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EDIT

# MODERN WorkTruck SOLUTIONS<sup>®</sup>

## 2018 BUYERS GUIDE

MUST-HAVE PRODUCT  
AND SERVICE  
REFERENCE FOR  
WORK TRUCK FLEETS



LIGHTWEIGHT,  
TOUGH AND  
LONG-LASTING  
COMPOSITE TRUCK BODIES

LED LAMPS  
LIGHT THE WAY

# LED Lamps Light the Way With Style and Substance

TODAY'S COMMERCIAL VEHICLE LIGHTING BRINGS ILLUMINATION  
AND CREATIVITY TO ITS DISPLAYS



The lighting in a commercial vehicle can certainly be viewed from a utilitarian perspective, and it's true that without lighting a work truck can't really work. The advent of more robust, brighter, and longer-lasting LED lamps has not only resulted in an overall displacement of incandescent lighting, it has allowed a new era in creative light styling to begin flourishing.

As is often the case, trends in the automotive sector strongly influence commercial vehicle manufacturing in terms of safety, comfort, and styling. Because of LED lighting technology's enhanced flexibility, lots of creative energy has been directed its way, resulting in lighting solutions that not only enhance a vehicle's appearance, but define it.

"We have definitely seen a shift in our lighting discussions with OEMs and fleets," Brett Johnson, president and CEO of Optronics International, says. "Once primary topics of conversation, lamp longevity and durability are now virtually a given, but lamp styling and differentiation are on everyone's mind."

## GLOLIGHT BREAKTHROUGH

The introduction of Optronics' LED GloLight Series lamp in 2012 ushered in the first automotive-style stop, tail, and turn lamps for use on commercial vehicles. With their smoothly illuminated outer band encircling an LED array, the lamps were unique enough to be patented.

With glowing outer rings and dark centers, the new lamps grabbed the attention of OEMs and fleets alike. Optronics was leveraging recent advancements in diode technology and using its innovative optic design engineering talent to achieve the diffused outer ring that gave the GloLight its signature look.

"At that time, nobody had done much to change the utilitarian look and feel of LED stop, tail, turn lamps," Marcus Hester, vice president of sales and marketing for Optronics

International, says. "The GloLight stood out and changed the way vehicle lighting looked, and today it remains one of the most popular and sought-after products we sell."

## LIGHT GUIDE'S INNOVATION

Optronics recently unveiled several four-inch round and six-inch oval LED stop, tail, turn, and backup lamps. The lamps employ a newly engineered, patent-pending method of light delivery that looks and works unlike anything else in the vehicle-lighting marketplace.

Light Guide technology allows LED light to be transmitted from one location in the lamp to another and enables the illumination of complex shapes and patterns. Like their LED GloLight lamps predecessors, lighting with Light Guide technology makes lamps shine brighter and display an attention-grabbing appearance. The technology also allows OEM design

engineers to pursue unique lighting visions. The Light Guide technology allows symbols, text, and logos to all be potential design features.

"Our Light Guide technology continues to change the game by disrupting preconceived notions about what commercial vehicle lighting has to look like," Johnson says.

## TWO LAMPS IN ONE

Until recently, vehicles have generally been fitted with separate six-inch oval or four-inch round stop, tail, turn lamps, and backup lamps. Each lamp required a mounting hole in the vehicle body panels, frame posts, docking plates or gussets. And, each resulting cavity reduced structural integrity and presented a path for moisture and other contaminants that could lead to corrosion and further structural compromises.

To make matters more confusing, stop, tail, and turn functions were



often performed by LED lamps, while backup lighting remained largely the realm of incandescent lamps. Optronics' Fusion LED combination stop, tail, turn, and backup lamps were designed to give users the benefit of two lamps for the price of one. Additionally, because the lamps are LED, they are more dependable and safer than incandescent lamps.

