



LR405 SERIES

Architectural Recessed
2X2 LED Volume Luminaire
Ultra-Shallow Design
CCEA Option Available

Fixture Type:

Job Information:

SPECIFICATIONS:

LED MODULES:

- High performance linear configured LED module boards.
- Each board consists of multiple mid-power, high efficacy LEDs in a precise layout eliminating the need for supplemental heat sinking.
- The boards produce an even and diffuse light which maximizes optical efficiency.
- Compatible with the dimming performance of the LED driver.
- Color temperatures available: 3000K, 3500K and 4000K.
- Upon request: 5000K.

LED DRIVERS:

- Factory programmable constant current LED power supply.
- Multiple standard drive current outputs (factory set by Mercury) are cataloged with their corresponding lumen package offerings. Upon request, custom drive current outputs and lumen packages are available.
- Note: Certain cataloged lumen packages may be provided with a non-programmable constant current LED power supply at Mercury's discretion. Contact factory if critical.
- Universal voltage input, 120V-277V, 50HZ-60HZ.
- Specification grade dimming down to 1% on 0-10V dimming controls.

LED LUMEN PACKAGES:

- Cataloged standard lumen packages. See attached chart for full details.
- Custom lumen packages pre-set are optional with programmable drivers only. Contact factory for details.

HOUSING:

- All metal parts are fabricated in a computer-controlled operation from heavy gauge code grade cold rolled steel.
- Housing designed to meet all Chicago plenum requirements.
- Rivets hold all parts together for strength and unity.
- A custom formulated non-glare white powder coating is applied to the housing after fabrication providing a reflectivity of at least 90%.

DIFFUSER:

- Architecturally-squared profile design.
- Extruded from custom formulated high transmission acrylic material.
- Linear ribbing for high LED performance.

STANDBY LIGHTING OPTION:

- Self contained module, 7W, 10W or 12W as specified. Battery backup upon loss of power.
- May not be available with some higher lumen packages. See Lumen Package matrix.

INSTALLATIONS:

- Designed for installation into NEMA Type G lay-in acoustical grid ceiling systems, 1" grid or 9/16" fine-line grid.
- For NEMA Type F dry wall applications an additional flange kit must be used with Type G housing.
- Four pry-out style grid support clips are located on the housing sides.
- Four auxiliary suspension points are also provided for securing to building structure.
- A single 7/8" hole for power connection is in accordance with Chicago Plenum requirements.
- Factory installed power whips as specified

CERTIFICATE OF SAFETY COMPLIANCE AND LISTINGS:

- Luminaire: UL and CUL listed 1598 and bears their label. Suitable for damp locations.
- Optional: Suitable for wet locations marking is available. Contact factory for all details.
- IC rated. (Some higher lumen packages may not qualify. See Lumen Package matrix).
- CCEA Option meets the City of Chicago Environmental Air Specifications.

WARRANTY:

- 5-year limited warranty is standard. Special 10-year warranty available on a job-to-job basis. Complete LED warranty terms available at www.mercltg.com.
- Actual performance may differ as a result of end-user environment and application.
- Most LED luminaires are suitable to operate in ambient temperatures from -20C (-4F) to 25C (77F).
- The following exclusions apply: Luminaires with optional standby lighting option, integral lighting controls options, or wireless control options. Consult factory.
- LM-79 testing was measured under a controlled 25C (77F) ambient operating temperature.

FEATURES:

- Ultra-shallow recessed 2X2 ambient LED luminaire featuring a single linear high transmission acrylic diffuser.
- CCEA option available
- Architecturally-squared diffuser envelops the LED light source allowing maximum light transmission while eliminating pixilations and hot spots.
- Delivers a balanced amount of horizontal and vertical illumination.
- Digital LED technology provides high efficacy and energy efficiency.
- Multiple power and light levels are offered as standard to allow meeting design and energy needs per application. Custom factory set levels available on request.
- Lumen maintenance; Reported L70 (hours) & L80 (hours) > 60,000.
- CRI greater than 80.
- Fixture lumens per watt ratios up to 133.
- American Made.



