

FPR1-LED-CM

LED CEILING MOUNT CYLINDER

Catalog Number:

Project Name:

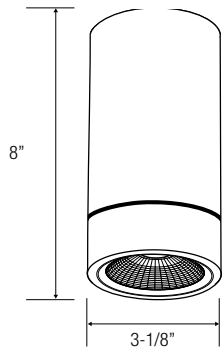
Note:

Type:

UPTO
2200
LUMENS



DIMENSIONS:



PERFORMANCE:

Available in nine color temperatures ((CW) Crisp White*, (RG) Red Glow*, (WDM) Warm Dim and 2700K, 3000K, 3500K, 4000K and 5000K .

Crisp White is ideal for most retail applications. Our Crisp White technology is designed to accentuate the full spectrum to make cool tones such as blues and greens to be vibrant, and warm tones such as red and orange to be vivid.

Red Glow technology is designed to be used in restaurants and grocery stores, especially to show products in the produce, meat, fish, and poultry departments.

Warm Dim Warm Dim with Smart Dim technology mimics traditional incandescent halogen lighting through dimming. Using Warm Dim, luminaires dim smoothly from 3000K to 1800K. Warm Dim shifts smoothly over the black body radiator curve as the light dims you move into the rich amber tones that encourages relaxation. It is ideal for hospitality, architectural as well as residential applications, all while maintaining high lumen output for the most stringent energy codes today's legislation requires. Warm Dim comes paired with high CRI of 90+ and superior lumen output.

High color rendering of 90+ CRI and guaranteed color consistency within a 2 step MacAdams Ellipse. Guaranteed color consistency within a 2 step MacAdams Ellipse.

Guaranteed lumen maintenance of 70% at 50,000 hours and tested to LM-79 and LM-80 standards by an independent laboratory.

Pendants available in variety of delivered lumen options based on series: 1200L, 1800L and 2200L.

OPTICS:

Optics are field changeable and available in (NS) Narrow Spot, (FL) Flood, and (WFL) Wide Flood Options

AVAILABLE COLORS OPTION:

Post painted powder coated extruded aluminum body is available in white or black. Please consult factory for custom paint color options

DIMMING:

The FUSION LED system can be ordered for a full range of dimming down to 1% of initial light output with a 0-10V dimmer when ordered with the following options (DIM10-120, DIM10-277) LED drivers are rated for 60Hz at 120V/277V input and produce less than 20% THD, and a power factor between 90% and 100%

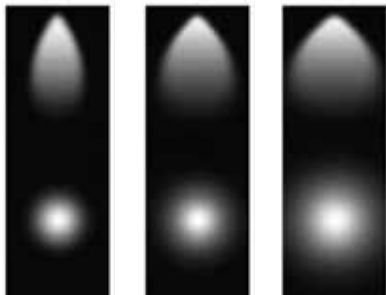
WARRANTY:

All Fusion Cylinders and Pendants are designed using a proprietary coolLED Advanced Thermodynamic Design Heat management systems are engineered for extremely long life and service period.

Fusion Cylinders and Pendants luminaires are covered by Fusion's one year limited warranty. As a system, we stand behind our entire products from housing to bar hangers.



OPTICS



Narrow Spot
12° - 16°

Flood
20° - 30°

Wide Flood
30° - 40°

Example: FPR1-LED-CM-2200L-DIM10-MVOLT-WFL-30K-90-WH

SERIES	LUMENS/DIMMING	OPTICS	CCT/CRI		COLOR
			VIBRANT SERIES	STANDARD SERIES	
FPR1-LED-CM	<input type="checkbox"/> 1200L-DIMTR-120 <input type="checkbox"/> 1200L-DIM10-MVOLT <input type="checkbox"/> 1800L-DIMTR-120 <input type="checkbox"/> 1800L-DIM10-MVOLT <input type="checkbox"/> 2200L-DIMTR-120 <input type="checkbox"/> 2200L-DIM10-MVOLT	<input type="checkbox"/> NS (15°) <input type="checkbox"/> FL (30°) <input type="checkbox"/> WFL (38°)	<input type="checkbox"/> WDM-30K-18K <input type="checkbox"/> CW(42K/96/93) <input type="checkbox"/> RG(37K/66)	<input type="checkbox"/> 27K-90 <input type="checkbox"/> 30K-90 <input type="checkbox"/> 35K-90 <input type="checkbox"/> 40K-90 <input type="checkbox"/> 50K-90	<input type="checkbox"/> BK(Black) <input type="checkbox"/> WH(White) <i>Custom colors available. Please consult factory</i>

SPECIFICATIONS:

FPR1-LED-CM — — — —
 LUMEN/DIMMING OPTICS CCT/CRI COLOR

Example: FPR1-LED-CM-2000L-DIM10-MVOLT-WFL-30K-90-WH



Submittal form is available @ www.iuseelite.com
 Tel: 323-888-1973 • Fax: 323-888-1977

Specifications and Dimensions subject to change without notice.

