

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: CORELITE

Report Number: P1216108

Luminaire Tested: 24-ID2-90-CNC-L850-U

Issue Date: 12/5/2025

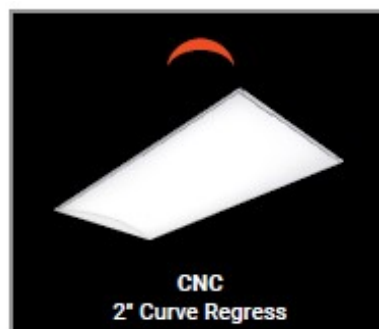
Test Information

Test Method: LM-79-2019
Report Number: P1216108
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2508-510-9)
Test Lab: INNOVATION CENTER
Issue Date: 12/5/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: CORELITE
Catalog Number: 24-ID2-90-CNC-L850-U
Description: 2X4 IN DEPTH TROFFER WITH 2INCH CURVE REGRESSED
Light Source: 5000K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

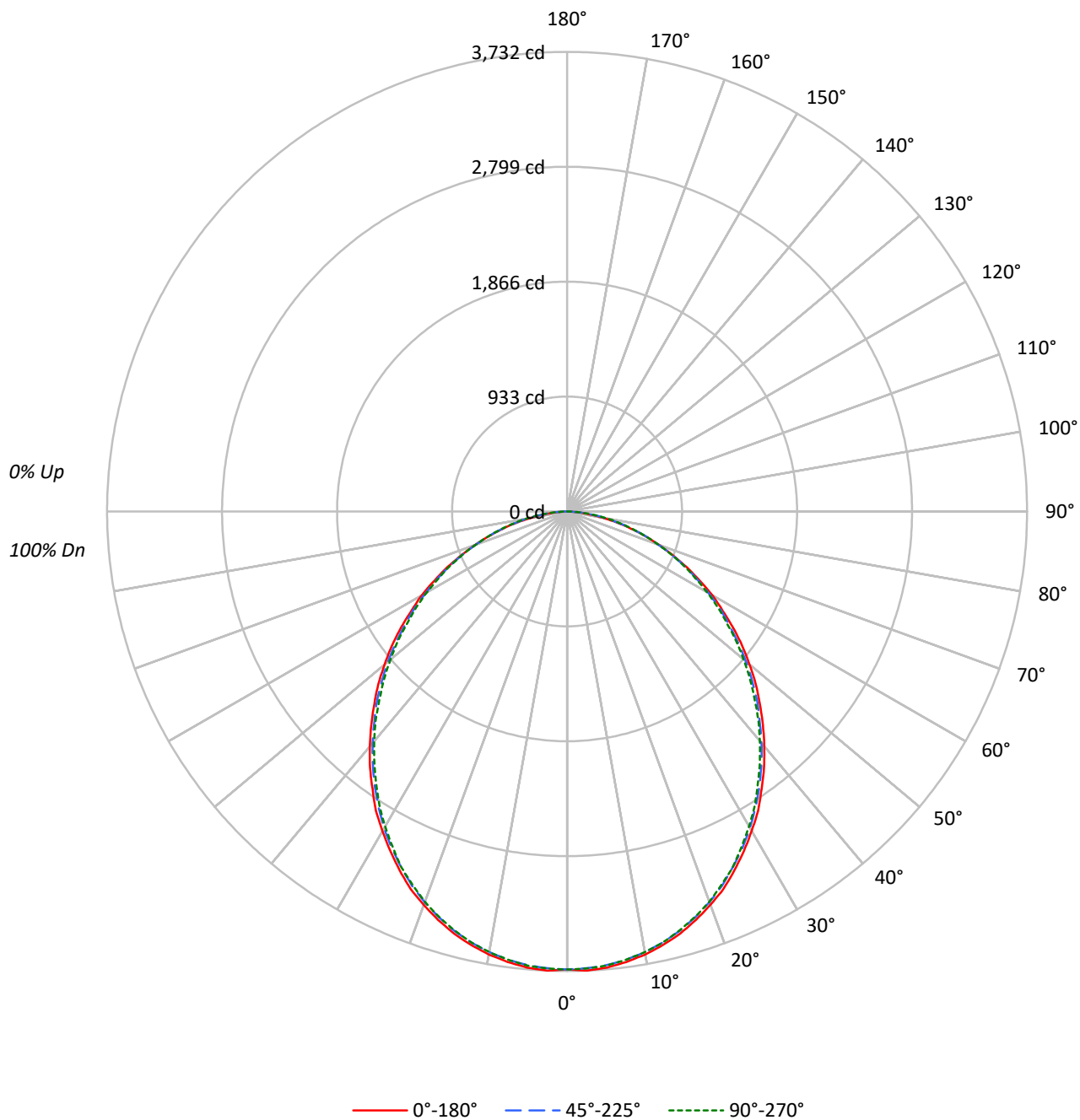
Lumens per Lamp: N/A
Luminaire Lumens: 9408.2 lumens
Efficiency: N/A
Efficacy: 120.6 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.19 / 1.29
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 78
Input Voltage (V): 120
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



TEST NUMBER: P1216108
CATALOG NUMBER: 24-ID2-90-CNC-L850-U

Luminous Intensity Polar Plot



TEST NUMBER: P1216108
 CATALOG NUMBER: 24-ID2-90-CNC-L850-U

COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20					20					20					20
RC	80				70					50					30					0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	50	30	0
RCR																				
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	102	102	100
1	109	105	100	97	106	102	99	95	98	95	92	94	92	89	91	89	87	87	87	85
2	100	92	85	79	97	90	84	78	86	81	77	83	79	75	80	76	73	73	73	71
3	91	81	73	67	89	79	72	66	76	70	65	74	68	64	71	66	63	63	63	60
4	84	72	63	57	81	71	63	56	68	61	56	66	60	55	64	58	54	54	54	52
5	77	64	56	49	75	63	55	49	61	54	48	59	53	48	57	52	47	47	47	45
6	71	58	49	43	69	57	49	43	55	48	42	54	47	42	52	46	42	42	42	40
7	66	53	44	38	64	52	44	38	51	43	38	49	42	37	48	42	37	37	37	35
8	62	48	40	34	60	48	40	34	46	39	34	45	38	34	44	38	33	33	33	32
9	58	44	36	31	56	44	36	31	43	36	31	42	35	30	41	35	30	30	30	29
10	54	41	33	28	53	41	33	28	40	33	28	39	32	28	38	32	28	28	28	26

