#### **Features**

**For instruments:** Thermo/Finnigan ITD 700<sup>TM</sup>, Thermo/Finnigan ITD 800<sup>TM</sup>, Thermo/Finnigan ITS 40<sup>TM</sup>, Thermo/Finnigan Magnum<sup>TM</sup>, Varian Saturn I, II, II

- Easy Replacement
- Extended Linearity
- Low Noise
- Lower Cost
- Longer Life
- Greater Sensitivity
- High Performance
- Compact, On Axis Design
- Wide Dynamic Range
- Excellent Pulse Height Resolution

The Photonis Channeltron Mass Spec Detectors deliver high performance and are the preferred detector for mass spectrometers. A 100% test and inspection policy guarantees customers the highest quality and most reliable mass spectrometer detectors.

#### **Description**

**For instruments:** Thermo/Finnigan ITD 700<sup>TM</sup>, Thermo/Finnigan ITD 800<sup>TM</sup>, Thermo/Finnigan ITS 40<sup>TM</sup>, Thermo/Finnigan Magnum<sup>TM</sup>, Varian Saturn I, II, II

The Channeltron®; 4765 Mass Spec Detector offers the highest levels of performance for the Finnigan MAT Ion Trap Mass Spectrometers. If you use your Ion Trap for applications that demand ultimate sensitivity, superior linear response, and longer detector life, the 4765G Mass Spec Detector meets your requirements.

The sensitivity of any commercial Ion Trap Mass Spectrometer is ultimately a function of the sensitivity of its detector. We designed the 4765G to provide the lowest baseline noise of any commercially available detector. It includes a custom biasing scheme, tailored to provide low coupling capacitance between the high voltage and signal leads for the lowest baseline noise level.

Superior linear response from the 4765G Mass Spec Detector results in accurate quantification of mass spectral data for both trace and high level analyses. Our custom biasing scheme allows the 4765G to provide an absolutely linear response well beyond the limits of the instrument.

Longer detector life begins with a consistently low tune voltage. The gain response of the 4765G is specifically tailored for a lower tune voltage. Our optimized processing then ensures that the tune voltage stays low, providing you with consistently accurate results. This longer detector life results in less instrument downtime, making the 4765G the most economical detector available for your Ion Trap.

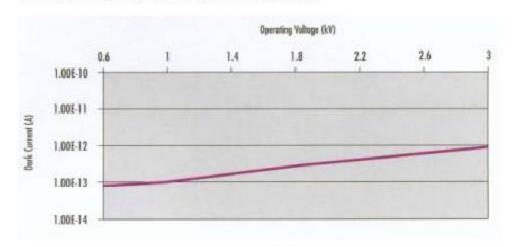
Easy, accurate installation of the 4765G Mass Spec Detector is guaranteed with our Quick-Fit<sup>TM</sup> mounting system. The detector simply snaps into the instrument in seconds, minimizing instrument downtime.

The newest technologies and the highest performance from the world's largest supplier of standard, retrofit and custom detectors for mass spectrometry. Channel $tron^{TM}$  - the first name in mass spec detectors

## **Specs**

SPECIFICATIONS	
Instrument	Finnigan ITD <sup>TM</sup> 700, 800, ITS40 <sup>TM</sup> and Magnum <sup>TM</sup> GCMS
Performance level	High sensitivity; Extended linear dynamic range; Extended detector life
Linear Range	> 1 microamp output current
Configuration	Quick-Fit <sup>™</sup> snap-in mounting hardware
Gain	$\geq 1 \times 10^5 \text{ at } 1700 \text{V} \geq 1 \times 10^7 \text{ at } 2700 \text{V}$
Resistance	50 to 90 x 10 <sup>6</sup> ohms at 25 °C
Dark Current	$\leq 1 \times 10^{-12}$ amps at -2000V
Max recommended Operating voltage	3000V

## TYPICAL GAIN CHARACTERISTICS



# LOW CHANNELTRON DETECTOR NOISE

