

GE  
Lumination

# Tetra<sup>®</sup> miniMAX

## LED Lighting System

Maximum **performance** in  
*small* channel letters



imagination at work

# Tetra® miniMAX

Maximized brightness & uniformity in a minimized size

# miniMAX

Now there is an LED solution that is perfect for shallow depth channel letters. **Tetra® miniMAX** LED Lighting System from GE Lumination delivers brighter, more uniform light across a greater surface area and uses less product per sign when compared to our previous generation, Tetra Mini, making Tetra miniMAX the new breakthrough in efficiency and performance. Sign OEMs and their customers achieve an impressive list of bottom-line benefits by choosing Tetra miniMAX.

## New OptiLens™ makes a BIG difference

Tetra miniMAX features OptiLens™, a remarkable technology that maximizes LED performance. This patent-pending optical lens helps capture otherwise wasted light and redirects it towards the illuminated surface in a broad, 155-degree pattern.

**The result: bright, uniform light distribution across the entire sign face.**

## Brighter Light across a Greater Surface Area

Tetra miniMAX has a wide, 155-degree viewing angle that distributes light across a larger surface area and is over 3 times brighter than previous generations. Now, even the shallowest channel letters can pack a huge visual punch. The small in stature Tetra miniMAX allows bright, uniform surface area coverage in applications as shallow as 1.5 inches (38mm).

## Use Fewer LEDs

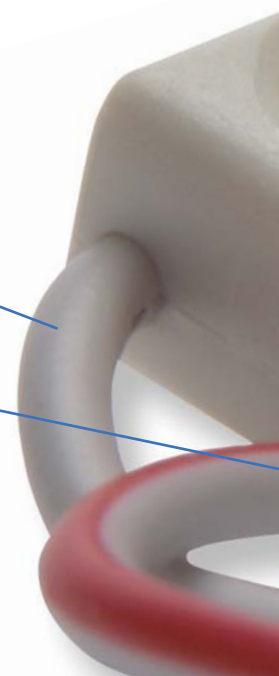
Tetra miniMAX provides exceptional uniformity across a greater surface area with bright, uniform light. This allows sign builders to use fewer LEDs per sign, reducing the cost of materials.

## Minimized Operational Costs

Tetra miniMAX is twice as efficient as our previous generation LEDs, effectively delivering more lumens per watt. The acrylic OptiLens provides additional protection against moisture, humidity, damage and corrosion. When combined with the rugged, overmolded design of the LED module, Tetra miniMAX offers robust performance even in the coldest of environments. Sign performance is enhanced for years to come and ongoing maintenance expenses are reduced.

Cut between any module

Continuous wire through LED module uses IDC connectors vs. soldering for maximum strain relief





## Bright, Uniform Light

The superior brightness and uniformity of Tetra miniMAX enhances brand image through better looking, more consistently operating signs. Sign owners that had been using neon are now protected from burned out, uneven or dimly lit signs that threaten positive brand perception.

## Reduces Disposal Costs

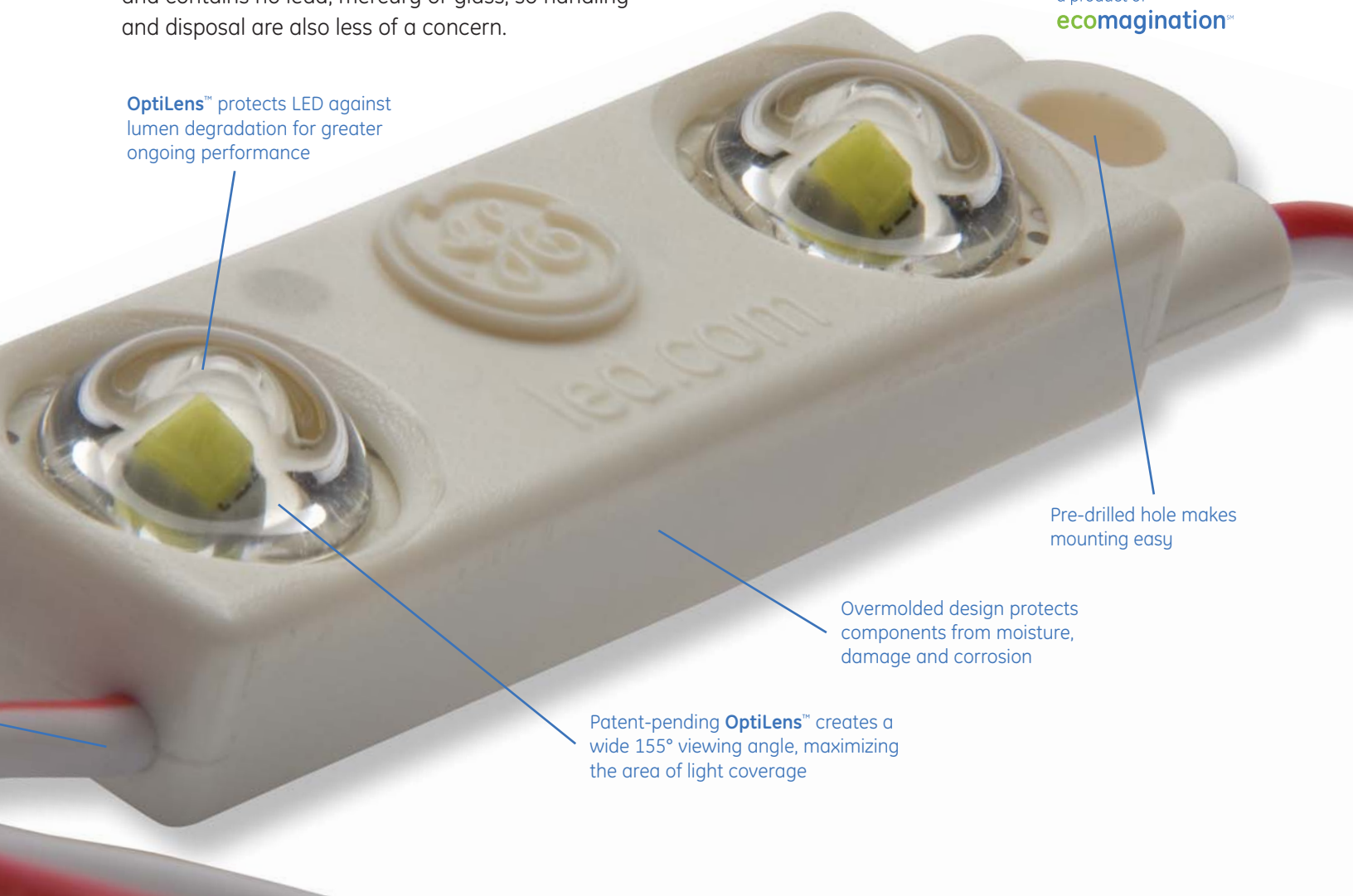
Tetra miniMAX is designed with environmental responsibility in mind. It complies with RoHS standards and contains no lead, mercury or glass, so handling and disposal are also less of a concern.