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	5004	5004	5004
5°	5021	4995	4998
10°	4990	4964	4964
15°	4942	4913	4907
20°	4868	4834	4829
25°	4771	4729	4727
30°	4654	4612	4588
35°	4520	4468	4432
40°	4372	4311	4274
45°	4208	4151	4092
50°	4042	3968	3911
55°	3853	3762	3713
60°	3662	3564	3529
65°	3411	3349	3340
70°	3121	3106	3096
75°	2788	2835	2856
80°	2274	2475	2596
85°	1564	1985	1985

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 4208 cd/sqm

TEST NUMBER: P1216108
 CATALOG NUMBER: 24-ID2-90-CNC-L850-U

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	351.2	3.7
10°-20°	994.3	10.6
20°-30°	1468.6	15.6
30°-40°	1702.6	18.1
40°-50°	1681.8	17.9
50°-60°	1440.9	15.3
60°-70°	1045.5	11.1
70°-80°	577.1	6.1
80°-90°	146.3	1.6
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°	2814.1	29.9
0°-40°	4516.6	48.0
0°-60°	7639.4	81.2
0°-90°	9408.2	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	9408.2	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	3719	3719	3719	3719	3719	
5°	3718	3703	3698	3692	3701	353
15°	3548	3535	3527	3519	3523	1000
25°	3214	3201	3185	3179	3184	1480
35°	2752	2741	2720	2707	2698	1722
45°	2211	2197	2182	2159	2150	1708
55°	1643	1627	1604	1591	1583	1470
65°	1071	1062	1052	1047	1049	1060
75°	536	534	545	549	549	567
85°	101	112	129	130	129	127
90°	0	0	0	0	0	

TEST NUMBER: P1216108

CATALOG NUMBER: 24-ID2-90-CNC-L850-U

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	3719.0	3719.0	3719.0	3719.0	3719.0
2.5°	3731.9	3719.0	3712.5	3707.3	3715.1
5°	3717.7	3703.4	3698.2	3691.7	3700.8
7.5°	3689.1	3677.4	3670.9	3665.7	3670.9
10°	3652.7	3639.7	3633.3	3629.4	3633.3
12.5°	3604.7	3595.6	3585.2	3577.4	3585.2
15°	3547.6	3534.6	3526.8	3519.0	3522.9
17.5°	3477.4	3465.7	3455.4	3448.9	3452.8
20°	3399.5	3385.2	3376.1	3369.7	3372.3
22.5°	3317.7	3299.5	3287.9	3277.5	3278.8
25°	3213.8	3200.8	3185.3	3178.8	3184.0
27.5°	3107.4	3093.1	3080.1	3069.7	3067.1
30°	2995.7	2982.7	2968.4	2956.7	2952.8
32.5°	2884.0	2861.9	2846.4	2834.7	2833.4
35°	2751.6	2741.2	2720.4	2707.4	2698.3
37.5°	2625.6	2610.0	2589.2	2577.6	2568.5
40°	2489.3	2473.7	2454.2	2437.3	2433.4
42.5°	2351.6	2339.9	2314.0	2303.6	2297.1
45°	2211.4	2197.1	2181.5	2159.4	2150.3
47.5°	2077.6	2063.3	2037.4	2017.9	2012.7
50°	1930.9	1914.0	1895.8	1872.5	1868.6
52.5°	1792.0	1772.5	1749.1	1738.7	1730.9
55°	1642.6	1627.0	1603.7	1590.7	1582.9
57.5°	1494.6	1485.5	1469.9	1451.7	1450.4
60°	1360.8	1342.7	1324.5	1311.5	1311.5
62.5°	1211.5	1205.0	1186.8	1179.1	1175.2
65°	1071.3	1062.2	1051.8	1046.6	1049.2
67.5°	927.1	925.8	918.1	919.4	916.8
70°	793.4	788.2	789.5	792.1	786.9
72.5°	663.5	659.6	666.1	667.4	670.0
75°	536.3	533.7	545.4	549.3	549.3
77.5°	409.0	416.8	429.8	440.2	440.2
80°	293.5	303.9	319.4	328.5	335.0
82.5°	188.3	205.2	219.4	225.9	225.9
85°	101.3	111.7	128.6	129.9	128.6
87.5°	31.2	39.0	46.7	49.3	50.6
90°	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P1216108

CATALOG NUMBER: 24-ID2-90-CNC-L850-U

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	16.63	18.23	16.99	18.54	18.86	16.46	18.06	16.82	18.37	18.69
	3H	18.27	19.71	18.65	20.04	20.40	18.15	19.59	18.53	19.92	20.28
	4H	18.85	20.21	19.25	20.56	20.93	18.78	20.14	19.18	20.49	20.86
	6H	19.24	20.49	19.65	20.86	21.25	19.25	20.51	19.66	20.87	21.26
	8H	19.34	20.54	19.76	20.92	21.32	19.40	20.59	19.82	20.98	21.38
	12H	19.39	20.53	19.82	20.92	21.34	19.48	20.63	19.91	21.01	21.44
4H	2H	17.20	18.55	17.59	18.90	19.28	17.06	18.42	17.46	18.76	19.14
	3H	19.05	20.19	19.46	20.59	20.99	18.97	20.10	19.38	20.50	20.90
	4H	19.76	20.78	20.19	21.20	21.63	19.73	20.75	20.16	21.16	21.60
	6H	20.26	21.15	20.72	21.59	22.05	20.32	21.22	20.78	21.66	22.11
	8H	20.40	21.23	20.86	21.68	22.14	20.51	21.35	20.97	21.79	22.26
	12H	20.48	21.23	20.96	21.70	22.17	20.63	21.38	21.11	21.86	22.33
8H	4H	20.04	20.87	20.50	21.32	21.78	20.01	20.85	20.47	21.29	21.75
	6H	20.65	21.34	21.14	21.83	22.31	20.72	21.41	21.21	21.90	22.38
	8H	20.85	21.47	21.36	21.97	22.46	20.98	21.60	21.49	22.11	22.59
	12H	20.98	21.53	21.49	22.02	22.58	21.16	21.71	21.67	22.21	22.77
12H	4H	20.07	20.81	20.55	21.29	21.76	20.03	20.78	20.51	21.26	21.73
	6H	20.69	21.32	21.20	21.82	22.31	20.76	21.39	21.27	21.89	22.38
	8H	20.95	21.50	21.45	21.99	22.55	21.07	21.62	21.58	22.11	22.67

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

Report Prepared for

Cooper Lighting Solutions

Corelite

Report Number: SP1-2506-458-7

Test Date: 08/26/2025

Luminaire Tested: 22ID2-55-CFR1-L850-U

Data in this report applies to families of products including 22ID2-55-CFR1-L850-U