LR405 SERIES

Example: LR405-22G-3400-35K-1%-UNI-EM7

LR405 - 22G

SERIES	MODULE SIZE/ CEILING	NOMINAL LUMENS	COLOR TEMP	DRIVER	VOLTAGE	STANDBY LIGHTING OPTIONS*	OPTIONS
LR405	22G 2X2 Module/Nema Type G/Lay-In Grid, 1" or 9/16" Fine Line.	2200 2600 3000 3400 3800 4100 5200 7100	30K 35K 40K 50K Upon Request	1% 0-10V 1% Dimming As Specified	UNI	EM7 EM10 EM12	FLX 6Ft. Single Circuit Power Flex (Specify Voltage) FLX2 6Ft. 2-Circuit Power Flex (Specify Voltage) WL UL "Suitable for Wet Locations" labeled. CCEA City of Chicago Environmental Air Specifications
		XXXX Custom Lumen Package. Contact Factory.					

* All modules to be field mounted, factory wired with armored cable. Contact factory for more details.

LUMEN PACKAGE

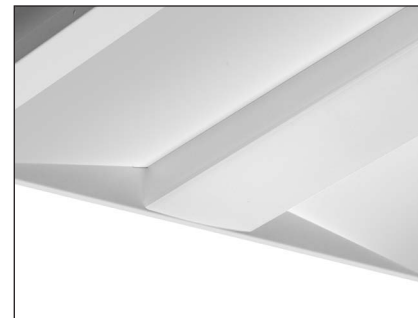
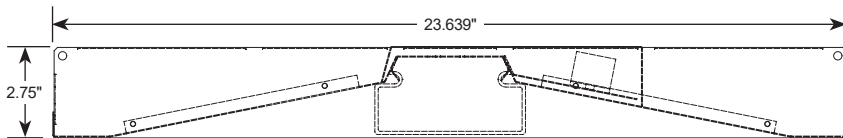
Series	Module Size	Nominal Lumen Package	Color	Fixture Power (W)	Delivered Lumens	Fixture LPW	IC Rated	Standby Lighting Option
LR405	2X2							
		2200	3000K	18	2151	120	✓	✓
		2200	3500K	18	2222	123	✓	✓
		2200	4000K	18	2242	125	✓	✓
		2200	5000K	18	2242	125	✓	✓
		2600	3000K	21	2538	121	✓	✓
		2600	3500K	21	2622	125	✓	✓
		2600	4000K	21	2646	126	✓	✓
		2600	5000K	21	2646	126	✓	✓
		3000	3000K	25	2918	117	✓	✓
		3000	3500K	25	3015	121	✓	✓
		3000	4000K	25	3042	122	✓	✓
		3000	5000K	25	3042	122	✓	✓
		3400	3000K	29	3291	113	✓	✓
		3400	3500K	29	3400	117	✓	✓
		3400	4000K	29	3432	118	✓	✓
		3400	5000K	29	3432	118	✓	✓
		3800	3000K	33	3710	112	✓	✓
		3800	3500K	33	3833	116	✓	✓
		3800	4000K	33	3868	117	✓	✓
		3800	5000K	33	3868	117	✓	✓
		4100	3000K	32	3965	124	✓	✓
		4100	3500K	32	4067	127	✓	✓
		4100	4000K	32	4137	129	✓	✓
		4100	5000K	32	4224	132	✓	✓
		5200	3000K	42	5054	120	✓	✓
		5200	3500K	42	5184	123	✓	✓
		5200	4000K	42	5272	126	✓	✓
		5200	5000K	42	5384	128	✓	✓
		7100	3000K	55	6855	125	✓	✓
		7100	3500K	55	7022	128	✓	✓
		7100	4000K	55	7121	129	✓	✓
		7100	5000K	55	7292	133	✓	✓

Actual wattage may differ by +/- 5% when operating between 120V-277V +/- 10%.

PHOTOMETRICS:

All photometric reports are available at www.mercltg.com.

CROSS SECTIONS:



Detail

