

Signify Classified - Internal  
Cooper Lighting Solutions Photometric Lab  
1121 Highway 74 South  
Peachtree City, GA 30269



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: INVUE

Report Number: P868780

Luminaire Tested: **EMM2-HSN-SA3B-730-U-T1**

Issue Date: 08/22/2024

**Test Information**

Test Method: LM-79-08  
Report Number: P868780  
Test Lab: INNOVATION CENTER(G3)  
Issue Date: 08/22/2024  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: INVUE  
Catalog Number: EMM2-HSN-SA3B-730-U-T1  
Description: EPIC MODERN SHORT HOUSING DISCRETE LED ARRAYS 150W 70CRI 3000K  
FITXURE w/ TYPE 1 DISTRIBUTION OPTIC  
Light Source: (30) 3000K CCT, 70 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

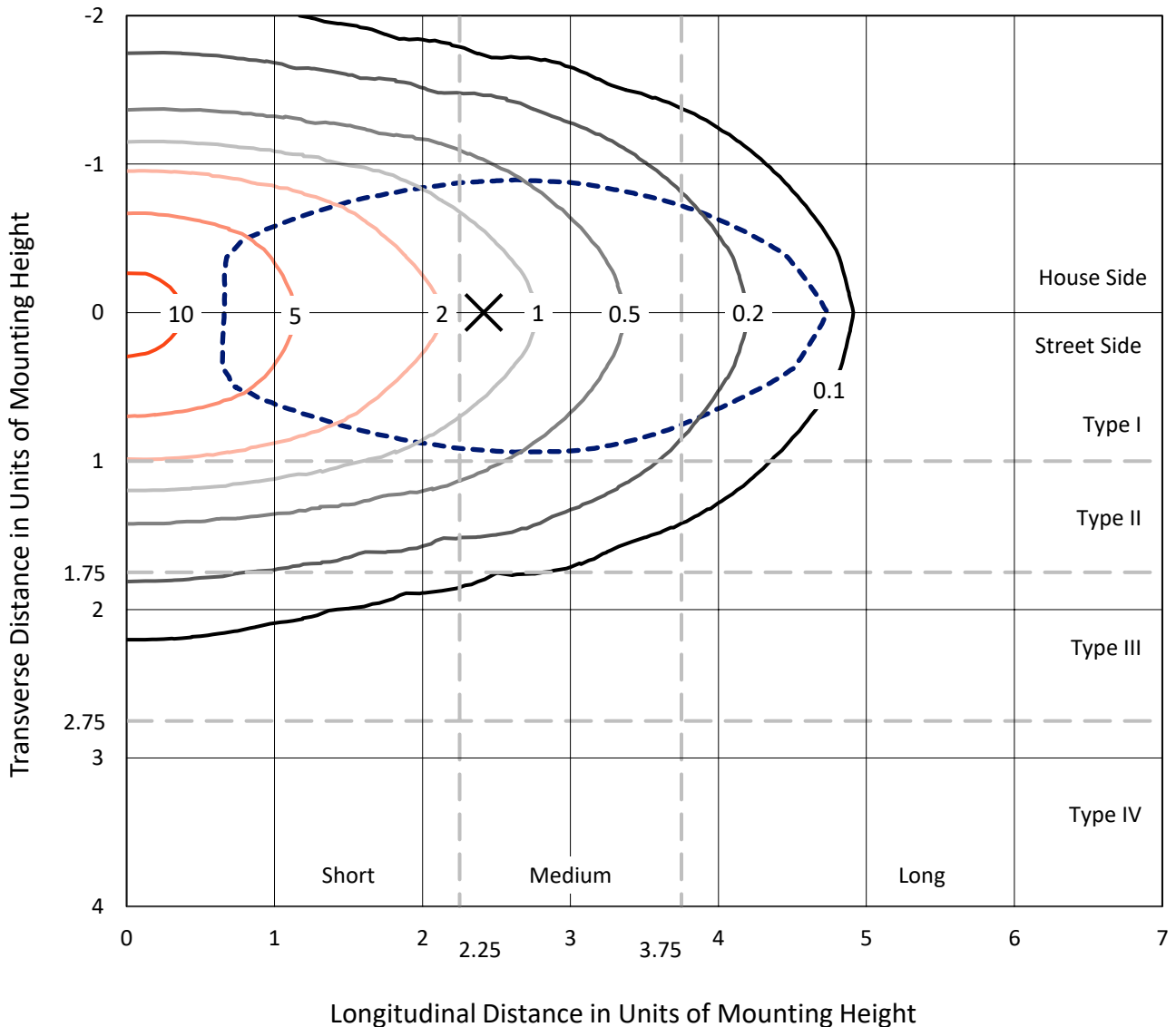
Lumens per Lamp: N/A  
Luminaire Lumens: 18679.7 lumens  
Efficiency: N/A  
Efficacy: 139.4 lumens/watt  
Luminous Opening: Rectangular (W 1' x L: 0.33' x H: 0')  
IES Classification: Type I - Short  
BUG Rating: B3 - U0 - G3

