

LEOLink

**Built for Cities, DOTs,
and Utilities**



LEOLink is a next-generation family of smart controllers that transform roadway and off roadway lighting infrastructure with robust edge intelligence, wireless connectivity, and cloud-based management. At the heart of the LEOLink Intelligent Lighting System (ILS), LEOLink controllers extract critical usage data and alerts from the fixture and power line empowering municipalities, DOTs and utilities with real-time control, diagnostics, and performance optimization for cost effective streetlight operations. LEOLink NB01 Plus is a seven pin NEMA device that plugs directly into most LED fixtures that support a standard NEMA connector while the EB01 is LEOTEK's Embedded controller that is built directly into select LEOTEK fixtures and is shipped preinstalled and ready to go.

Lower Costs, Faster ROI

- Fast, simple installation reduces labor costs
- Fewer truck rolls and fuel expenses
- Predictive maintenance lowers repair costs and extends lamp life

Maximum Uptime, Safer Streets

- Real-time fault detection and outage alerts
- Remote troubleshooting enables faster resolution
- World class network reliability ensures consistent performance

Smarter, Simpler Operations

- Intuitive AI-powered natural language interface
- Cloud and mobile access for anytime, anywhere control
- Automated dimming adapts to weather and pedestrian activity

Why LEOLink

USE CASES

Cities & Municipalities

Seeking scalable, intelligent lighting infrastructure with low maintenance and high reliability for safer and a more attractive destination to live, work and play.

Departments of Transporation (DOTs)

Requiring robust, standards-compliant solutions for roadway safety and energy efficiency to keep drivers and pedestrians safe.

Utilities & Energy Providers

Looking to modernize public lighting with secure, cloud-connected control systems cost effectively delivering optimal service.

KEY FEATURES

Two Form Factors

NB01 Plus NEMA 7-pin (ANSI C136.41) plug-in for retrofit compatibility, EB01 embedded in select LEOTEK Fixtures for out-of-the-box connectivity.

Proven Cellular IoT

NB-IoT and LTE CAT-M1 networks ensure wide coverage, reliable performance, and remote control across the major trusted carriers.

Seamless CMS Integration

Native connection to LEOTEK's ILS Central Management System (CMS) for real-time lighting control, asset management and proactive insights.

Exceptional Reliability

Proven <0.3% failure rate in harsh environments ensures dependable performance.

0-10 V Dimming

Supports dynamic lighting adjustment for energy savings and smart scheduling.

Integrated Sensors

Photocell, tilt, and GPS sensors provide enhanced monitoring, fault detection, and asset location.

Rugged, Field-Proven Design

IP66-rated housings, extended temperature range, and advanced surge protection (10 kV/5kA) from lighting and voltage spikes.

Edge Intelligence

Enables autonomous, on-site decision-making for faster response and reduced network load.

Standards-Compliant

Meets ANSI C136.41, TALQ 2.0, and other key industry standards.

Long-Term Stability

Supported by LEOTEK, a trusted LITEON company with decades of innovation across the globe.

True Plug-and-Play Installation and Startup Lowering TCO and Accelerating Deployments

Once powered through the fixture, the controller immediately connects to the carrier network and transmits data to the CMS application.



Two Powerful Controller Options



LEOLink - NB01 Plus

The smartest fit for 7-PIN NEMA fixtures. Engineered to deliver seamless performance, trusted security, and plug-and-play simplicity, all in one powerful, next-generation controller.

Model	Form Factor	Fixture Compatibility	Connectivity	Power Source	Typical Use Case
NB01 Plus	NEMA 7-pin	Most ANSI C136.41-compliant fixtures	NB-IoT / LTE CAT-M	Powered via NEMA socket	Retrofit or upgrade existing fixtures



LEOLink - EB01

Embedded within LEOTEK's KarbonCobra™ streetlight, the SN-EB01 is a compact, LTE-enabled smart node that delivers real-time two-way communication with the ILS platform, creating one of the industry's most intelligent and cost-effective lighting solutions.

Model	Form Factor	Fixture Compatibility	Connectivity	Power Source	Typical Use Case
EB01	Embedded Node	LEOTEK KarbonCobra Series	NB-IoT / LTE CAT-M	Fixture internal wiring	Factory-installed, out-of-box operation

Technical Specifications

Electrical	NB01 Plus Controller	EB01 Controller
Voltage Range	110v - 277v	110v-480v
Power Consumption	< 3x Active, ,1 Inactive	< 1.2w Active, <0.5w Inactive
Surge Protection	10 kV / 5 kA	Driver's Protection Used
Driver	0-10v Driver	DALI D4i
Energy Metering	0.5% Accuracy	0.5% Accuracy
Backup Power	≥15Sec @ Super Capacitor	≥15Sec @ Super Capacitor
Connectivity		
Network Communications	NB-IoT, CAT-M1	NB-IoT, CAT-M1
SIM		
Protocol	MQTT over TLS 1.3	MQTT over TLS 1.3
GPS/GNSS	Yes; 50% CEP 3m (Option)	Yes; 50% CEP 3m (Option)
RF Bands	LTE NB-IOT: B1/B2/B3/B4/B5/B8/B12/B13/B17/B18/B20/B25/B26/B28/B66/B85 (TN23-W-A100 NB-IoT Module only)	
	LTE NB-IoT / CAT-M: B1, B2, B3, B4, B5, B8, B12, B13, B18, B19, B20, B25, B26, B27, B28, B66, B71, B85, B86 Me310G1 (Dual Mode)	
Environmental		
Ingress Protection	IP66	Fixture IP Rating
Operating Temperature	-40°C to +77°C	-40°C to +77°C
Humidity	0-95% non-condensing	0-95% non-condensing
Physical		
Dimensions	80.6 mm x 80.0 mm (3.17 in x 3.15 in)	80.88 mm x 46 mm (3.17 in x 3.15 in)
Weight	0.5 KG (1.1 lbs.)	0.3 KG (0.66 lbs)
Housing	UV-Stablized Polycarbonate	Sealed Module
Compliance & Certifications		
	FCC/IC/CE	FCC/IC/CE Compliant
	TALQ	TALQ 2.0 Certified
	UL/ETL Safety Listed	UL/ETL Safety Listed
	PRCRB Certified for Cellular Network Operation	PTCRB Certified for Cellular Network Operation
	AEX-256 Encryption	AES-256 Encryption
Ordering		
	NB01 Plus Controller	NB01Plus
	EB01 Controller	EB01
	CMS	Contact LEOTEK
Controllers may also be ordered as an option with the Karbon Cobra and VersaTEK fixtures with the "-NB01Plus" and "-EB01" options.		



North America Headquarters
 LEOTEK Electronics USA LLC.
 1955 Lundy Avenue
 San Jose, CA 95131

Telephone: (408) 380-1788
Fax: (408) 518-8128