

## **PANEL METERS**

AWARD-WINNING SOLUTIONS FROM THE NUMBER ONE BRAND IN THE INDUSTRY



EXCELLENCE. REDEFINED.



# THE RED LION DIFFERENCE

Smart device connectivity, Wi-Fi and Modbus communications.

- **Display Height:** 0.3" (7.6 mm) to 4" (101 mm)
- ▲ Digital Meters: count, rate, time
- Analog Meters: current, process, resistance, strain gage, temperature, voltage
- ▶ PID Control: current, process, temperature, voltage
- Outputs: relay, solid state, retransmitted analog
- **▲ Various communication protocols**
- ▲ Field-installable option cards providing flexibility as your business needs change
- **Easy-to-use** powerful capabilities of Crimson software
- ▲ Leading Panel Meter Brand: For 21 consecutive years



#### 2021 Readers' Choice Award

**For 21 consecutive years** the readers of Control Design Magazine have voted Red Lion the number one panel meter manufacturer in the industry.



## PM-50: RED LION'S GRAPHICAL PANEL METER



#### MODULAR CONSTRUCTION

- Plug-in Play Modules
- Upgradeable Firmware
- ▲ Outputs, Power, Comms

#### **DATA ACCESS**

- ✓ Wi-Fi
- ▲ Modbus/RS485
- ▲ Ethernet & RS232

#### **EASY FIELD REPLACEMENT**

- Use existing wiring
- **4**.3" → 1/8 DIN Products
- **3.5"** → 1/16 DIN Products
- ▲ Enable Wi-Fi to collect data

#### **SMART DEVICE CAPABILITIES**

- ▲ Functionality
- Programming
- Connectivity

#### **ALARM NOTIFICATION**

- Display Color Change
- Focuses Attention

#### SIMPLE PROGRAMMING

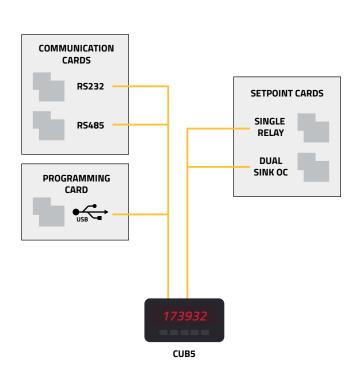
- ▲ Start-up Wizard
- Programming App
- Web Browser

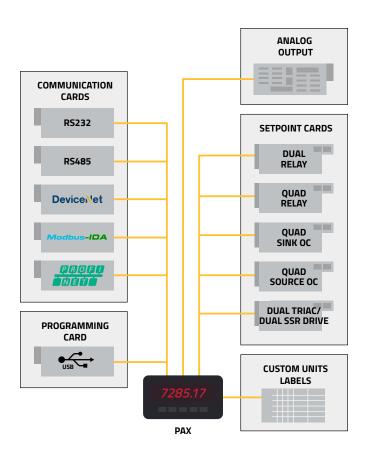
#### **CUB5 AND PAX METERS: ENDLESSLY ADAPTABLE**



## FIELD-UPGRADEABLE PLUG-IN OPTION CARDS

Red Lion's CUB5 and PAX meters offer the capability to add and change option cards as your application and communications requirements change.





## PANEL METER **SPECIFICATIONS**

## **DIGITAL APPLICATIONS**

|                     | CUB5                    | PAX Lite              | C48C/C48T   | PAX/PAX2                | Large Displays           | PM-50    |
|---------------------|-------------------------|-----------------------|-------------|-------------------------|--------------------------|----------|
| Counting/Totalizing | CUB5R000,<br>CUB5B000   | PAXLC600,<br>PAXLC800 | C48C Series | PAXC0020,<br>PAX2D000   | LD Series, LPAX/<br>EPAX | PM500D0X |
| Preset Count        | CUB5R000*,<br>CUB5B000* | PAXLCR00              | C48C Series | PAXI0020*,<br>PAX2D000* | LD Series, LPAX/<br>EPAX | PM500D0X |
| Batch Count         | CUB5R000*,<br>CUB5B000* | N/A                   | C48C Series | PAXI0020*,<br>PAX2D000* | LD Series, LPAX/<br>EPAX | PM500D0X |
| Rate Indication     | CUB5R000,<br>CUB5B000   | PAXLR000              | N/A         | PAXR0020,<br>PAX2D000   | LD Series, LPAX/<br>EPAX | PM500D0X |
| Rate Control        | CUB5R000*,<br>CUB5B000* | PAXLCR00              | N/A         | PAXI0020*,<br>PAX2D000* | LD Series, LPAX/<br>EPAX | PM500D0X |
| Elapsed Timing      | CUB5TR00,<br>CUB5TB00   | N/A                   | C48T Series | PAXTM000                | LD Series, LPAX/<br>EPAX | N/A      |
| Time Control        | CUB5TR00*,<br>CUB5TB00* | N/A                   | C48T Series | PAXTM000*               | LD Series, LPAX/<br>EPAX | N/A      |
| Real-Time Clock     | N/A                     | N/A                   | N/A         | PAXCK000                | LPAX/EPAX                | N/A      |

<sup>\*</sup> Meter requires option card to provide capability.