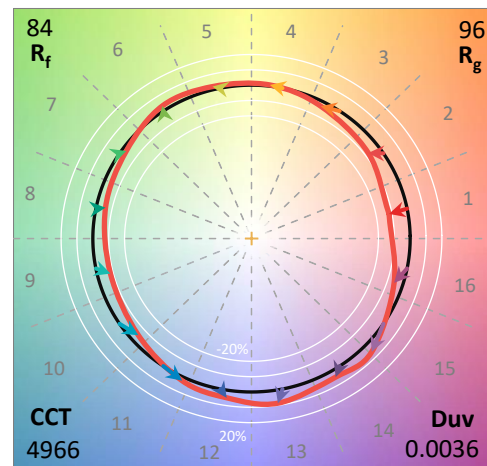
Test Information

Test Method: LM-79-2019
 Report Number: SP1-2506-458-7
 Test Lab: COOPER LIGHTING SOLUTIONS
 Photometer: SP1 - 76IN SPHERE
 Measurement Geometry: 4π
 Issue Date: 08/27/2025
 Manufacturer: COOPER LIGHTING SOLUTIONS
 Product Line: Corelite
 Catalog Number: **22ID2-55-CFR1-L850-U**
 Description: 2X2 CGTX WITH INDEPTH FRAME AND CFR1 LENS - 5500 LUMEN 5000K 80CRI

Spectral Parameters

CCT (K): 4966
 CIE u' : 0.2093
 CIE v' : 0.4890
 Duv: 0.0036
 CIE x: 0.3468
 CIE y: 0.3601
 CIE z: 0.2931
 Peak Wavelength (nm): 450
 Dominant Wavelength (nm): 570
 Purity: 12.1135
 R_f: 84
 R_g: 96.2

CRI (Ra): 83.1
 R1: 81.0
 R2: 87.8
 R3: 92.7
 R4: 82.4
 R5: 81.0
 R6: 82.6
 R7: 88.5
 R8: 68.6
 R9: 10.3
 R10: 70.9
 R11: 81.3
 R12: 55.9
 R13: 82.8
 R14: 96.1
 R15: 75.1



Test Conditions

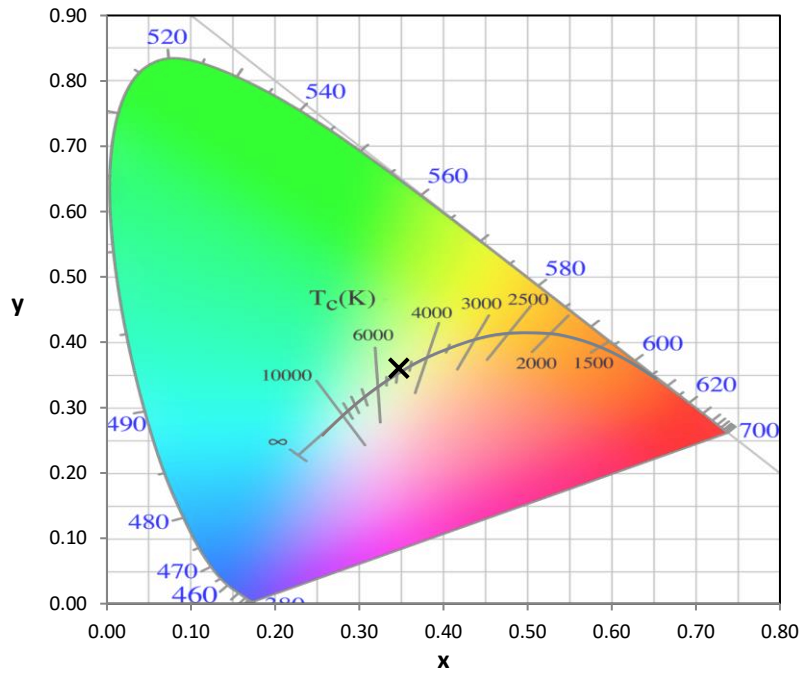
Stabilization Time: 37M
 Operation Time: 1H 37M
 Sphere Temperature (°C): 25.2

REPORT NUMBER: SP1-2506-458-7

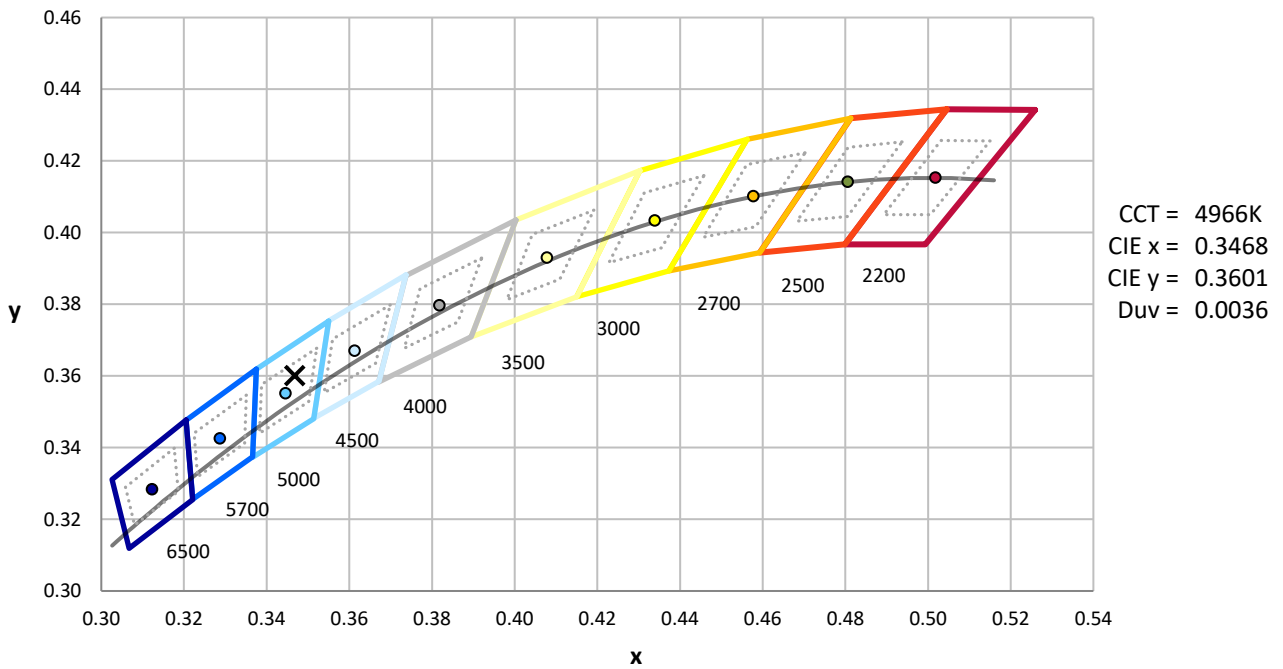
Measurement and Test Equipment			
Instrument	Identification Number	Calibration Date	Calibration Due Date
Photometer	76INCH SPHERE IN0058	6/16/2025	12/16/2025
Power Meter	XITRON INXT2011004	1/21/2025	1/21/2026
AC Power Source	CHROMA 61603 IN0063	10/22/2024	10/22/2025
DC Power Source	AGILENT E3634A IN0208	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: SP1-2506-458-7