Input Watts (W): 134  
Input Voltage (V): 120  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: 0.99  
Total Harmonic Distortion (THDi): 6.70%  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 24 FT

REPORT NUMBER: P868780  
 CATALOG NUMBER: EMM2-HSN-SA3B-730-U-T1

### Iso-Footcandle Lines of Horizontal Illumination

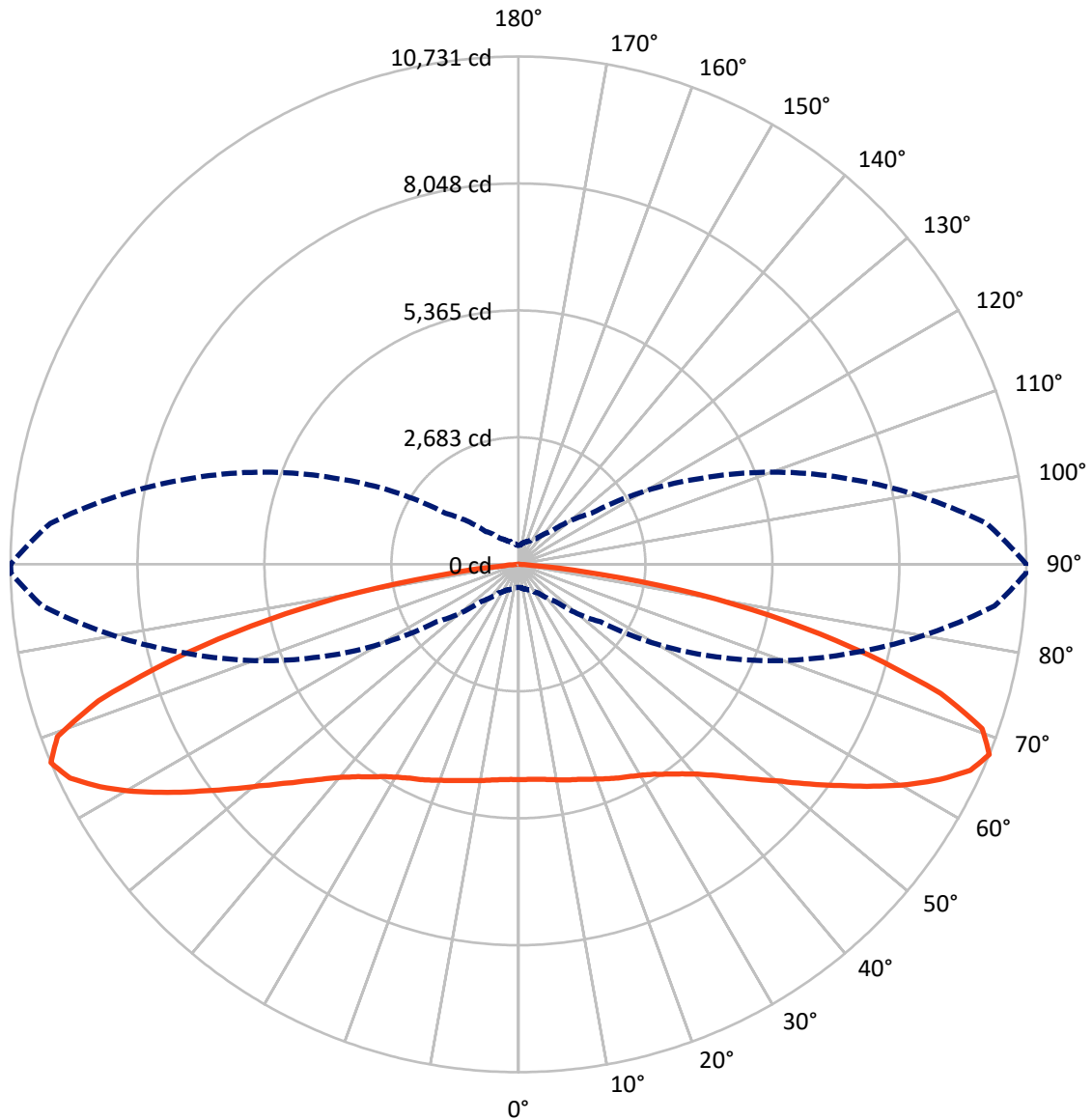
× Max cd  
 - - - 1/2 Max cd



Based on 20 foot mounting height. Maximum calculated value = 11.4 fc  
 Type I - Short - N/A

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### Luminous Intensity Polar Plot



