## MATRICES WITH BIST (Built-in Self Test)





Switching Series | PXIe Test And Measurement Suite

## **SMX-4XXX SERIES**

The VTI Instruments SMX-4XXX Series of matrix cards deliver exceptional performance and reliability by implementing extensive signal path shielding, isolation and built-in health monitoring. Built In Self-Test (BIST) capability can be used to determine relay health and provide confidence. Available models with software configurable switch subsystems increase flexibility and help control costs by allowing a single module to be used for different testing requirements. Embedded virtual schematic control further simplifies setup and debugging, allowing all relays to be engaged independent of application software.

Ideally suited for medium-to-high density automated test equipment (ATE) requiring multiple connection point flexibility, the SMX-4XXX Series provides uncompromised measurement integrity ideal for the most demanding aerospace, defense and automotive applications.

## **Features**

- Fully configurable and fixed configurations to provide user flexibility
- 300 VAC / 300 VDC
- 2 A Switching
- Embedded Virtual Schematic
- Configurable Internal Bussing Relays
- Relay Cycle Count Odometer
- Extensive End-to-End Signal Path Shielding
- Built-in Self Test to Determine Relay Health
- Software-configurable
- Embedded Health Monitoring
- Improved Test Reliability
- Exceptional Noise Immunity
- Efficient High-density Packaging
- Interactive Schematic Control
- 3 Year Warranty

## ATE MARKETS & APPLICATIONS

> AVIONICS

**> AUTOMOTIVE** 

ODDEDING INFORMATION

> ELECTRONICS

> DEFENSE AND AEROSPACE

> OIL AND GAS

> ENERGY / POWER GENERATION

SPECIFICATIONS	
Maximum Switching Voltage	300 VDC / 300 VAC
Maximum Switching Current	2 A
Maximum Switching Power	60 W DC, 62.5 VA
Bandwidth	> 82 MHz (typical)
Switching Time	< 8 ms
Path Resistance	< 500 mΩ
Insulation Resistance	> 1 X 10° Ω
Rated Switch Operations	
Mechanical	> 30 x 10 <sup>6</sup>
Electrical	> 10 x 10 <sup>3</sup>
Configurable Bussing Relays	Internal
End-to-End Signal Path Shielding	Yes
Specifications subject to change without no	tice.

UNDENING INFONMATION		
PART NO.	CONFIGURATION	
70-0409-108R	(4) 4x10, 2-wire, fully configurable	
70-0409-200R	(4) 4x10 2-wire Matrix, fixed	
70-0409-201R	(2) 4x20 2-wire Matrix, fixed	
70-0409-202R	(1) 4x40 2-wire Matrix, fixed	
70-0409-203R	(2) 8x10 2-wire Matrix, fixed	
70-0409-204R	(1) 8x20 2-wire Matrix	
	PART NO.  70-0409-108R  70-0409-200R  70-0409-201R  70-0409-202R  70-0409-203R	

Specifications subject to change without notice