CIE 1931 Chromaticity Diagram

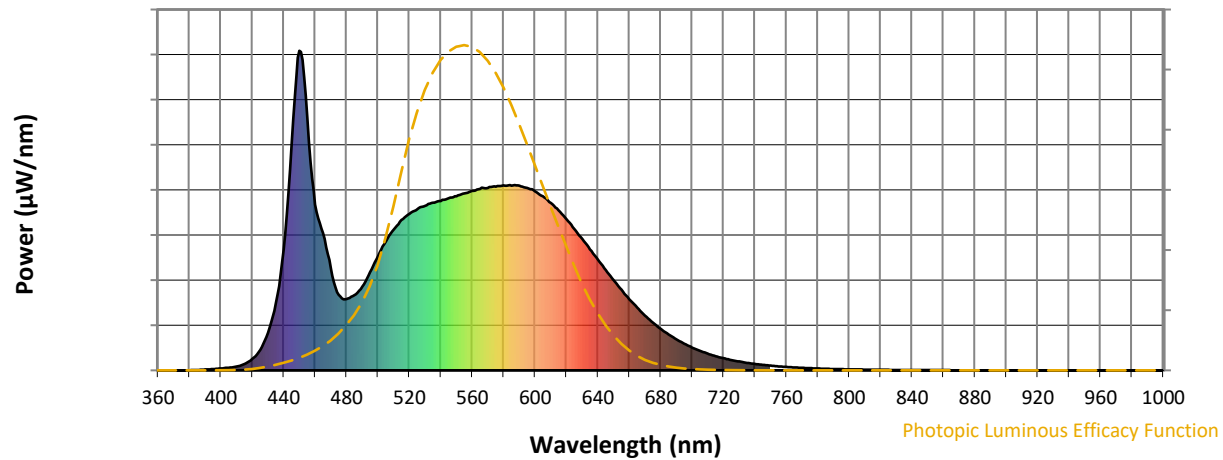


CIE 1931 Chromaticity Diagram with 2017 ANSI 7-Step and 4-Step Quadrangles



REPORT NUMBER: SP1-2506-458-7

Photopic Flux vs. Wavelength

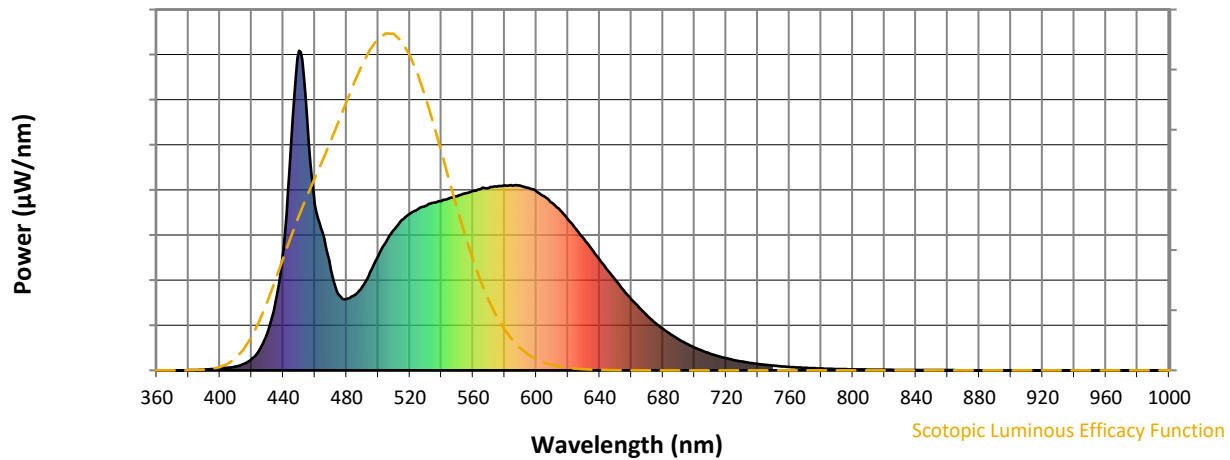


Photopic Lumens: NR

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	262	NR	620	472	NR	750	15	NR	880	0	NR
365	0	NR	495	307	NR	625	443	NR	755	13	NR	885	0	NR
370	0	NR	500	358	NR	630	412	NR	760	11	NR	890	0	NR
375	0	NR	505	403	NR	635	379	NR	765	9	NR	895	0	NR
380	0	NR	510	440	NR	640	346	NR	770	8	NR	900	0	NR
385	1	NR	515	471	NR	645	313	NR	775	7	NR	905	0	NR
390	3	NR	520	490	NR	650	282	NR	780	6	NR	910	0	NR
395	4	NR	525	504	NR	655	252	NR	785	5	NR	915	0	NR
400	6	NR	530	515	NR	660	223	NR	790	4	NR	920	0	NR
405	9	NR	535	524	NR	665	197	NR	795	4	NR	925	0	NR
410	12	NR	540	530	NR	670	171	NR	800	3	NR	930	0	NR
415	20	NR	545	539	NR	675	149	NR	805	3	NR	935	0	NR
420	36	NR	550	545	NR	680	130	NR	810	2	NR	940	0	NR
425	64	NR	555	554	NR	685	112	NR	815	2	NR	945	0	NR
430	117	NR	560	562	NR	690	97	NR	820	2	NR	950	0	NR
435	212	NR	565	567	NR	695	83	NR	825	2	NR	955	0	NR
440	378	NR	570	571	NR	700	71	NR	830	1	NR	960	0	NR
445	709	NR	575	574	NR	705	61	NR	835	1	NR	965	0	NR
450	1000	NR	580	579	NR	710	52	NR	840	1	NR	970	0	NR
455	789	NR	585	578	NR	715	44	NR	845	1	NR	975	0	NR
460	519	NR	590	578	NR	720	38	NR	850	1	NR	980	0	NR
465	429	NR	595	571	NR	725	32	NR	855	1	NR	985	0	NR
470	316	NR	600	560	NR	730	28	NR	860	1	NR	990	0	NR
475	236	NR	605	545	NR	735	24	NR	865	1	NR	995	0	NR
480	224	NR	610	524	NR	740	20	NR	870	0	NR	1000	0	NR
485	235	NR	615	501	NR	745	17	NR	875	0	NR			