— Vertical Plane Through 90-Deg Lateral    - - - Horizontal Cone Through 67.5-Deg Vertical

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**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	9174.0	0.0	9174.0
	% Fixture	49.1	0.0	49.1
<b>Street Side</b>	Lumens	9505.7	0.0	9505.7
	% Fixture	50.9	0.0	50.9
<b>Total</b>	Lumens	18679.7	0.0	18679.7
	% Fixture	100.0	0.0	100.0

**Coefficient of Utilization**

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	436.2	2.3
10°-20°	1310.8	7.0
20°-30°	2169.3	11.6
30°-40°	2876.5	15.4
40°-50°	3243.2	17.4
50°-60°	3324.7	17.8
60°-70°	3140.2	16.8
70°-80°	1926.8	10.3
80°-90°	252.1	1.3
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°-90°	18679.7	100.0
0°-180°	18679.7	100.0



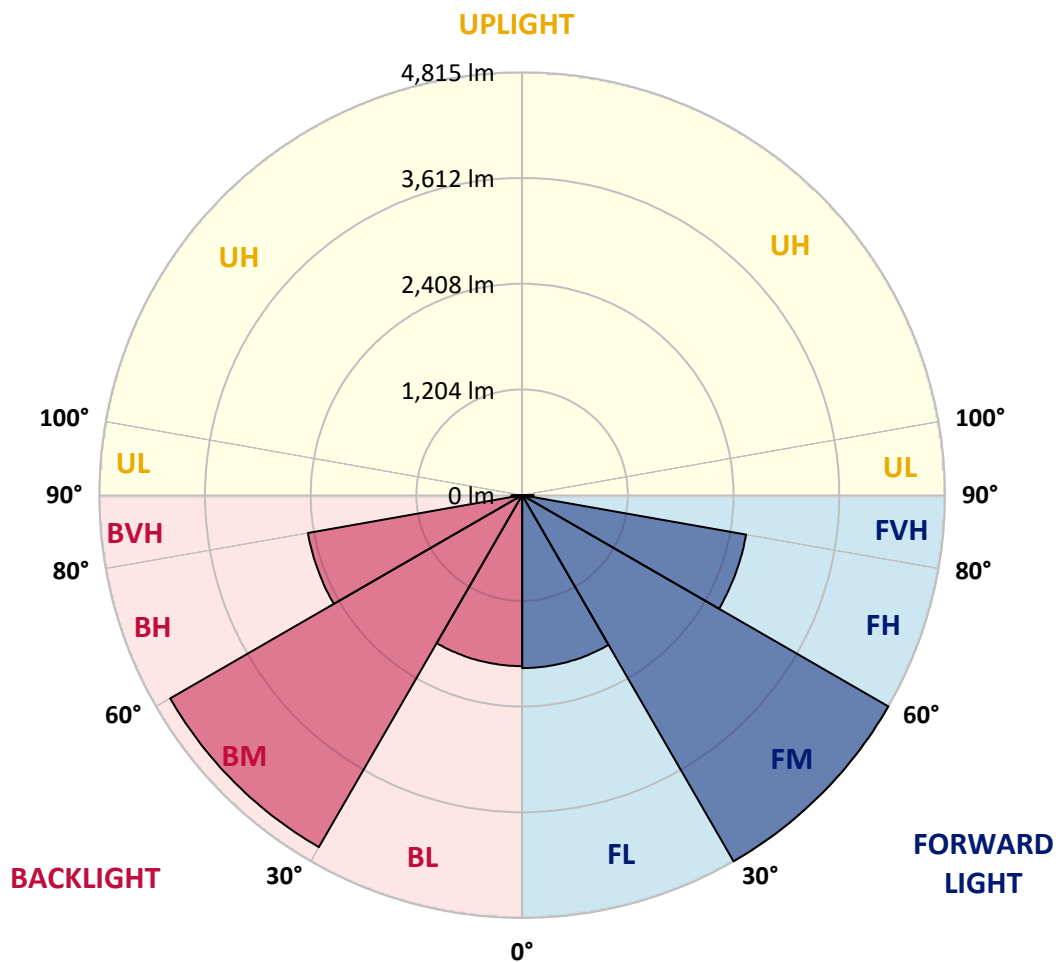
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**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	1969.4	10.5			
FM (30°-60°)	4815.4	25.8			
FH (60°-80°)	2589.6	13.9			G2/5000
FVH (80°-90°)	131.3	0.7			G2/225
BL (0°-30°)	1946.9	10.4	B3/2500		
BM (30°-60°)	4629.0	24.8	B3/5000		
BH (60°-80°)	2477.3	13.3	B3/2500		G3/2500
BVH (80°-90°)	120.8	0.6			G2/225
UL (90°-100°)	0.0	0.0		U0/0	
UH (100°-180°)	0.0	0.0		U0/0	