## **ANALOG APPLICATIONS**

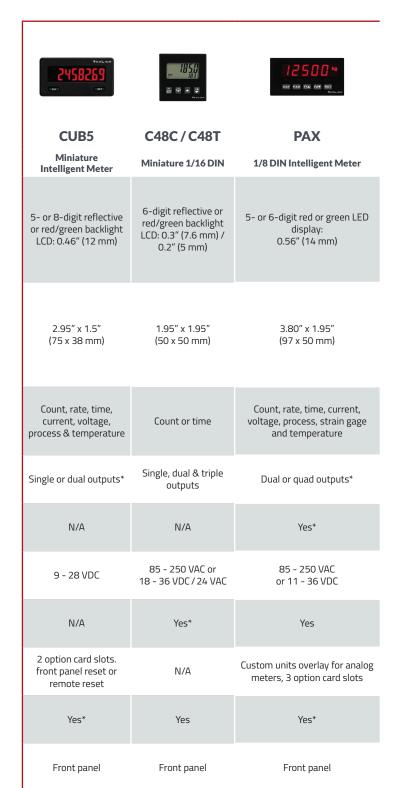
|                                   | CUB5                  | PAX Lite              | PXU        | PAX/PAX2              | Large Displays           | PM-50    |
|-----------------------------------|-----------------------|-----------------------|------------|-----------------------|--------------------------|----------|
| AC Current                        | N/A                   | PAXLIA00,<br>PAXLIT00 | N/A        | PAXH0000              | LPAX/EPAX                | N/A      |
| AC Voltage                        | N/A                   | PAXLVA00,<br>PAXLHV00 | N/A        | PAXH0000              | LPAX/EPAX                | N/A      |
| DC Current                        | CUB5IR00,<br>CUB5IB00 | PAXLIDOO,<br>PAXLAOOO | N/A        | PAXD0000<br>PAX2A000, | LD Series, LPAX/<br>EPAX | PM500A0X |
| DC Voltage                        | CUB5VR00,<br>CUB5VB00 | PAXLVD00,<br>PAXLA000 | N/A        | PAXD0000,<br>PAX2A000 | LD Series, LPAX/<br>EPAX | PM500A0X |
| Process Signals                   | CUB5PR00,<br>CUB5PB00 | PAXLCLOO,<br>PAXLAOOO | N/A        | PAXP0000,<br>PAX2A000 | LD Series, LPAX/<br>EPAX | PM500A0X |
| Temperature, RTD/<br>Thermocouple | CUB5RTRO,<br>CUB5RTBO | PAXLT000              | N/A        | PAXT0000,<br>PAX2A000 | LPAX/EPAX                | PM500A0X |
| Strain Gage/Load Cells            | N/A                   | PAXLSG00              | N/A        | PAXS0000              | LPAX/EPAX                | N/A      |
| PID Controller                    | N/A                   | N/A                   | PXU Series | PX2A8H00,<br>PX2A8V00 | N/A                      | N/A      |

<sup>\*</sup> Meter requires option card to provide capability.

## PANEL METER **SPECIFICATIONS**

|                              | 12923131  | EM (A) (*)   |
|------------------------------|---|--|
|                              | CUB7  | PAX Lite   |
|                              | Miniature 1/32 DIN  | 1/8 DIN Meter  |
| Display Type                 | 8-digit reflective, red,<br>or green backlight LCD:<br>0.35" (9 mm) | 5- to 8-digit red LED<br>display: 0.56" (14<br>mm)                               |
| Dimension<br>(W x H)         | 2" x 1.1"<br>(51 x 28 mm)   | 3.80" x 1.95"<br>(97 x 50 mm)  |
| Input<br>Capability          | Count & time  | Count, rate, time,<br>current, voltage,<br>process, strain gage<br>& temperature |
| Setpoint<br>Capability       | N/A   | Dual outputs<br>(some models)  |
| Retransmitted<br>Analog      | N/A   | N/A  |
| Power Source                 | Lithium battery, 9 - 28<br>VDC for backlighting                     | 85 - 250 VAC   |
| Sensor<br>Excitation         | N/A   | Yes  |
| Other Features               | Front panel reset or remote reset                                   | Custom units overlay for analog meters   |
| Communications<br>Capability | N/A   | N/A  |
| NEMA 4X/IP65                 | Front panel   | Front panel  |