REPORT NUMBER: SP1-2506-458-7

Scotopic Flux vs. Wavelength



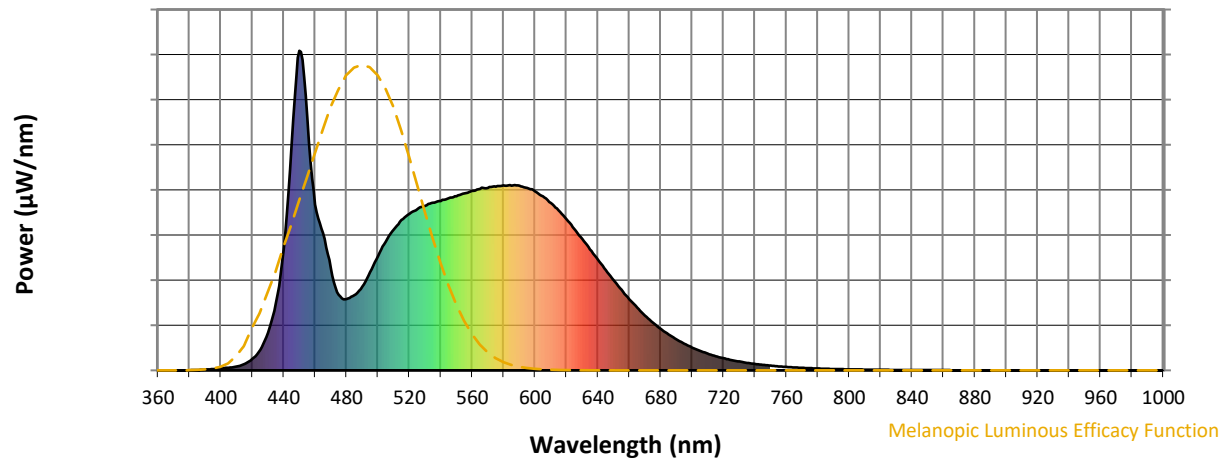
Scotopic Lumens: NR

S/P: 1.94

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	262	NR	620	472	NR	750	15	NR	880	0	NR
365	0	NR	495	307	NR	625	443	NR	755	13	NR	885	0	NR
370	0	NR	500	358	NR	630	412	NR	760	11	NR	890	0	NR
375	0	NR	505	403	NR	635	379	NR	765	9	NR	895	0	NR
380	0	NR	510	440	NR	640	346	NR	770	8	NR	900	0	NR
385	1	NR	515	471	NR	645	313	NR	775	7	NR	905	0	NR
390	3	NR	520	490	NR	650	282	NR	780	6	NR	910	0	NR
395	4	NR	525	504	NR	655	252	NR	785	5	NR	915	0	NR
400	6	NR	530	515	NR	660	223	NR	790	4	NR	920	0	NR
405	9	NR	535	524	NR	665	197	NR	795	4	NR	925	0	NR
410	12	NR	540	530	NR	670	171	NR	800	3	NR	930	0	NR
415	20	NR	545	539	NR	675	149	NR	805	3	NR	935	0	NR
420	36	NR	550	545	NR	680	130	NR	810	2	NR	940	0	NR
425	64	NR	555	554	NR	685	112	NR	815	2	NR	945	0	NR
430	117	NR	560	562	NR	690	97	NR	820	2	NR	950	0	NR
435	212	NR	565	567	NR	695	83	NR	825	2	NR	955	0	NR
440	378	NR	570	571	NR	700	71	NR	830	1	NR	960	0	NR
445	709	NR	575	574	NR	705	61	NR	835	1	NR	965	0	NR
450	1000	NR	580	579	NR	710	52	NR	840	1	NR	970	0	NR
455	789	NR	585	578	NR	715	44	NR	845	1	NR	975	0	NR
460	519	NR	590	578	NR	720	38	NR	850	1	NR	980	0	NR
465	429	NR	595	571	NR	725	32	NR	855	1	NR	985	0	NR
470	316	NR	600	560	NR	730	28	NR	860	1	NR	990	0	NR
475	236	NR	605	545	NR	735	24	NR	865	1	NR	995	0	NR
480	224	NR	610	524	NR	740	20	NR	870	0	NR	1000	0	NR
485	235	NR	615	501	NR	745	17	NR	875	0	NR			