**BUG Rating: B3-U0-G3**

Type I Short





REPORT NUMBER: P868780  
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**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	45°	55°	65°	75°	85°	89°
0°	4551.3	4551.3	4551.3	4551.3	4551.3	4551.3	4551.3	4551.3	4551.3	4551.3	4551.3
2.5°	4569.2	4569.2	4558.4	4540.5	4536.9	4540.5	4562.0	4551.3	4551.3	4554.9	4551.3
5°	4569.2	4569.2	4562.0	4544.1	4544.1	4544.1	4569.2	4558.4	4562.0	4565.6	4565.6
7.5°	4576.4	4576.4	4569.2	4554.9	4554.9	4554.9	4590.7	4583.6	4583.6	4594.3	4587.1
10°	4594.3	4587.1	4580.0	4583.6	4572.8	4590.7	4608.7	4612.2	4626.6	4633.8	4630.2
12.5°	4594.3	4587.1	4569.2	4590.7	4590.7	4615.8	4640.9	4655.3	4673.2	4673.2	4673.2
15°	4572.8	4565.6	4551.3	4587.1	4601.5	4633.8	4669.6	4691.2	4723.4	4723.4	4719.8
17.5°	4547.7	4536.9	4529.8	4583.6	4615.8	4658.9	4712.7	4741.4	4777.2	4780.8	4773.6
20°	4501.1	4497.5	4501.1	4572.8	4630.2	4691.2	4755.7	4795.2	4841.8	4856.1	4845.4
22.5°	4450.9	4450.9	4465.2	4562.0	4651.7	4734.2	4820.3	4870.5	4917.1	4931.4	4917.1
25°	4382.7	4382.7	4411.4	4526.2	4658.9	4780.8	4881.2	4949.4	4992.4	5006.8	4999.6
27.5°	4278.7	4278.7	4311.0	4454.4	4637.4	4816.7	4945.8	5024.7	5071.3	5085.7	5078.5
30°	4131.7	4124.5	4167.5	4346.8	4597.9	4856.1	5021.1	5103.6	5164.6	5175.3	5164.6
32.5°	3898.5	3909.3	3973.8	4199.8	4533.3	4881.2	5110.8	5207.6	5275.8	5297.3	5290.1
35°	3615.2	3633.1	3722.8	4013.3	4411.4	4877.6	5204.0	5322.4	5412.0	5440.7	5437.1
37.5°	3278.1	3303.2	3414.4	3755.1	4228.5	4823.9	5290.1	5451.5	5569.8	5605.7	5612.9
40°	2908.7	2933.8	3077.2	3453.8	3981.0	4698.3	5340.3	5598.5	5756.3	5828.1	5838.8
42.5°	2517.7	2560.8	2732.9	3098.7	3683.3	4497.5	5340.3	5742.0	5935.7	6068.4	6079.1
45°	2141.1	2177.0	2385.0	2743.7	3364.1	4239.3	5279.3	5885.5	6179.6	6409.1	6401.9
47.5°	1814.8	1825.5	2015.6	2377.9	3009.1	3945.2	5153.8	6014.6	6437.8	6742.6	6807.2
50°	1477.6	1502.7	1664.1	2022.8	2646.8	3622.4	4942.2	6097.1	6703.2	7165.8	7248.3
52.5°	1240.9	1244.5	1366.5	1696.4	2270.3	3231.4	4687.6	6118.6	6957.8	7624.9	7725.3
55°	1011.4	1029.3	1133.3	1380.8	1908.0	2847.7	4357.6	6086.3	7190.9	8069.6	8256.1
57.5°	867.9	871.5	946.8	1144.1	1610.3	2438.8	3991.8	5978.7	7384.6	8561.0	8797.7
60°	746.0	746.0	803.4	954.0	1301.9	2040.7	3561.4	5788.6	7492.2	9088.2	9432.5
62.5°	649.2	652.7	703.0	814.1	1083.1	1685.7	3088.0	5490.9	7531.7	9597.5	9992.0
65°	588.2	591.8	620.5	695.8	893.0	1370.0	2603.8	5128.7	7477.9	9977.7	10490.5
67.5°	487.8	491.4	541.6	598.9	742.4	1101.1	2116.0	4626.6	7259.1	10096.0	10723.7
70°	373.0	383.8	451.9	512.9	616.9	878.7	1624.7	3963.1	6735.5	9694.3	10339.9
72.5°	312.0	315.6	365.8	434.0	516.5	688.6	1233.8	3120.3	5939.3	8657.8	9375.1
75°	272.6	276.2	304.9	365.8	430.4	552.3	857.2	2155.5	4737.8	7000.9	7657.2
77.5°	247.5	251.1	258.2	308.4	362.2	426.8	606.1	1280.4	3342.6	5351.1	5695.4
80°	236.7	236.7	218.8	254.6	297.7	333.5	405.3	735.2	2144.7	3608.0	3884.2
82.5°	168.6	165.0	150.6	157.8	182.9	182.9	208.0	304.9	821.3	1524.3	1653.4
85°	10.8	10.8	17.9	21.5	32.3	43.0	53.8	71.7	208.0	283.3	294.1
87.5°	3.6	3.6	3.6	3.6	3.6	7.2	7.2	7.2	10.8	14.3	14.3
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: P868780