Issued-F1418-Rev. 5

PHOTOMETRY DATA

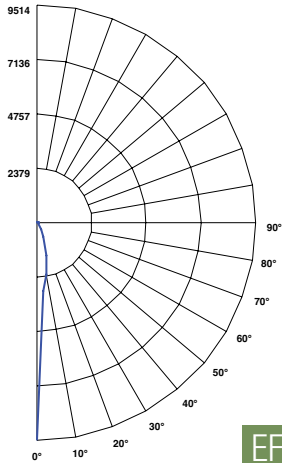
FP1-LED-CM-1200L-DIM10-MVOLT-NS-40K-90-WH

WATTAGE: 13.8

LUMENS: 1283

TOTAL LUMINAIRE EFFICACY: 93

Candle Power Distribution (Candelas)



Zonal Lumens Summary

Zone	Lumens	%Lamp	%Fixt
0-30°	1203.85	99.50	93.80
0-40°	1254.07	103.60	97.80
0-60°	1275.06	105.40	99.40
0-90°	1282.82	106.00	100.00
0-180°	1282.82	106.00	100.00

Luminance Data (cd/sq.m)

Angle In Degrees	Average		Average	
	0°	45°	90°	90°
45°	3777	2590	2340	
55°	1191	1211	1118	
65°	1212	988	1153	
75°	1388	1152	1149	
85°	2584	2268	928	

Candela Tabulation

	0	45	90
0	9514.420	9514.420	9514.420
5	3041.309	5184.532	7548.325
15	1521.782	1385.445	1612.688
25	387.881	400.241	500.566
35	51.502	46.991	40.531
45	21.239	14.568	13.159
55	5.435	5.523	5.100
65	4.074	3.322	3.876
75	2.857	2.372	2.365
85	1.791	1.572	0.643
90	1.258	1.196	0.034

Spacing Criteria

0-180	: 0.14
90-270	: 0.30
Diagonal	: 0.30

EFFICACY: 93 LM/W

Coefficients of Utilization - Zonal Cavity Method

Effective Floor Cavity Reflectance 20% = PF

RC	RW	80%				70%				50%				30%				10%				0%			
		70%	50%	30%	10%	70%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0%			
0	126	126	126	126	123	123	123	123	118	118	118	113	113	113	108	108	108	106	105	104	102				
1	122	119	117	116	119	117	115	114	113	112	110	109	108	107	106	105	104	102	101	100	98				
2	118	114	110	108	115	112	109	106	109	106	104	106	104	102	103	101	100	98	96	95					
3	114	109	105	102	112	107	104	101	105	102	99	102	100	98	100	98	96	95	92	90					
4	110	104	100	97	108	103	99	96	101	98	95	99	96	94	97	95	93	92	90	89					
5	107	100	96	93	105	99	95	92	98	94	91	96	93	91	95	92	90	89	89						
6	104	97	92	89	102	96	92	89	95	91	88	93	90	88	92	89	87	86	86						
7	101	94	89	86	99	93	89	86	92	88	85	91	87	85	90	87	84	83	83						
8	98	91	86	83	97	90	86	83	89	85	83	88	85	82	87	84	82	81	81						
9	95	88	83	80	94	87	83	80	87	83	80	86	82	80	85	82	80	79	79						
10	93	85	81	78	92	85	81	78	84	80	78	84	80	78	83	80	77	77	77						

RC - Ceiling Cavity Reflectance

RW - Wall Reflectance

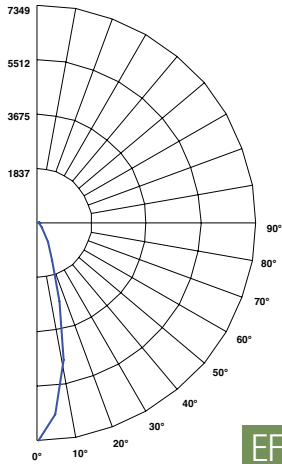
FP1-LED-CM-1800L-DIM10-MVOLT-FL-40K-90-WH

WATTAGE: 21.7

LUMENS: 1862

TOTAL LUMINAIRE EFFICACY: 86

Candle Power Distribution (Candelas)



Zonal Lumens Summary

Zone	Lumens	%Lamp	%Fixt
0-30°	1749.14	96.60	93.90
0-40°	1819.66	100.50	97.70
0-60°	1852.14	102.30	99.50
0-90°	1862.22	102.90	100.00
0-180°	1862.22	102.90	100.00