REPORT NUMBER: SP1-2506-458-7

Melanopic Flux vs. Wavelength



Melanopic Lumens: NR

M/P: 4.11

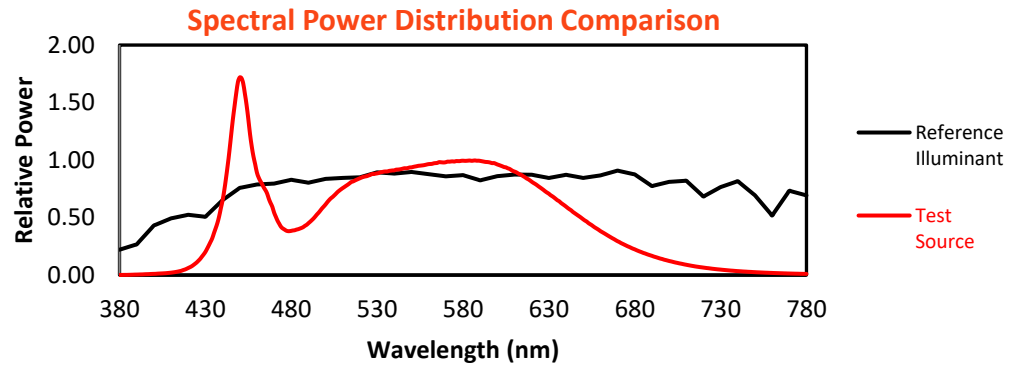
λ (nm)	Power W ^λ /nm	Lumens (φ/nm)	λ (nm)	Power W ^λ /nm	Lumens (φ/nm)	λ (nm)	Power W ^λ /nm	Lumens (φ/nm)	λ (nm)	Power W ^λ /nm	Lumens (φ/nm)	λ (nm)	Power W ^λ /nm	Lumens (φ/nm)
360	0	NR	490	262	NR	620	472	NR	750	15	NR	880	0	NR
365	0	NR	495	307	NR	625	443	NR	755	13	NR	885	0	NR
370	0	NR	500	358	NR	630	412	NR	760	11	NR	890	0	NR
375	0	NR	505	403	NR	635	379	NR	765	9	NR	895	0	NR
380	0	NR	510	440	NR	640	346	NR	770	8	NR	900	0	NR
385	1	NR	515	471	NR	645	313	NR	775	7	NR	905	0	NR
390	3	NR	520	490	NR	650	282	NR	780	6	NR	910	0	NR
395	4	NR	525	504	NR	655	252	NR	785	5	NR	915	0	NR
400	6	NR	530	515	NR	660	223	NR	790	4	NR	920	0	NR
405	9	NR	535	524	NR	665	197	NR	795	4	NR	925	0	NR
410	12	NR	540	530	NR	670	171	NR	800	3	NR	930	0	NR
415	20	NR	545	539	NR	675	149	NR	805	3	NR	935	0	NR
420	36	NR	550	545	NR	680	130	NR	810	2	NR	940	0	NR
425	64	NR	555	554	NR	685	112	NR	815	2	NR	945	0	NR
430	117	NR	560	562	NR	690	97	NR	820	2	NR	950	0	NR
435	212	NR	565	567	NR	695	83	NR	825	2	NR	955	0	NR
440	378	NR	570	571	NR	700	71	NR	830	1	NR	960	0	NR
445	709	NR	575	574	NR	705	61	NR	835	1	NR	965	0	NR
450	1000	NR	580	579	NR	710	52	NR	840	1	NR	970	0	NR
455	789	NR	585	578	NR	715	44	NR	845	1	NR	975	0	NR
460	519	NR	590	578	NR	720	38	NR	850	1	NR	980	0	NR
465	429	NR	595	571	NR	725	32	NR	855	1	NR	985	0	NR
470	316	NR	600	560	NR	730	28	NR	860	1	NR	990	0	NR
475	236	NR	605	545	NR	735	24	NR	865	1	NR	995	0	NR
480	224	NR	610	524	NR	740	20	NR	870	0	NR	1000	0	NR
485	235	NR	615	501	NR	745	17	NR	875	0	NR			

REPORT NUMBER: SP1-2506-458-7

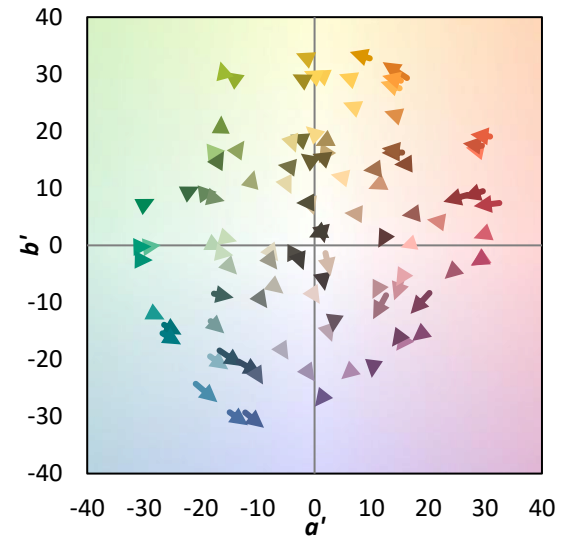
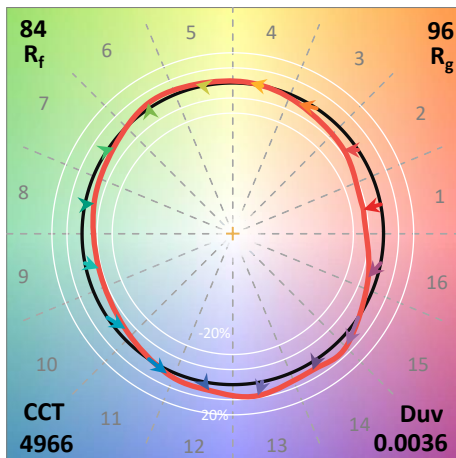
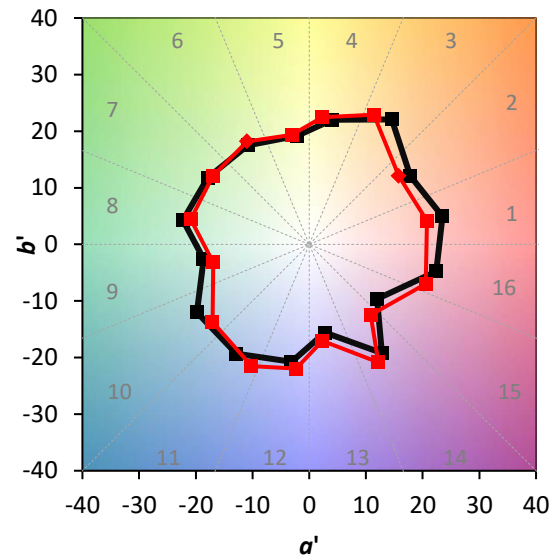
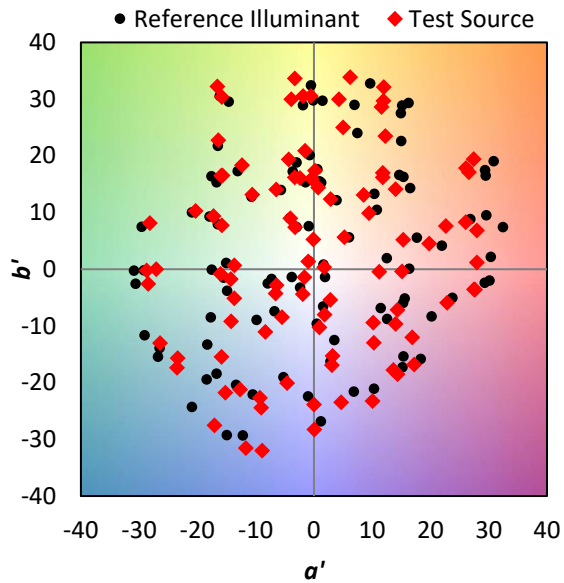
TM-30-18