The original nine-inch oval Fusion LED combination lamp was introduced in 2014 and has since been made available in four-inch round and six-inch oval formats with grommet-flange- and surface-mount versions

that fit virtually any standard lighting application. The entire family of Fusion LED combination stop, tail, turn, and backup lamps also use Optronics' patent-pending Light Guide technology and some even use GloLight technology. Installing a six-inch Fusion surface-mount LED combination lamp requires only a half-inch hole for wiring and four holes for rivets or screws.

## LED SUPERLAMPS

Lamps used on commercial vehicles' interiors and exteriors

are sometimes exposed to various chemicals and environmental conditions. The patented coating on LED SuperLamps resists 45 specific chemical agents, including petroleum distillates such as coolant ethylene and coolant propylene, as well as diesel fuel, battery fluid, brake fluid, transmission fluid, organic solvents, methanol, detergents, cleaners, and urea. The coating is applied to each SuperLamp's entire exterior. Lenses and housings accept and bond with the coating.

The electronic circuitry inside most LED lamps is vulnerable to ambient factors such as transient voltage, electromagnetic interference (EMI), and electrostatic discharge (ESD). These conditions can occur in, on, and around vehicles. Lamps featuring LED SuperLamp technology are not damaged by transient voltage, EMI and ESD, and because they are also designed with solid-state, surface-mount device (SMD) technology, their LEDs are able to continue to function even if a lamp's circuit board is completely submerged in water.

LED SuperLamps have been tested and have proven to resist component degeneration as a result of UV exposure, flammability, vibration, temperature cycling, accelerated aging, high-velocity water spray, free-fall drops, humidity, salt fog corrosion, dust, thermal shock, and/or gravel bombardment.

"The introduction of the LED SuperLamp and subsequent adoption of this and other lighting technologies from Optronics is a testament to its durability, practicality, and cost-effectiveness," Johnson says. "Moreover, it is an example of the right products at the right time, all taking vehicle lighting to a new level of creativity, style, and substance." ●

### FOR MORE INFORMATION

Find out more about Optronics' LEDs, visit [www.optronicsinc.com](http://www.optronicsinc.com).

# Optronics International

OFFERING INNOVATIVE SOLUTIONS FOR COMMERCIAL APPLICATIONS

As the fastest-growing vehicle lighting manufacturer in the US, Optronics International attributes its success to delivering better value, better options, and better lighting. Optronics continuously develops new products, offering innovative solutions for commercial applications.

Optronics has developed a family of four-inch round and six-inch oval LED stop, tail, turn and backup lamps utilizing its patent-pending Light Guide technology. Using a technique that is similar to fiber optic design, Light Guide technology precisely channels LED light to create shapes and patterns that were previously unachievable in commercial vehicle lighting. The distinctive new 12-diode lamps have a smoothly lit horizontal, x-shaped feature in the center of the lens, surrounded by a more traditional LED pattern. The repetition of the x-shaped style element across a vehicle's stop, tail, turn, and backup lamps creates a unique, standout look.

Optronics was the first to introduce an automotive-style lamp to the commercial vehicle industry in 2012 with its GloLight Series, expanding its offering with the first Light Guide lamps in 2016. Now, with the debut of its newest family of lamps, Optronics is the only manufacturer meeting the industry's growing demand for lighting that gives working vehicles a more distinctive look.

The lamps meet or exceed all FMVSS/CMVSS 108 photometric requirements for visibility and safety, and employ a solid-state, surface-mount device (SMD) design that protects their electronics against moisture, shock, and vibration. All LED products from Optronics come with lifetime warranty protection that will replace the lamp if even one diode fails. ●

Find out more, visit [www.optronicsinc.com](http://www.optronicsinc.com).



STL603RB  
**LIGHT GUIDE™**

## BETTER VALUE BETTER OPTIONS BETTER LIGHTING

**You want it all:** the most advanced technology to ensure reliability, innovative designs to improve visibility and safety, and a lifetime warranty that guarantees you won't be left in the dark. You deserve better, and with Optronics that doesn't mean you have to pay more to get it.

**Optronics**  
[www.optronicsinc.com](http://www.optronicsinc.com)