<sup>\*</sup> Meter requires option card to provide capability.













| 2000 × 2000c   | Violator   | D PI W   | 809 - 110  | ton .  |  |
|--|--|--|--|--|--|
| PM-50 PAX2 Dual Line   |  | PXU  | PAX2C Dual Line  | LD   |  |
| 1/16, 1/8 DIN  | 1/8 DIN Intelligent Meter  | 1/16, 1/8, 1/4 DIN   | 1/8 DIN Intelligent Meter  | Large Display  |  |
| Graphical Display, Full Color<br>Touchscreen, 3.5" or 4.3",<br>Multiple Screens                                      | Line 1 - Backlight 6-digit,<br>0.71" (18mm) red/orange/<br>green LCD display<br>Line 2 - Backlight 9-digit,<br>0.35" (8.9 mm) green LCD<br>display | 4-digit dual line red/orange LCD display  1/16 DIN Digit Size: Line 1 - 0.43" (11 mm); Line 2 - 0.27" (7.0 mm)  1/8 DIN Digit Size: Line 1 - 0.47" (12 mm); Line 2 - 0.47" (12 mm)  1/4 DIN Digit Size: Line 1 - 0.87" (22 mm); Line 2 - 0.55" (14 mm) | Vertical and horizontal units with<br>red/orange/green LCD display<br>Vertical: Line 1 - 0.51" (13 mm),<br>Line 2 - 0.44" (11.2 mm)<br>Horizontal: Line 1 - 0.62" (15.7<br>mm), Line 2 - 0.47" (12 mm) | 5- and 6-digit<br>2.25" (57 mm) or 4"<br>(101 mm) red LED<br>display   |  |
| <b>Small</b><br>95 mm x 82 mm<br><b>Large</b><br>124 mm x 85 mm  | 3.80" x 1.95"<br>(97 x 50 mm)  | 1/16 DIN: 1.89" x 1.89" (48 x 48mm)<br>1/8 DIN: 1.89" x 3.77" (48 x 96mm)<br>1/4 DIN: 3.77" x 3.77" (96 x 96mm)  | <b>Vertical:</b> 1.95" x 3.80" (50 x 97 mm) <b>Horizontal:</b> 3.80" x 1.95" (97 x 50 mm)  | 12" x 4" (304 x 101 mm) or 16" x 4" (406 x 101 mm) or 20" x 7.87" (508 x 200 mm) or 26" x 7.87" (660 x 200 mm) |  |
| Universal Input Digital Model - count and rate Analog Model - current, voltage, process, resistance, and temperature | Current, voltage, process, resistance, and temperature   | Full PID control for temperature or process  | Full PID control for process and<br>temperature  | Count, rate, time,<br>current, voltage,<br>process & serial slave  |  |
| Dual SS on-board, Dual or<br>Quad Relay outputs*   | Dual or quad outputs*  | Single, dual & triple outputs  | Dual or quad outputs*  | Single or dual outputs   |  |
| Yes*   | Yes*   | Yes  | Yes*   | N/A  |  |
| 10 to 30 VDC, AC Power<br>Module optional  | Universal power,<br>50 - 250 VAC<br>and 22 - 250 VDC   | 100 - 240 VAC or 24 VAC / 24 VDC   | Universal power,<br>50 - 250 VAC & 22 - 250 VDC  | Universal power,<br>50 - 250 VAC<br>and 22 - 250 VDC   |  |
| '+24 VDC @ 50 mA   | Yes  | No   | Yes  | Yes  |  |
| Programming/Monitoring<br>App, Web Browser, Smart<br>Device Connectivity   | Custom programmable<br>mnemonics, 3 option card<br>slots,  | Ramp/soak, remote setpoint<br>and CT input   | Ramp/soak, remote setpoint<br>and CT input   | N/A  |  |
| Modbus, On-board Wi-Fi,<br>Ethernet and<br>Optional RS232  | Yes*   | Yes  | Yes*   | Yes  |  |
| Front panel  | Front panel  | IP65 only  | Front panel  | Sealed case  |  |

 $<sup>\</sup>ensuremath{^{*}}$  Meter/module requires option card to provide capability.



Red Lion has been delivering innovative solutions to global markets since 1972 through communication, monitoring and control for industrial automation and networking—enabling companies worldwide to gain real-time data visibility that drives productivity. Red Lion is part of Spectris plc, the productivity enhancing instrumentation and controls company. www.redlion.net

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