Summary

$R_f = 84$
 $R_g = 96.2$
 $\text{CIE } R_a = 83.1$
 $R_9 = 10.3$

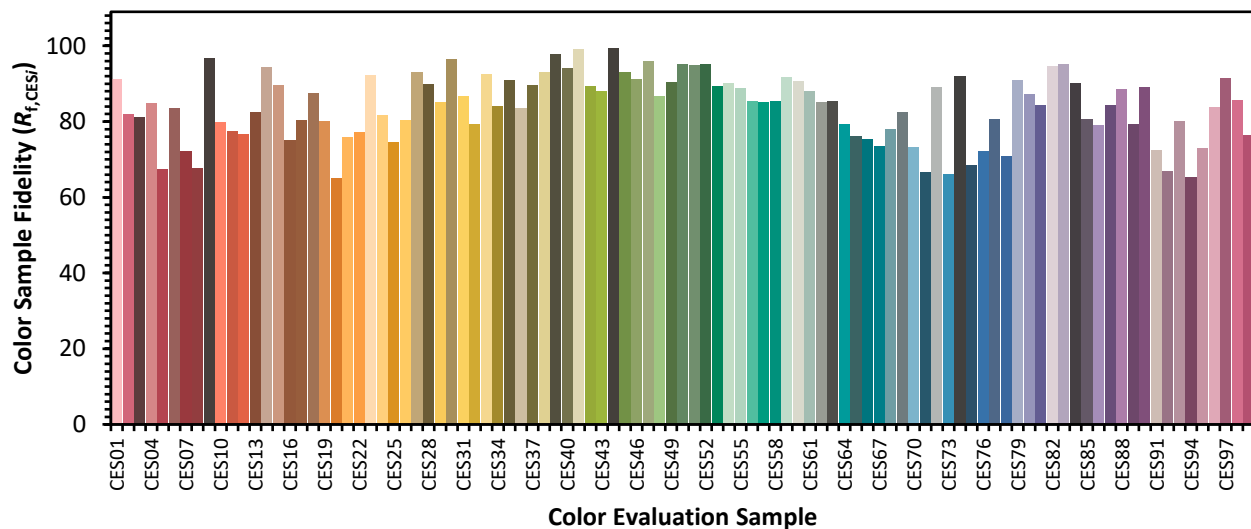


Color Vector Graphics

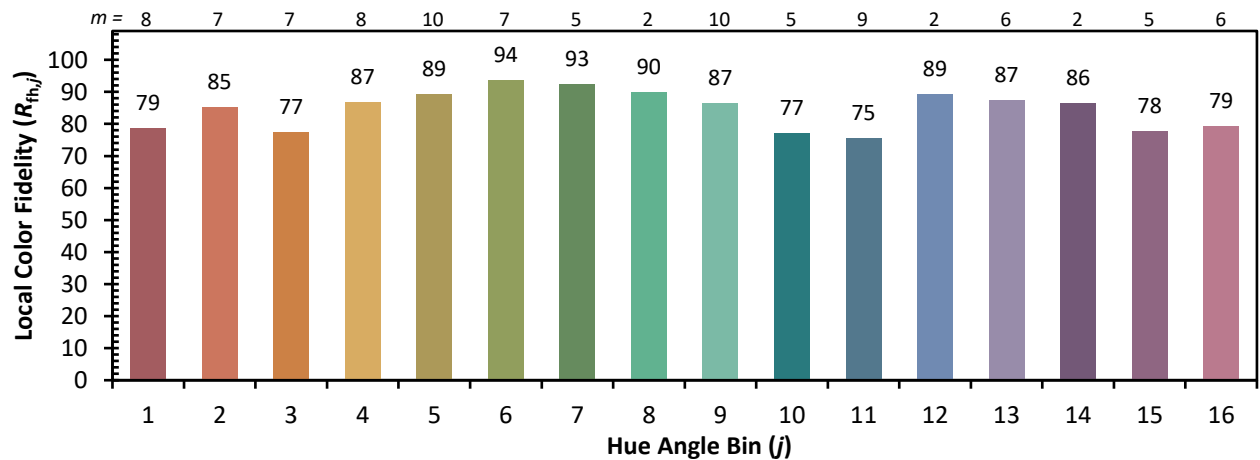
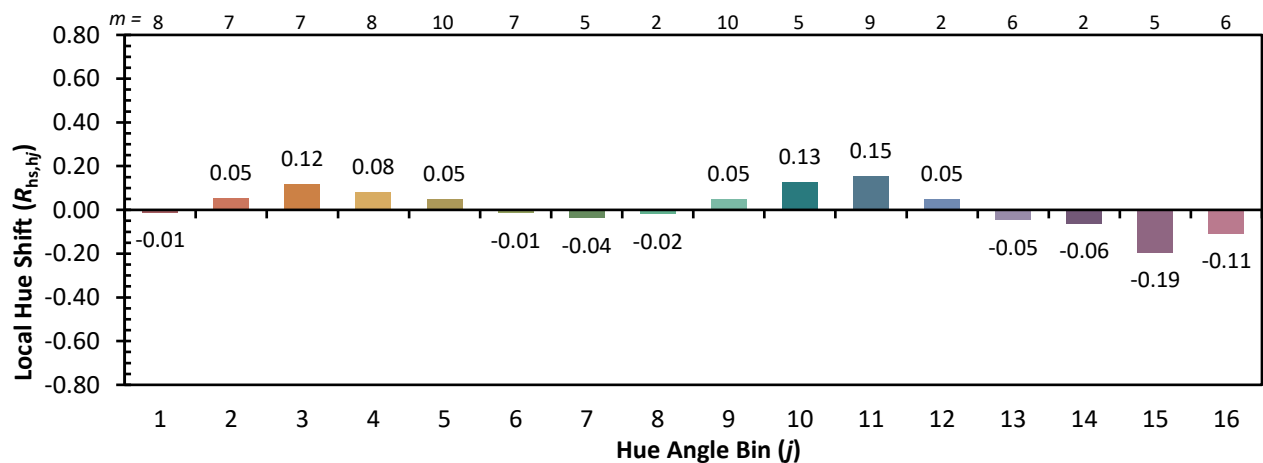
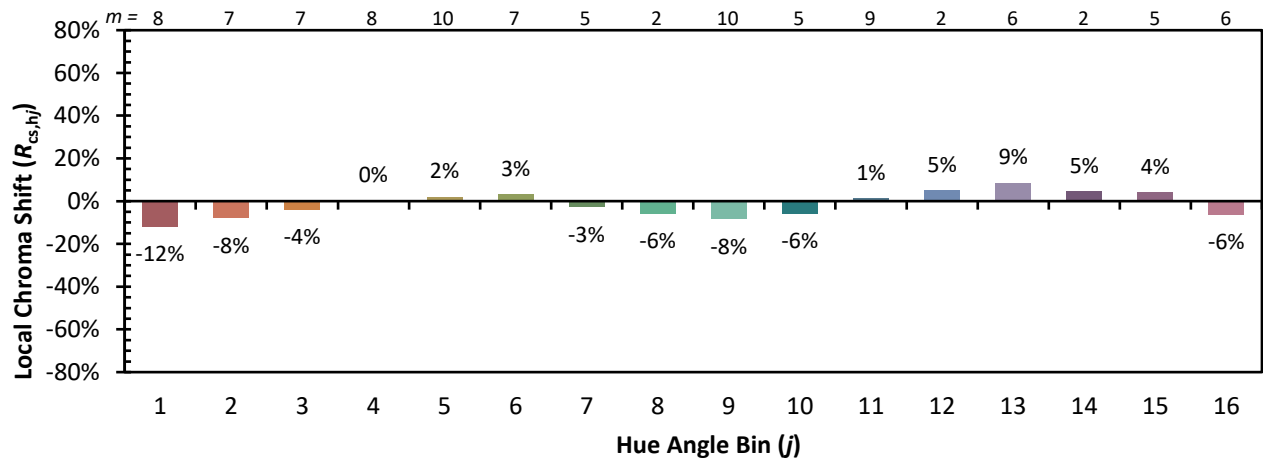


