

PHOCOS CIS-N (10-20 A)

Solar Charge Controller w/ Lighting Control



Product Introduction

The CIS-N was especially developed to deliver optimum performance in industrial PV systems in demanding environments. It features 4-stage, series-switching PWM charge regulation and is fully programmable via infrared devices (CIS-CU or MXI-IR and CISCOM software).

The CIS-N includes convenient and advanced lighting control, which allows the user to decide whether they want the automatic lighting control with LED dimming to be time or low-voltage activated.

Product Features and Functions

- Works in 12 or 24 V systems (auto recognition)
- Fully programmable charge/discharge program via infrared (CIS-CU or MXI-IR and CISCOM software)
- Timed and low-voltage dimming settings
- Dimming interface for external LED drivers
- Fully potted (IP68) aluminum housing
- UL1741/Class I Div. 2 certified
- Infrared-programmable load timing feature with dimming, ideal for lighting systems

Optional Accessories

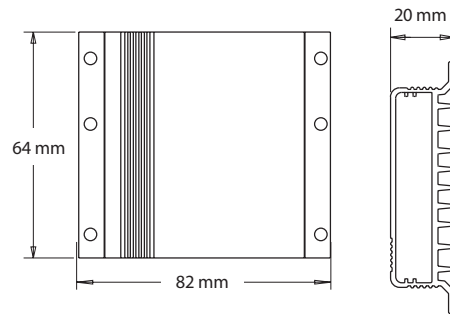
CIS-CU

- Infrared remote control programming accessory

MXI-IR

- Infrared to USB programming accessory and interface to CISCOM software

Technical Drawing



Technical Data

Type	CIS-N-10	CIS-N-20
System Voltage	12/24 V auto recognition	
Max. Charge/Load Current	10 A	20 A
Float Charge	13.8/27.6 V (25 °C)	
Main Charge	14.4/28.8 V (25 °C), 0.5 h daily	
Boost Charge	14.4/28.8 V (25 °C), 2 h activation: battery voltage < 12.3/24.6 V	
Equalization Charge	14.8/29.6 V (25 °C), 2 h activation: battery voltage < 12.1/24.2 V (at least every 30 days)	
Deep-Discharge Protection	11.0-12.0/22.0-24.0 V (by SOC) 11.0-11.9/22.0-23.8 V (by voltage)	
Reconnect Level	12.8/25.6 V	
Overvoltage Protection	15.5/31.0 V	
Undervoltage Protection	10.5/21 V	
Max. Panel Voltage	30/50 V	
Temperature Compensation (Charge Voltage)	-25 mV/K (12 V), -50 mV/K (24 V)	
Max. Self-Consumption	5-8 mA/6-10 mA	
Grounding	Negative grounded	
Ambient Temperature	-40 to +60 °C	
Max. Altitude	4,000 m above sea level	
Battery Type	Lead acid (gel, AGM, flooded) adjustable	
Connection Wire Length	100 mm / 4 in	
Max. Wire Cross Section	2.5 mm ² (AWG 13)	
Dimensions (WxHxD)	82 x 64 x 20 mm / 3.2 x 3 x 1 in	
Weight	0.15 kg / 0.33 lbs	
Certificates	CE compliant, RoHS compliant	
Warranty	5 years	

The CIS-N is NRTL certified

Hazardous Locations (HazLoc) tested according to: ANSI/ISA 12.12.01-2012, Class I Division 2 (Groups A-D).

Ordinary Locations (OrdLoc) tested according to: UL1741:2005 CAN/CSA C22.2 No. 107.1-01

