

# **NIGHT-SAVER<sup>tm</sup>**

**Dual-Level HID Lighting Dimming System by MJB Technologies and Allanson International Inc.**

## **KEY FEATURES**

- Individually installed, controlled and operated timer-activated dual-level HID lighting dimming system for indoor and outdoor use.
- Reduces power consumption and related costs by up to 50%.
- New dual-section dimming capacitor increases life of luminaire by up to 15 years.
- Microchip timer control module and dual-section HID dimming capacitor.
- Timer works independently of power input and frequency.
- Independent operation eliminates the need for costly wiring or signaling between luminaires and a central control station.
- Night-Saver installs in fifteen minutes.
- Easy spade connector wiring to existing HID CWA ballast.
- Available for 100, 150, 200, 250 and 400 watt High Pressure Sodium and 175, 250 and 400 watt Metal Halide CWA type ballasts from any fixture manufacturer.
- Timing operation is programmed at the factory to achieve planned results and to eliminate field installation errors.
- 2-year limited warranty.
- CSA Approved.

## **GENERAL OPERATION**

Night-Saver is the world's first microchip controlled, independently operated HID Dual-Level switching control for Roadway and Area Lighting luminaires. It's compact size and simple wiring allow it to be installed in many different types of luminaires for individual fixture dimming control. The design eliminates the need for expensive wiring and signaling to communicate with a central manned control. It's sealed controlled module and fixed capacitor setting permit sustainable results that can be used to negotiate lower utility rates. Night-Saver is recommended for use only on luminaires that can and should be dimmed.

Lamp dimming is achieved by electronically switching the dual-section dimming capacitor (supplied) within the luminaire. The value of this capacitor determines the light level achieved during the dimming mode. MJB Technologies selects capacitor values not to exceed 50% reduction in lamp power, based on lamp manufacturers and NEMA (National Electrical Manufacturers Association) recommendations.

Night-Saver employs the use of capacitors specific to the HID ballast to create a low cost, reliable system. The result is a rugged, safe, trouble free, install-and-forget control solution for HID dual-level switching.

Each Night-Saver is installed and controlled individually, maximizing energy savings. Installation time is a fraction of existing systems, typically less than fifteen minutes per luminaire.

Dimming HID, using a dual-section capacitor, lowers the current across the lamp, reducing electron boil-off from the lamp's electrodes, thereby increasing lamp life. Also, by installing the new dual-section capacitor, the life of the fixture is extended by up to fifteen years.



Night-Saver is simple and compact.

Night-Saver is easy to install and fits into most luminaires.

### SPECIFICATIONS

- **Lamp Type Controlled:** 100, 150, 200, 250 and 400 watt High Pressure Sodium and 175, 250 and 400 watt Metal Halide lamps.
- **Ballast Compatibility:** Compatible with every manufacturer of CWA (Constant Wattage Autotransformer) ballasts.
- **Capacitor:** Dual-section dimming capacitor is installed within the ballast compartment of the luminaire. Maximum capacitor size 3" oval. Capacitor value is selected to match original ballast manufacture specifications.
- **Operating temperature range:** -30 C to + 40 C ambient.
- **Mounting:** Control Module attaches to luminaire by footpads that are secured to luminaire bosses.
- **Weight:** Control Module weighs 300 grams.
- **Dimensions:** Control Module measures 40 mm x 80 mm x 130 mm.
- **Construction:** Rugged extruded aluminum housing with gasketed aluminum end plates.
- **Warranty:** 2 year limited warranty.
- **Failure Mode:** Night-Saver fails to luminaire's full light output.
- **Applications:** Indoors as well as outdoors.
- **Power Consumption:** 1.2 watts.
- **Optional Signal input:** Accepts low voltage signaling to by-pass timer operation.

### ORDERING CODES:

Model Name:	Night-Saver	<b>NS-</b>
Light Source Wattage:	250 watts	<b>250-</b>
Light Source Type:	HPS	<b>HP-</b>
Supply Voltage:	120 volts	<b>12-</b>
Degree of Dimming:	50%	<b>50-</b>
HID Ballast Capacitor Value:	32 uf	<b>32-</b>
HID Ballast Capacitor Voltage:	280 volts	<b>280-</b>
Time Set to Begin Dimming:	11:00 pm	<b>23-</b>
Time Set to End Dimming:	6:00 am	<b>06-</b>
Time Zone:	Eastern	<b>E</b>

### FULL ORDERING CODE:

**NS-250-HP-12-50-32-280-23-06-E**

Produced by Allanson International, a 78 year old Canadian company with a respected name in the sign ballast industry.

**NIGHT-SAVER** is available from: MJB Technologies and Allanson International  
Call us at: (905) 586-0760 or (905) 584-7333 or email us at [barrym@ica.net](mailto:barrym@ica.net)