## Maximum Reliability

Only GE Lumination has the depth of experience that comes from supplying more than 80 million LEDs of Tetra products across the globe, with a warranty return rate of less than 0.05 percent\*. We perform stringent testing of the entire system—utilizing GE Six Sigma quality standards—rather than just pass on supplier reported performance claims. And we back it all up with a 4-year limited warranty.

\*Warranty return rate through December 2008

a product of  
**ecomagination**<sup>SM</sup>



**OptiLens™** protects LED against lumen degradation for greater ongoing performance

Pre-drilled hole makes mounting easy

Overmolded design protects components from moisture, damage and corrosion

Patent-pending **OptiLens™** creates a wide 155° viewing angle, maximizing the area of light coverage

## Components

SKU	Description	Package
GEWHMMS5	Tetra® miniMAX White, 6500K	100 ft (30.48 m)/box (250 modules)
GEWWMMS5	Tetra® miniMAX Warm White, 3200K	100 ft (30.48 m)/box (250 modules)
GEPS12-60	Power Supply: Input: 90-264VAC, Output: 12VDC/60W	10 power supplies
GEPS12-60U	Power Supply: Input: 108-305VAC, Output: 12VDC/60W	10 power supplies
GEPS12-20	Power Supply: Input: 90-264VAC, Output: 12VDC/20W	10 power supplies
9409	18 AWG Supply Wire (0.82 mm <sup>2</sup> )	500 ft (152.40 m)/spool
191600041	22-14 AWG Twist-on Wire Connector (0.33-2.08 mm <sup>2</sup> )	500/bag
192160005	22-18 AWG In-line Splice Connector (0.33-0.82 mm <sup>2</sup> )	500/bag

## Technical Specifications

Specification Item	Specification															
Typical Brightness (lumens/module)	White: 24 lm/module; Warm White: 20 lm/module															
Color Temperature	White: 6500K; Warm White: 3200K															
Viewing Angle	155°															
Cutting Resolution	Cut between every module															
LED Strip Operating Environment	-40 °C to +60 °C															
Power Supply	GEPS12-20 Input: 90-264VAC; Output: 12VDC GEPS12-60 Input: 90-264VAC; Output: 12VDC GEPS12-60U Input: 108-305VAC; Output: 12VDC															
Loading per Power Supply	GEPS12-20: Maximum: 30 modules/12 ft. (3.66 m) per power supply GEPS12-60 & GEPS12-60U: Maximum: 90 modules/36 ft. (10.97 m) per power supply															
Maximum Supply Wire Limits	<table border="1"> <thead> <tr> <th>GEPS12-60, 60U</th> <th>GEPS12-20</th> <th>Supply Wire Gauge</th> </tr> </thead> <tbody> <tr> <td>30 ft (9.14 m)</td> <td>120 ft (36.6 m)</td> <td>18 AWG (0.82 mm<sup>2</sup>) supply wire—9409</td> </tr> <tr> <td>50 ft (15.24 m)</td> <td></td> <td>16 AWG (1.31 mm<sup>2</sup>) supply wire</td> </tr> <tr> <td>80 ft (24.38 m)</td> <td></td> <td>14 AWG (2.08 mm<sup>2</sup>) supply wire</td> </tr> <tr> <td>120 ft (36.58 m)</td> <td></td> <td>12 AWG (3.31 mm<sup>2</sup>) supply wire</td> </tr> </tbody> </table> <p>Wiring to be installed in accordance with Article 725 of the National Electric code (NEC).</p>	GEPS12-60, 60U	GEPS12-20	Supply Wire Gauge	30 ft (9.14 m)	120 ft (36.6 m)	18 AWG (0.82 mm <sup>2</sup> ) supply wire—9409	50 ft (15.24 m)		16 AWG (1.31 mm <sup>2</sup> ) supply wire	80 ft (24.38 m)		14 AWG (2.08 mm <sup>2</sup> ) supply wire	120 ft (36.58 m)		12 AWG (3.31 mm <sup>2</sup> ) supply wire
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Sign Dimensions	For best results, recommended sign depth is 1.5 inches (38 mm) or greater															
Energy Consumption	Strip: 0.62 W/module, System: 0.75 W/module															
Limited Warranty	4 years on LED strip, 5 years on power supply															
System Certifications	UL Recognized #E219167, UL Classified #E229508, CSA Approved #216319, CE, C-tick, RoHS, IP66 rated: separate enclosure required, damp location rated															



Compliments of:



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