Individual Sample Fidelity Index ($R_{f,i}$)

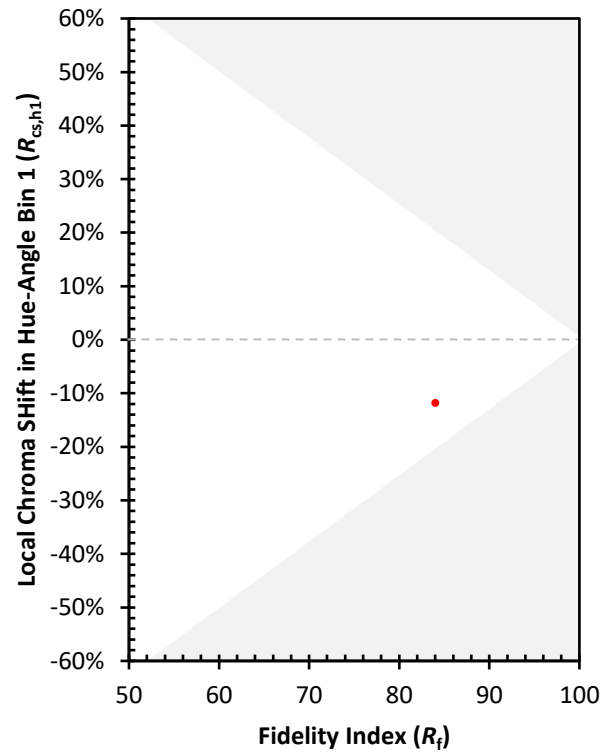
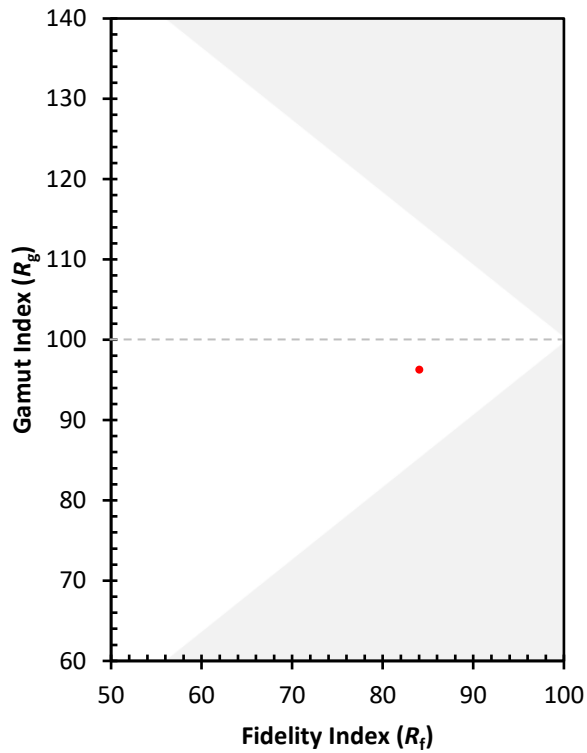
CES01 = 85	CES26 = 80	CES51 = 95	CES76 = 72
CES02 = 60	CES27 = 93	CES52 = 95	CES77 = 81
CES03 = 30	CES28 = 90	CES53 = 89	CES78 = 71
CES04 = 69	CES29 = 85	CES54 = 90	CES79 = 91
CES05 = 47	CES30 = 97	CES55 = 89	CES80 = 87
CES06 = 50	CES31 = 87	CES56 = 86	CES81 = 84
CES07 = 40	CES32 = 79	CES57 = 85	CES82 = 95
CES08 = 39	CES33 = 92	CES58 = 85	CES83 = 95
CES09 = 29	CES34 = 84	CES59 = 92	CES84 = 90
CES10 = 73	CES35 = 91	CES60 = 91	CES85 = 81
CES11 = 56	CES36 = 83	CES61 = 88	CES86 = 79
CES12 = 62	CES37 = 90	CES62 = 85	CES87 = 84
CES13 = 42	CES38 = 93	CES63 = 85	CES88 = 89
CES14 = 74	CES39 = 98	CES64 = 79	CES89 = 79
CES15 = 71	CES40 = 94	CES65 = 76	CES90 = 89
CES16 = 46	CES41 = 99	CES66 = 75	CES91 = 72
CES17 = 48	CES42 = 89	CES67 = 73	CES92 = 67
CES18 = 55	CES43 = 88	CES68 = 78	CES93 = 80
CES19 = 70	CES44 = 99	CES69 = 82	CES94 = 65
CES20 = 64	CES45 = 93	CES70 = 73	CES95 = 73
CES21 = 85	CES46 = 91	CES71 = 67	CES96 = 84
CES22 = 77	CES47 = 96	CES72 = 89	CES97 = 92
CES23 = 91	CES48 = 87	CES73 = 66	CES98 = 86
CES24 = 90	CES49 = 90	CES74 = 92	CES99 = 77
CES25 = 71	CES50 = 95	CES75 = 68	



Color Rendition by Hue-Angle Bin



Measure Comparisons



(END OF REPORT)