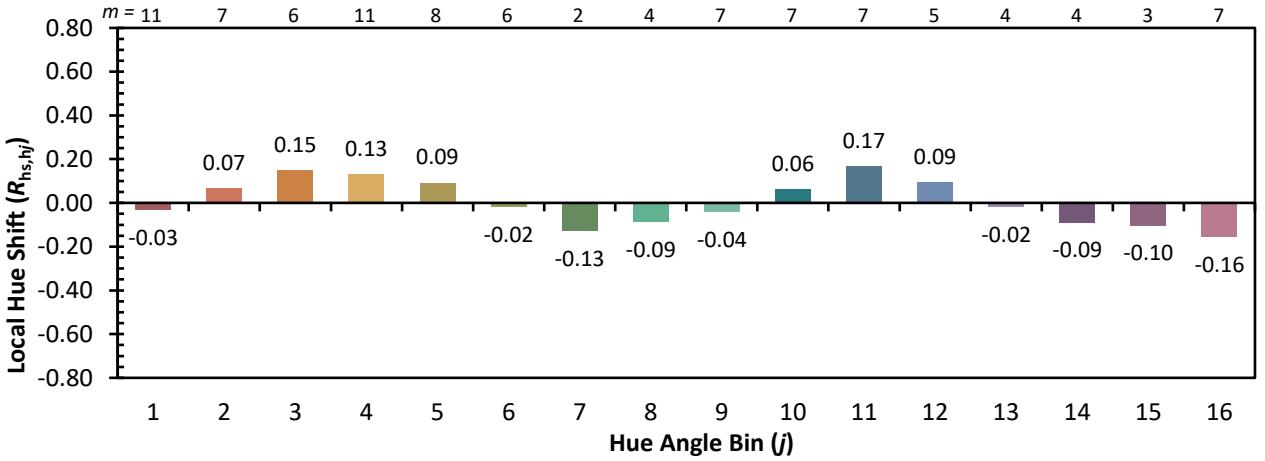
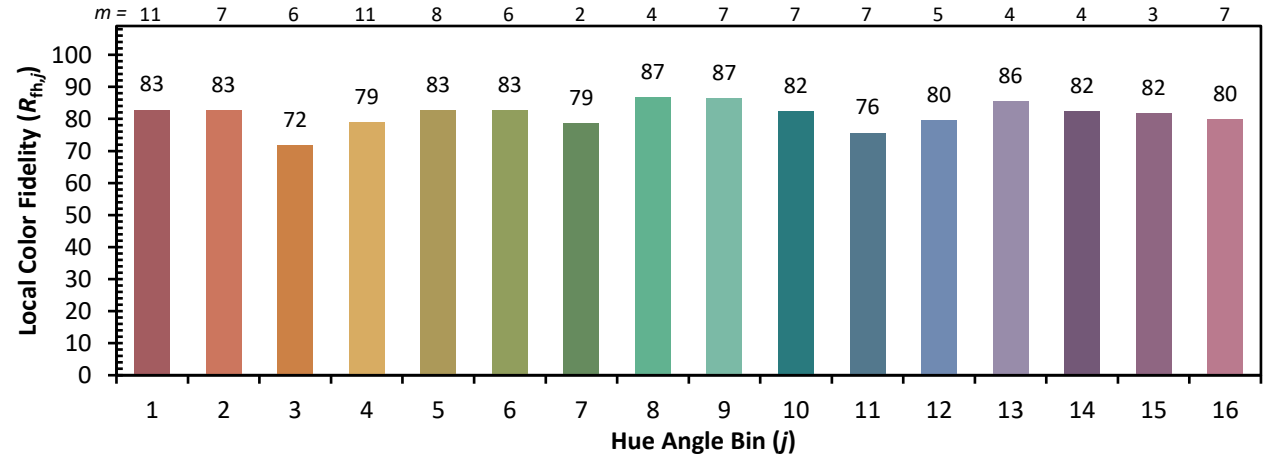
Color Rendition by Hue-Angle Bin







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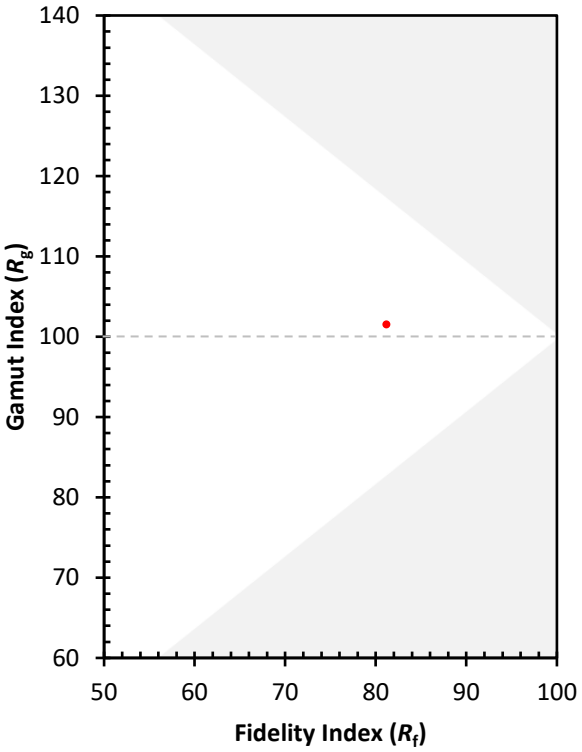
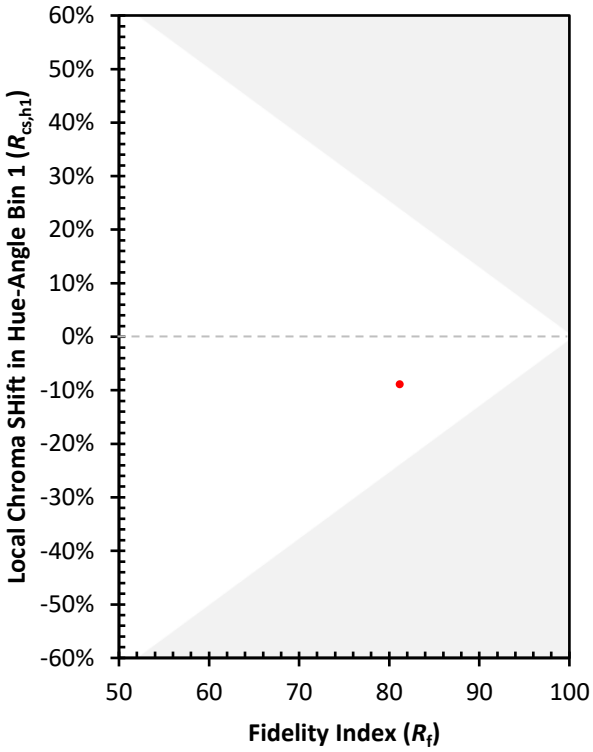
Measure Comparisons





(END OF REPORT)