CATALOG NUMBER: EMM2-HSN-SA3B-730-U-T1

**CANDELA DISTRIBUTION (continued):**

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	4551.3	4551.3	4551.3	4551.3	4551.3	4551.3	4551.3	4551.3	4551.3	4551.3	4551.3
2.5°	4547.7	4551.3	4551.3	4558.4	4565.6	4562.0	4558.4	4565.6	4554.9	4533.3	4529.8
5°	4562.0	4562.0	4558.4	4565.6	4572.8	4565.6	4558.4	4558.4	4551.3	4529.8	4526.2
7.5°	4590.7	4587.1	4587.1	4587.1	4587.1	4576.4	4565.6	4558.4	4547.7	4526.2	4515.4
10°	4630.2	4626.6	4623.0	4619.4	4601.5	4590.7	4572.8	4562.0	4547.7	4522.6	4515.4
12.5°	4673.2	4666.0	4658.9	4662.5	4626.6	4594.3	4576.4	4551.3	4540.5	4483.1	4472.4
15°	4716.3	4705.5	4701.9	4687.6	4651.7	4605.1	4569.2	4533.3	4497.5	4443.7	4425.7
17.5°	4773.6	4766.5	4744.9	4730.6	4680.4	4615.8	4562.0	4511.8	4465.2	4400.6	4389.9
20°	4841.8	4834.6	4813.1	4784.4	4719.8	4640.9	4565.6	4486.7	4429.3	4354.0	4336.1
22.5°	4917.1	4906.3	4888.4	4856.1	4773.6	4680.4	4576.4	4472.4	4386.3	4300.2	4289.5
25°	4996.0	4988.8	4970.9	4924.3	4834.6	4719.8	4576.4	4422.2	4314.6	4239.3	4207.0
27.5°	5071.3	5067.7	5046.2	4992.4	4899.2	4748.5	4544.1	4339.7	4196.2	4095.8	4074.3
30°	5168.2	5161.0	5135.9	5074.9	4970.9	4766.5	4479.5	4199.8	4020.5	3909.3	3877.0
32.5°	5286.5	5279.3	5243.5	5168.2	5057.0	4770.1	4386.3	4020.5	3783.8	3665.4	3626.0
35°	5444.3	5430.0	5383.3	5293.7	5139.5	4734.2	4221.3	3790.9	3500.4	3346.2	3292.4
37.5°	5616.5	5598.5	5537.6	5426.4	5196.8	4637.4	3988.2	3482.5	3152.5	2969.6	2930.2
40°	5828.1	5803.0	5709.7	5555.5	5218.4	4468.8	3726.4	3166.9	2815.4	2614.6	2567.9
42.5°	6093.5	6050.4	5899.8	5699.0	5175.3	4239.3	3414.4	2840.5	2438.8	2252.3	2241.6
45°	6412.7	6344.5	6118.6	5838.8	5082.1	3952.3	3084.4	2474.7	2090.9	1908.0	1861.4
47.5°	6789.3	6706.8	6373.2	5946.4	4899.2	3658.2	2729.3	2119.6	1768.1	1581.6	1545.8
50°	7205.3	7126.4	6642.2	6007.4	4701.9	3313.9	2381.4	1804.0	1452.5	1298.3	1298.3
52.5°	7711.0	7531.7	6900.4	6014.6	4400.6	2933.8	2047.9	1495.6	1219.4	1083.1	1054.4
55°	8249.0	8037.4	7133.6	5950.0	4088.6	2585.9	1689.2	1244.5	1000.6	903.8	878.7
57.5°	8847.9	8525.1	7302.1	5820.9	3694.1	2205.7	1409.5	1025.7	842.8	763.9	753.2
60°	9450.4	9034.4	7402.5	5602.1	3274.5	1854.2	1172.8	857.2	724.5	667.1	656.3
62.5°	10009.9	9450.4	7409.7	5282.9	2865.6	1545.8	961.2	738.8	642.0	598.9	598.9
65°	10494.1	9798.3	7287.8	4874.1	2345.6	1240.9	792.6	624.1	559.5	512.9	502.1
67.5°	10730.8	9931.0	7072.6	4314.6	1879.3	982.7	667.1	541.6	480.6	408.9	401.7
70°	10397.3	9547.3	6520.3	3597.3	1452.5	781.9	555.9	462.7	401.7	340.7	333.5
72.5°	9332.1	8525.1	5627.2	2786.7	1093.9	631.2	462.7	394.5	330.0	297.7	290.5
75°	7635.7	7090.5	4447.3	1918.8	763.9	494.9	387.3	333.5	279.7	265.4	261.8
77.5°	5795.8	5272.2	3249.4	1201.5	523.6	387.3	330.0	283.3	243.9	254.6	247.5
80°	3869.8	3629.5	2159.1	681.4	351.5	283.3	251.1	208.0	186.5	215.2	208.0
82.5°	1757.4	1664.1	1015.0	297.7	157.8	121.9	86.1	64.6	50.2	46.6	53.8
85°	294.1	258.2	71.7	32.3	17.9	10.8	7.2	7.2	3.6	3.6	3.6
87.5°	14.3	10.8	10.8	7.2	3.6	3.6	3.6	3.6	3.6	0.0	0.0
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



