Bi-Directional Isolator Relay Delay (B.I.R.D.®)

Part number: 00-01136-000

Description:

The Bi-directional Isolator Relay Delay or B.I.R.D.® is a core piece of DC Management Systems that includes both a coach and a chassis battery. It has 3 primary functions:

1) Bridging two battery banks together when a charging source is present from either one.
2) Isolating the batteries when the charging source is removed or when both battery banks are fully charged.
3) Providing aux start power when the chassis battery is low and unable to start the vehicle.

The B.I.R.D.® is integrated with Intellitec’s 100A Battery Disconnect Relay (US Patent #4,628,289) that has been used by the transportation industry for over 25 years. Compared to other battery isolation devices that are continuous duty and require constant power, the B.I.R.D.® utilizes Intellitec’s latching mechanism which means it only consumes power when changing states making it a “Green” product. Unique to this B.I.R.D.® is the bi-directional current monitoring. This not only provides over current protection as an added safety feature but also gives insight to the batteries state of charge that other isolator products do not. Unlike other isolator products that stay connected for as long as the charging source is present or use a fix bridge time, the B.I.R.D.® uses both voltage and current to accurately measure the battery’s State of Charge. This provides the ability to fully charge the battery without concern for overcharging damage.

With the RV-C ports the module can provide vital information about the battery levels and power consumption, system healthy, status and more on the network to provide the end user with real-time feedback on their vehicle’s electrical system is operation.
PRODUCT SPECIFICATION

Product Features

- 100 Amp continuous load capacity
- Mechanically latching requires no current draw to maintain state
- Configurable parameters to work with all battery types
- Automatic bridging and isolating of batteries
- Bridge and isolation verification with automatic retry
- Low side switch input for aux start functionality
- Industry standard connectors for easy installation
- Over temperature protection
- Ignition Proof
- 100 Amp Bi-Directional current sensing
- Dual RV-C Communication ports with isolated voltages

Environmental Specifications

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<th>Specification</th>
<th>Min</th>
<th>Typ</th>
<th>Max</th>
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</thead>
<tbody>
<tr>
<td>Operating temp:</td>
<td>-20/50 deg C</td>
<td>(-24/122 deg F)</td>
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<td>Storage temp:</td>
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<td>Intrusion Rating:</td>
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Electrical Specifications

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<td>Operating Current Draw</td>
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Mechanical Specifications

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Available Product Literature and Guides:

Brochure: 53-01136-000
Product Specification: 53-01136-001
User’s Guide: 53-01136-100
Installation and Applications: 53-01136-200
Integrators Guide: 53-01136-300

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