# CAPIO PLUS<sup>TM</sup> DIMMING MODULES



## Capio plus<sup>™</sup> CP Series Dimming Modules

Project:		
Location/Type:		

### Description

Capio Plus Modules offer solid-state performance and unsurpassed benefits. Eight unique models allow for control of almost any common architectural or theatrical lighting load. Each module utilizes patented IGBT dimmer and on-board microprocessing. This solid-state dimming technology operates more efficiently than traditional SCR dimming technologies, and allows for quieter dimming, increased lamp performance and life, reduced heat/size/weight, and lower harmonics. Capio Plus modules use Talkback™ to send error, temperature, short-circuit, and load status information to a PC\*. Each Capio Plus Module occupies one space in a Capio Plus Dimmer Rack, and requires no tools to install. Any combination of Capio Plus modules can be used within a Capio Plus Dimmer Rack to accommodate the specific requirements of the application.\*\*\*

- \* Talkback requires Guardian™ software.
- \*\*\*Total amperage of Capio Plus modules cannot exceed the maximum amperage of the Capio Plus Dimmer Rack. Refer to Capio Plus Dimmer Rack Data Sheet 87-0317.

#### Features

- 800µS Dynamic Filtering for quiet lamp filaments and may extend lamp life at any load size.
- Operates in Forward Phase Control or Reverse Phase Control.
- Very efficient: only 2.5V loss.
- Generates very little heat, under any load size.
- Automatically protects against short-circuits, overvoltage conditions, and excessive loads.
- Patented Low Harm™ mode reduces neutral harmonics.
- Front panel FOCUS button and LED Status indicators.
- Talkback<sup>™</sup> communicates module status to remote PC.
- Contains no SCRs or inductors—solid-state module generates no noise or resonance.



#### **Specifications**

Capio Plus dimming modules shall operate silently without mechanical noise, and shall generate 800µS rise times in Forward Phase Control, or 800µS fall times in Reverse Phase Control as required to minimize lamp, ballast, and transformer noise within the space, regardless of the load size.

Capio Plus dimming modules shall include on-board processing, to automatically compensate voltage and current in response to changes detected in the load or electrical service. The dimming modules shall use Insulated Gate Bipolar Transistors (IGBT) and shall operate efficiently, dropping a maximum of only 2.5V regardless of load size. The dimming module shall suppress voltage surges to the load, protect against dead-shorts, and may extend lamp life. Capio Plus dimming modules shall feature advanced thermal management, automatically scaling back rise and fall times from 800uS to 250µS without visible light level changes. Capio Plus dimming modules shall be completely solid-state, and shall not use chokes or inductors for filtering.

Capio Plus dimming modules shall control the following load types: incandescent, neon, cold cathode, electronic low-voltage, magnetic low-voltage, and quartz halogen. The dimming modules shall be compatible with most major brands of fluorescent non-dim ballasts when set to a non-dim configuration or when using the non-dim modules. The dimming modules shall be compatible with 2-wire electronic dimming ballasts such as the Advance Mark 10°. Capio Plus HDF Fluorescent dimming modules shall control Lightolier Controls PowerSpec HDF dimming ballasts. When necessary, Capio Plus dimming modules shall automatically adjust to Forward/Reverse Phase Control to protect the connected loads.

Capio Plus dimming modules shall be configurable to operate in Low Harm™ mode, to reduce the effect of neutral harmonics without the use of additional filters by pairing dimming modules within a phase to complimentary forward/reverse phase control

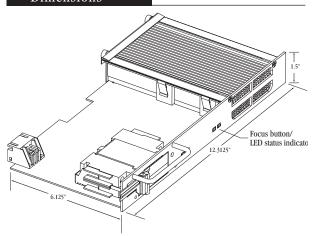
Capio Plus dimming modules shall feature a focus button for each channel, to provide On/Off/Level control for focusing and testing of the connected loads. The dimming modules shall also include bi-color LEDs for each channel, to indicate Normal Operation, No Load, Focus Mode Activated, Overload, Over Temperature, Input Overvoltage, or Other Errors.

Capio Plus modules shall provide Talkback™ status information if an error condition, over-temp condition, or significant change in load occurs. Talkback requires the use of Guardian software.

Capio Plus dimming modules shall feature a mechanical safety interlock to prevent removal of a module while power is applied, and modules shall be removable without tools.

Capio Plus dimming modules shall be UL and cUL Listed to U.S. and Canadian safety standards, and shall include a three-year manufacturers warranty.

#### **Dimensions**



12.3125W x 6.125"D x 1.5"H (excluding handle) 2.65 lbs

#### Order Checklist

CP15HP	Dual 15A High Performance 1.8kW Dimming Module
CP20HP	Dual 20A High Performance 2.4kW Dimming Module
CP15CC	Dual 15A Continuous Circuit 1.8kW Module
CP20CC	Dual 20A Continuous Circuit 2.4kW Module
CP15ND	Dual 15A Non-Dim 1.8kW Module
CP20ND	Dual 20A Non-Dim 2.4kW Module
CP20HDF	Single 20A HDF Fluorescent 2.4kW Dimming Module
CP50	Single 50A High Performance 6kW Dimming Module
CPBLANK	Blank Module (Required for empty spaces)

### Load Compatibility Schedule

		CP20CC CP15CC	1	l	CP20HDF
Tungsten/Halogen	•	•	•	•	
Neon/Cold Cathode	•	•	•	•	
Electronic Low Voltage**	•	•	•	•	
Magnetic Low Voltage*	•	•	•	•	
2-Wire Dimming Fluorescent***	•				
PowerSpec HDF Fluorescent					•
Motors****	•	•	•	•	

- \* Product must be rated for dimming.
- \*\* Module must be configured for Forward or Reverse phase Control, specific to the load.
- \*\*\* Phase Control Ballasts must be rated for dimming.
- \*\*\*\* Not all Motors are compatible.



We reserve the right to change details of design, materials and finish in any way that will not alter the installed appearance or reduce function performance.