Luminance Data (cd/sq.m)

Angle In Degrees	Average		Average	
	0°	45°	90°	90°
45°	3666	4355	9636	
55°	1640	2085	2229	
65°	1377	1419	1877	
75°	1409	1695	1817	
85°	1197	3275	3534	

Candela Tabulation

	0	45	90
0	7349.16	7349.16	7349.16
5	6508.68	6397.64	6544.81
15	2736.30	2798.80	3095.35
25	721.22	707.91	788.33
35	57.16	74.76	138.36
45	20.62	24.49	54.19
55	7.48	9.51	10.17
65	4.63	4.77	6.31
75	2.90	3.49	3.74
85	0.83	2.27	2.45
90	0.05	1.68	1.80

Spacing Criteria

0-180	: 0.44
90-270	: 0.46
Diagonal	: 0.46

EFFICACY: 86 LM/W

Coefficients of Utilization - Zonal Cavity Method

Effective Floor Cavity Reflectance 20% = PF

RC	RW	80%				70%				50%				30%				10%				0%			
		70%	50%	30%	10%	70%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0%			
0	122	122	122	122	120	120	120	120	114	114	114	109	109	109	105	105	105	103	102	101	101				
1	118	116	114	112	116	114	112	110	109	108	107	106	105	104	102	101	101	99	98	97	95				
2	114	110	107	104	112	108	105	103	105	103	101	102	100	99	99	98	97	95	94	93	91				
3	110	105	101	98	108	104	100	97	101	98	96	99	96	94	96	94	93	91	90	89					
4	106	100	96	93	105	99	95	92	97	94	91	95	93	90	94	91	89	88	86	85					
5	103	96	92	89	101	96	91	88	94	90	88	92	89	87	91	88	86	85	85						
6	100	93	88	85	98	92	88	85	91	87	84	89	86	84	88	85	83	82	82						
7	97	90	85	82	95	89	85	82	88	84	81	87	83	81	86	83	81	79	79						
8	94	87	82	79	93	86	82	79	85	81	79	84	81	78	83	80	78	77	77						
9	91	84	79	76	90	83	79	76	83	79	76	82	78	76	81	78	76	75	75						
10	88	81	77	74	88	81	77	74	80	76	74	79	76	74	79	76	73	72	72						

RC - Ceiling Cavity Reflectance

RW - Wall Reflectance

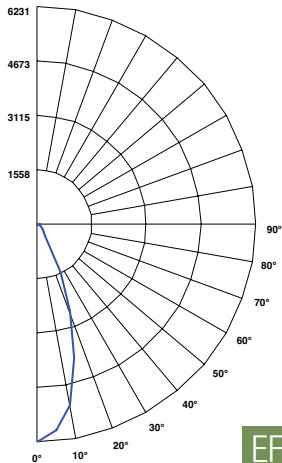
FP1-LED-CM-2200L-DIM10-MVOLT-WFL-40K-90-WH

WATTAGE: 33

LUMENS: 2570

TOTAL LUMINAIRE EFFICACY: 78

Candle Power Distribution (Candelas)



Zonal Lumens Summary

Zone	Lumens	%Lamp	%Fixt
0-30°	2352.46	93.10	91.50
0-40°	2495.91	98.80	97.10
0-60°	2555.51	101.10	99.40
0-90°	2570.21	101.70	100.00
0-180°	2570.21	101.70	100.00

Luminance Data (cd/sq.m)

Angle In Degrees	Average		Average	
	0°	45°	90°	90°
45°	16071	4988	4604	
55°	2865	2601	2283	
65°	2194	1703	1608	
75°	1862	1622	1431	
85°	3535	3093	634	

Candela Tabulation

	0	45	90
0	6230.57	6230.57	6230.57
5	5922.98	5958.19	6041.84
15	3958.39	4150.78	4243.61
25	1523.91	1408.26	1477.61
35	304.71	154.69	104.77
45	115.08	35.72	32.97
55	16.64	15.11	13.26
65	9.39	7.29	6.88
75	4.88	4.25	3.75
85	3.12	2.73	0.56
90	2.23	2.04	0.08

Spacing Criteria

0-180	: 0.60
90-270	: 0.62
Diagonal	: 0.60

EFFICACY: 78 LM/W

Coefficients of Utilization - Zonal Cavity Method

Effective Floor Cavity Reflectance 20% = PF

RC	RW	80%				70%				50%				30%				10%				0%			
		70%	50%	30%	10%	70%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0%			
0	121	121	121	121	118	118	118	118	113	113	113	108	10												