"We have well over one million models of Fusion in service and they perform as advertised. I like the fact that if there is any question, I can reach someone immediately at P-LED." Tod Lashley Production Manager, Sign Fab



Stoutland, MO

FUSION Series

Don't let your reputation depend upon yesterday's LED technology.

Principal LED's (P-LED) Fusion Series is designed to have the best possible heat dissipation by utilizing P-LED's proprietary Direct Mount (DM) technology. It also has specialized optics for even illumination in any sign type through a proprietary die encapsulated optic. The optic gives an almost full 180° lambertian emission angle from the module surface, and its size can fit into any channel letter.

HIGHLIGHTS

- Zero light loss after 6,000 hours of 3rd party testing
- Patented DM technology for maximum lifetime
- Quick Release Tab reduces labor time
- Optics Series for shallow or return mount applications
- Conformally coated to enhance water resistance (IP66)
- Available in 2, 3, or 4 modules per foot (150-300 LM/ft.)
- Available in custom CCTs of white and all colors
- Solder-free connections

The Fusion Series is the "go to" system for most channel letter applications.









SPECIFICATIONS

Dimensions	0.65"W x 1.5"L x 0.25"H 0.4"W x 2"L x 0.15"H (RGB)
Beam Angle	170°
Operating Temp.	-40 to +60°C
Intensity (White)	80 LM/module
Efficacy (White)	107 LM/W (system)
Power Supply	P-LED 12VDC
Fastening	Peel & Stick / Mechanical Screw Hole
Protection Grade	IP 66
Packaging	25 ft. per bag or 100 ft. per box
Warranty	5 year (Product) / 5 Year (Ltd Labor)

MAXIMUM COVERAGE CHART

Depth	Max. Stroke	Spacing (Multi-Rows)	Product
3"	4-5"	3″	FS3/FS4
4"	5-6"	4-5"	FS2/FS3
5"	6"	5″	FS2/FS3
6"	8"	6-7"	FS2/FS3/FS4
8"	12"	0-12"	FS3/FS4

^{*}Product and depth may vary depending on face material and desired brightness

PRODUCT COLORS

Color	Wavelength/ CCT (typical)	Lume	ens/ft.	Usa	ergy age ts/ft.)	Lo	Power oad Supply)	Fusion 2 (2 mods per ft)	Fusion 3 (3 mods per ft)
		Fusion	Fusion	Fusion	Fusion	Fusion	Fusion	P-LED	P-LED
		2	3	2	3	2	3	Part Number	Part Number
Red	625nm	28	42	1.2	1.8	50′	33′	PL-FS2-RD1-P	PL-FS3-RD1-P
Ruby Red	633	28	42	1.2	1.8	50′	33′	PL-FS2-RR1-P	PL-FS3-RR1-P
Amber	592	25	37	1.2	1.8	50′	33′	PL-FS2-AM1-P	PL-FS3-AM1-P
Orange	609	25	37	1.2	1.8	50′	33′	PL-FS2-OR1-P	PL-FS3-OR1-P
Blue	460	8	12	.84	1.26	70′	46′	PL-FS2-BL1-P	PL-FS3-BL1-P
Green	525	30	45	.84	1.26	70′	46′	PL-FS2-GR1-P	PL-FS3-GR1-P
RGB	RGB	N/A	N/A	1.5	N/A	40′	N/A	PL-FS2-RG1-N	N/A
Sign White	6500K	160	240	1.5	2.25	40′	26′	PL-FS2-WH1-P	PL-FS3-WH1-P
Med. White	4300K	160	240	1.5	2.25	40′	26′	PL-FS2-MW1-P	PL-FS3-MW1-P
Warm White	3500K	160	195	1.5	2.25	40′	26′	PL-FS2-WW1-P	PL-FS3-WW1-P

^{*}Sign White Fusion 2 has two bin codes: C6B and C6Y. The code will vary based on geographic location.











FUSION 4

Color	Wavelength/ CCT (typical)	Lumens/ft.	Energy Usage (Watts/ft.)	Power Load (60W Supply)	Part Number
Sign White	6500K*	320	3	20	PL-FS4-WH1-P

^{*}Custom CCTs available from (3000 – 12000K)