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

Report Prepared for

Cooper Lighting Solutions

Streetworks

Report Number: SP1-2407-157-4

Test Date: 08/07/2024

Luminaire Tested: MEM2-HTN-SA-40-730-U-5WQ-2

Data in this report applies to families of products including MEM2-HTN-SA-40-730-U-5WQ-2

**Test Information**

Test Method: LM-79-2019  
 Report Number: SP1-2407-157-4  
 Test Lab: COOPER LIGHTING SOLUTIONS  
 Photometer: SP1 - 76IN SPHERE  
 Measurement Geometry:  $4\pi$   
 Issue Date: 08/20/2024  
 Manufacturer: COOPER LIGHTING SOLUTIONS  
 Product Line: Streetworks  
 Catalog Number: **MEM2-HTN-SA-40-730-U-5WQ-2**  
 Description: Epic Modern Light Square 40W 5WQ Optic and Flare Trim

**Spectral Parameters**

CCT (K): 3057  
 CIE u': 0.2487  
 CIE v': 0.5199  
 Duv: -0.0002  
 CIE x: 0.4326  
 CIE y: 0.4020  
 CIE z: 0.1654  
 Peak Wavelength (nm): 593  
 Dominant Wavelength (nm): 582  
 Purity: 50.50735  
 Rf: 74.6  
 Rg: 94

CRI (Ra):	71.7		
R1:	68.1	R9:	-34.8
R2:	82.0	R10:	58.5
R3:	93.5	R11:	62.5
R4:	67.5	R12:	47.5
R5:	67.2	R13:	70.7
R6:	74.9	R14:	96.4
R7:	77.4	R15:	60.0
R8:	43.1		



**Test Conditions**

Stabilization Time: 21M  
 Operation Time: 1H 21M  
 Sphere Temperature (°C): 24.2

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Measurement and Test Equipment			
Instrument	Identification Number	Calibration Date	Calibration Due Date
Photometer	IN0058	6/18/2024	12/18/2024
Power Meter	INXT2011004	2/8/2024	2/8/2025
AC Power Source	IN0063	10/24/2023	10/24/2024
DC Power Source	IN0208	10/24/2023	10/24/2024
Sphere Thermometer	IN0085	10/24/2023	10/24/2024
Room Thermometer	IN0046	10/24/2023	10/24/2024

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CIE 1931 Chromaticity Diagram



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



Point lies inside the ANSI 3000K 4-step quadrangle

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**Photopic Flux vs. Wavelength**



