DC Load Distribution Panels

# **DISTRIBUTION SERIES 2**

### **Next Generation DC Load Distribution Panels**



The ICT DISTRIBUTION SERIES 2 builds on the industry—leading success of the original ICT Distribution Series fused DC load distribution panels. Based on customer experience and feedback, we have added several new features that users have requested, including:

- ▶ 5 digital alarm sensor contact inputs for site monitoring and reporting of alarms such as door, water, and smoke detectors.
- SNMPv1 and SNMPv2c support.
- Monitoring and alarm reporting of each output for improved pinpointing of issues with connected loads.
- ▶ Enhanced SSL support provides more robust security as well as support for webmail applications.
- Multiple email accounts can be set up to receive alarm messages.
- Remote Power Control models will restore to previously saved settings after a power loss (IRC/BRC models).
- Each output features independently adjustable load—shed settings (IRC/BRC models).
- New smart phone optimized web page makes monitoring and controlling each output from a mobile device a breeze.
- ▶ 100Mbs is now supported in addition to 10Mbs.
- A new fuse—ignore feature can prevent nuisance alarms if an unused output does not have a fuse in place (I/IRC models).
- New low-profile JCASE fuses rated up to 40A replace the three MAXI fuses (I/IRC models).

#### Ease of Installation and Use

Fuses are mounted on the front to facilitate easy replacement. Alarm LED indicators and Form C alarm contacts are provided on all models to assist with troubleshooting and fault detection. Heavy duty stud connectors are provided for the main DC inputs, and space saving terminal blocks are used for the outputs. All I.P. enabled models have an intuitive, easy to use Graphical User Interface that can be accessed from a standard web browser (no software required). SNMP allows for auto—discovery and trap reporting for users with Network Management Sytems (NMS).

#### Performance and Flexibility

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All models feature a continuous current rating of 150 amps (180 amps peak) to allow up to 12 DC devices to be connected to a single panel. The Intelligent models utilize nine standard ATO type fuses rated at up to 25A each, plus three JCASE fuses up to 40A rating, allowing you to mix the size and type of devices you can connect to these 12 or 24VDC models.

Broadband models for 48VDC feature 12 GMT fuses rated at 15A each.



#### Lower Cost of Ownership and Site Maintenance

All models come with a 3—year warranty. Intelligent and Broadband models are I.P. enabled for remote monitoring, and the Remote Power Control models allow remote shutdown or power cycling of individual outputs, potentially saving unnecessary service call—outs. Firmware can be updated remotely over the web. Five digital contact inputs allow site monitoring sensors to be labelled, monitored and reported, avoiding the need to buy and install a third—party solution that can add cost and require additional space. Form C outputs can be connected to monitor and report conditions such as AC failure.

#### Remote TCP/IP Monitoring

The Intelligent and Broadband models are I.P. enabled, and utilize a built—in Ethernet connector and integrated web server to allow users to remotely monitor load conditions at the panel. System voltage and current, as well as the current reading of each output, can be monitored. This can provide an indication of a problem with the system power, or with individual connected loads device such as a radio, repeater, or RF amplifier. Text or email alerts will be sent when an alarm is triggered. Up to 30 days of data logging is provided.

#### Remote TCP/IP Power Control

Remote Power Control models allow the individual DC outputs to be turned on and off remotely using the TCP/IP connection. This allows connected devices to be turned on and off or power–cycled, potentially averting the need for an on–site service visit. The Network Watchdog feature pings a designated I.P. address and will restart an assigned output automatically, allowing devices such as routers to be power–cycled without risk of losing communications to the site. Load shedding is provided with user definable settings for each output, allowing non–essential loads to be automatically shut down in order to prolong power to critical loads.



## The Power of Reliability

#### **DC Load Distribution Panels**

	ICT180S-12I Intelligent Distribution Panel	ICT180S-12B Broadband Distribution Panel	ICT180S-12IRC Intelligent Distribution Panel With Remote Power Control	ICT180S-12BRC Broadband Distribution Panel With Remote Power Control	ICT180S-12BRCP Broadband Distribution Panel With Remote Power Control	
Power Specifications						
Nominal Application Voltage	12 and 24VDC	-48VDC	12 and 24VDC	-48VDC	+48VDC	
Operating Voltage Range	10-30VDC	10-60VDC	10-30VDC	10-60VDC	10-60VDC	
Panel Current Rating (Peak)	180A —					
Panel Current Rating (Continuous)	150A					
Number of ATO Fused DC Outputs	9		9			
ATO Fuse Rating (Max)	25A (1)(2)		25A (1)(2)			
Number of JCASE Fused Outputs	3		3			
JCASE Fuse Ratings (Max)	40A (1)(2)		40A (1)(2)			
Number of GMT Fused Outputs		12		12	12	
GMT Fuse Rating (Max)		15A (1)(3)		15A <sup>(1)(3)</sup>	15A (1)(3)	
Mechanical				1		
Form Factor	1RU - 19 Inch rack mount with handles					
Dimensions (inches) L x W x H	9.29 x 19.0 x 1.72					
Weight (lbs/kg)	7.0 lbs / 3.2 kg					
Fuse Position	Front Panel —					
LED Alarm Indicators	Front Panel —					
LCD Digital Display	Front Panel ——————					
Rear Panel Connectors						
Power and Communications	DC input stud connectors, DC output terminal blocks, Form C alarm contacts, grounding stud, RJ-45 Ethernet					
Site Monitoring	Five external dry alarm contacts. Monitors external contact closure, configurable for NO or NC logic, applied voltage 3.3V, 0.4mA for contact closure detection					
Environment						
Operating Temperature Range	-20C to +60C					
Communications and Control						
Ethernet	TCP/IP built-in web server and graphical user interface, 10/100BASE-T, IEEE 802.3 compatible					
Supported Protocols	IPv4, HTTP, HTTPS, SMTP, DNS, TCP, UDP, ICMP, DHCP, ARP, SNMP v1/v2c					
SNMP Ports	UDP Port 161, SNMP Traps: UDP Port 162					
Firmware Upgrades	Upgradeable over Ethernet					
Security	Password protected, SSL encryption					
12 Channel Output Monitoring	Current draw measured and reported for each output, definable under and over current alarms					
Email and SMS Alerts	Multiple email or text accounts, adjustable intervals					
Data Logging	Up to 30 days at 1 minute sampling rate, csv file download, major event logging					
Network Watchdog	Autonomously ping up to two I.P. addresses and power-cycle output if no response, definable settings					
Remote Alarms	Form C alarm contacts (C/NO/NC)					
Remote Power Control			Each DC output on/off selectable			
Auto Restore Mode			Will return to previous output settings after a power loss			
Power-up Delay Sequencing			User selectable 0 to 60 second delay between outputs energizing			
Auto Load Shedding			Each output user definable, manual or auto restart			

<sup>(1)</sup> Please follow all recommendations of the fuse manufacturer. Generally fuses and wiring should be continuously operated at no more than 80% of their current rating. (2) 12/24V models ship with assortment of ATO and JCASE fuses installed. (3) 48V models ship without GMT fuses.

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