**Photopic Lumens: NR**

$\lambda$ (nm)	Power W <sup>^</sup> /nm	Lumens ( $\phi$ /nm)	$\lambda$ (nm)	Power W <sup>^</sup> /nm	Lumens ( $\phi$ /nm)	$\lambda$ (nm)	Power W <sup>^</sup> /nm	Lumens ( $\phi$ /nm)	$\lambda$ (nm)	Power W <sup>^</sup> /nm	Lumens ( $\phi$ /nm)	$\lambda$ (nm)	Power W <sup>^</sup> /nm	Lumens ( $\phi$ /nm)
360	0	NR	490	104	NR	620	818	NR	750	20	NR	880	1	NR
365	0	NR	495	135	NR	625	755	NR	755	17	NR	885	0	NR
370	0	NR	500	184	NR	630	691	NR	760	15	NR	890	0	NR
375	0	NR	505	247	NR	635	625	NR	765	13	NR	895	0	NR
380	0	NR	510	309	NR	640	561	NR	770	11	NR	900	0	NR
385	0	NR	515	369	NR	645	499	NR	775	9	NR	905	0	NR
390	0	NR	520	419	NR	650	441	NR	780	8	NR	910	0	NR
395	0	NR	525	460	NR	655	388	NR	785	7	NR	915	0	NR
400	1	NR	530	492	NR	660	338	NR	790	6	NR	920	0	NR
405	3	NR	535	524	NR	665	294	NR	795	5	NR	925	0	NR
410	7	NR	540	553	NR	670	253	NR	800	4	NR	930	0	NR
415	15	NR	545	588	NR	675	218	NR	805	4	NR	935	0	NR
420	31	NR	550	625	NR	680	188	NR	810	3	NR	940	0	NR
425	60	NR	555	670	NR	685	161	NR	815	3	NR	945	0	NR
430	107	NR	560	723	NR	690	139	NR	820	3	NR	950	0	NR
435	183	NR	565	780	NR	695	118	NR	825	2	NR	955	0	NR
440	289	NR	570	837	NR	700	100	NR	830	2	NR	960	0	NR
445	460	NR	575	894	NR	705	85	NR	835	2	NR	965	0	NR
450	646	NR	580	942	NR	710	73	NR	840	1	NR	970	0	NR
455	561	NR	585	976	NR	715	62	NR	845	1	NR	975	0	NR
460	331	NR	590	998	NR	720	53	NR	850	1	NR	980	0	NR
465	238	NR	595	1000	NR	725	45	NR	855	1	NR	985	0	NR
470	178	NR	600	990	NR	730	39	NR	860	1	NR	990	0	NR
475	120	NR	605	962	NR	735	33	NR	865	1	NR	995	0	NR
480	96	NR	610	925	NR	740	28	NR	870	1	NR	1000	0	NR
485	95	NR	615	873	NR	745	24	NR	875	1	NR			

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**Scotopic Flux vs. Wavelength**



**Scotopic Lumens: NR**

**S/P: 1.23**

$\lambda$ (nm)	Power W <sup>^</sup> /nm	Lumens ( $\phi$ /nm)	$\lambda$ (nm)	Power W <sup>^</sup> /nm	Lumens ( $\phi$ /nm)	$\lambda$ (nm)	Power W <sup>^</sup> /nm	Lumens ( $\phi$ /nm)	$\lambda$ (nm)	Power W <sup>^</sup> /nm	Lumens ( $\phi$ /nm)	$\lambda$ (nm)	Power W <sup>^</sup> /nm	Lumens ( $\phi$ /nm)
360	0	NR	490	104	NR	620	818	NR	750	20	NR	880	1	NR
365	0	NR	495	135	NR	625	755	NR	755	17	NR	885	0	NR
370	0	NR	500	184	NR	630	691	NR	760	15	NR	890	0	NR
375	0	NR	505	247	NR	635	625	NR	765	13	NR	895	0	NR
380	0	NR	510	309	NR	640	561	NR	770	11	NR	900	0	NR
385	0	NR	515	369	NR	645	499	NR	775	9	NR	905	0	NR
390	0	NR	520	419	NR	650	441	NR	780	8	NR	910	0	NR
395	0	NR	525	460	NR	655	388	NR	785	7	NR	915	0	NR
400	1	NR	530	492	NR	660	338	NR	790	6	NR	920	0	NR
405	3	NR	535	524	NR	665	294	NR	795	5	NR	925	0	NR
410	7	NR	540	553	NR	670	253	NR	800	4	NR	930	0	NR
415	15	NR	545	588	NR	675	218	NR	805	4	NR	935	0	NR
420	31	NR	550	625	NR	680	188	NR	810	3	NR	940	0	NR
425	60	NR	555	670	NR	685	161	NR	815	3	NR	945	0	NR
430	107	NR	560	723	NR	690	139	NR	820	3	NR	950	0	NR
435	183	NR	565	780	NR	695	118	NR	825	2	NR	955	0	NR
440	289	NR	570	837	NR	700	100	NR	830	2	NR	960	0	NR
445	460	NR	575	894	NR	705	85	NR	835	2	NR	965	0	NR
450	646	NR	580	942	NR	710	73	NR	840	1	NR	970	0	NR
455	561	NR	585	976	NR	715	62	NR	845	1	NR	975	0	NR
460	331	NR	590	998	NR	720	53	NR	850	1	NR	980	0	NR
465	238	NR	595	1000	NR	725	45	NR	855	1	NR	985	0	NR
470	178	NR	600	990	NR	730	39	NR	860	1	NR	990	0	NR
475	120	NR	605	962	NR	735	33	NR	865	1	NR	995	0	NR
480	96	NR	610	925	NR	740	28	NR	870	1	NR	1000	0	NR
485	95	NR	615	873	NR	745	24	NR	875	1	NR			

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**Melanopic Flux vs. Wavelength**



**Melanopic Lumens: NR**

**M/P: 2.27**

λ (nm)	Power W <sup>^</sup> /nm	Lumens (φ/nm)	λ (nm)	Power W <sup>^</sup> /nm	Lumens (φ/nm)	λ (nm)	Power W <sup>^</sup> /nm	Lumens (φ/nm)	λ (nm)	Power W <sup>^</sup> /nm	Lumens (φ/nm)	λ (nm)	Power W <sup>^</sup> /nm	Lumens (φ/nm)
360	0	NR	490	104	NR	620	818	NR	750	20	NR	880	1	NR
365	0	NR	495	135	NR	625	755	NR	755	17	NR	885	0	NR
370	0	NR	500	184	NR	630	691	NR	760	15	NR	890	0	NR
375	0	NR	505	247	NR	635	625	NR	765	13	NR	895	0	NR
380	0	NR	510	309	NR	640	561	NR	770	11	NR	900	0	NR
385	0	NR	515	369	NR	645	499	NR	775	9	NR	905	0	NR
390	0	NR	520	419	NR	650	441	NR	780	8	NR	910	0	NR
395	0	NR	525	460	NR	655	388	NR	785	7	NR	915	0	NR
400	1	NR	530	492	NR	660	338	NR	790	6	NR	920	0	NR
405	3	NR	535	524	NR	665	294	NR	795	5	NR	925	0	NR
410	7	NR	540	553	NR	670	253	NR	800	4	NR	930	0	NR
415	15	NR	545	588	NR	675	218	NR	805	4	NR	935	0	NR
420	31	NR	550	625	NR	680	188	NR	810	3	NR	940	0	NR
425	60	NR	555	670	NR	685	161	NR	815	3	NR	945	0	NR
430	107	NR	560	723	NR	690	139	NR	820	3	NR	950	0	NR
435	183	NR	565	780	NR	695	118	NR	825	2	NR	955	0	NR
440	289	NR	570	837	NR	700	100	NR	830	2	NR	960	0	NR
445	460	NR	575	894	NR	705	85	NR	835	2	NR	965	0	NR
450	646	NR	580	942	NR	710	73	NR	840	1	NR	970	0	NR
455	561	NR	585	976	NR	715	62	NR	845	1	NR	975	0	NR
460	331	NR	590	998	NR	720	53	NR	850	1	NR	980	0	NR
465	238	NR	595	1000	NR	725	45	NR	855	1	NR	985	0	NR
470	178	NR	600	990	NR	730	39	NR	860	1	NR	990	0	NR
475	120	NR	605	962	NR	735	33	NR	865	1	NR	995	0	NR
480	96	NR	610	925	NR	740	28	NR	870	1	NR	1000	0	NR
485	95	NR	615	873	NR	745	24	NR	875	1	NR			

**Summary**

$R_f = 74.6$   
 $R_g = 94$   
 $CIE R_a = 71.7$   
 $R_9 = -34.8$



**Color Vector Graphics**





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

CES01 = 86	CES26 = 65	CES51 = 87	CES76 = 58
CES02 = 62	CES27 = 89	CES52 = 85	CES77 = 76
CES03 = 31	CES28 = 84	CES53 = 77	CES78 = 61
CES04 = 71	CES29 = 68	CES54 = 85	CES79 = 86
CES05 = 49	CES30 = 83	CES55 = 84	CES80 = 83
CES06 = 51	CES31 = 71	CES56 = 74	CES81 = 73
CES07 = 41	CES32 = 64	CES57 = 74	CES82 = 93
CES08 = 40	CES33 = 78	CES58 = 75	CES83 = 91
CES09 = 29	CES34 = 75	CES59 = 85	CES84 = 88
CES10 = 76	CES35 = 87	CES60 = 90	CES85 = 75
CES11 = 59	CES36 = 92	CES61 = 81	CES86 = 64
CES12 = 65	CES37 = 84	CES62 = 89	CES87 = 77
CES13 = 43	CES38 = 92	CES63 = 75	CES88 = 80
CES14 = 74	CES39 = 96	CES64 = 65	CES89 = 67
CES15 = 71	CES40 = 92	CES65 = 64	CES90 = 80
CES16 = 47	CES41 = 93	CES66 = 60	CES91 = 78
CES17 = 50	CES42 = 86	CES67 = 58	CES92 = 56
CES18 = 56	CES43 = 77	CES68 = 66	CES93 = 73
CES19 = 73	CES44 = 99	CES69 = 75	CES94 = 49
CES20 = 66	CES45 = 85	CES70 = 60	CES95 = 66
CES21 = 87	CES46 = 81	CES71 = 56	CES96 = 76
CES22 = 79	CES47 = 86	CES72 = 85	CES97 = 82
CES23 = 92	CES48 = 75	CES73 = 52	CES98 = 76
CES24 = 91	CES49 = 79	CES74 = 95	CES99 = 64
CES25 = 73	CES50 = 86	CES75 = 60	



Color Rendition by Hue-Angle Bin



Measure Comparisons



(END OF REPORT)