

OKO[®] Tech introduces A4MEMS low-cost high-voltage amplifier

Delft, The Netherlands, - November 1, 2006 - Flexible Optical B.V. (aka OKO[®]Tech) today announces introduction of A4MEMS: a novel low-cost high-voltage DC amplifier.

A4MEMS measures 110 x 60 x 30mm. It provides 0 ... 300 V output in 4 independent channels. Voltage ranges up to 0 ... 400V are available on special order. The unit does not require any external high voltage supply and can be powered from any 15 V 200 mA laboratory supply. A4MEMS was specially designed as a quick low-cost solution for prototyping of multichannel high-voltage MEMS circuits. Each of its 4 independent amplifiers with gain of 59 is capable of driving capacitive loads up to 10 nF in the frequency range of DC to 250 Hz. 1 nF loads can be driven in the frequency range of up to 1 kHz, with full 300 V amplitude. A4MEMS is usable for driving a wide variety of electrostatic and piezo-electric actuators.

A4MEMS features a complete short circuit protection – the unit can continuously operate with all 4 outputs connected to the ground, regardless of the state of its inputs. Several units can be combined for quick prototyping of multi-channel high-voltage drivers in telecom applications and adaptive optics. The device have single common ground for all inputs, outputs and the power supply.

Parameter	Value
Dimensions / weight	110 x 60 x 30mm / 330 g
Power consumption	2.5 W
Temperature range	Operation: 0 ... +70 C, storage : -40 ... +110 C
Power supply	Single supply, in the range +15 ... +24 V, 200 mA
Output voltage	0.5 ... 300 V (0.5 ...100 to 0.5... 400 V on special order)
Amplifier DC gain	59, the gain can be altered individually in each channel on a special order
Output impedance	330 kOhm (5 kOhm version on a special order)
Capacitive load	0 ... 30 nF
Frequency range	DC to 1 kHz on a 1 nF load
Slew rate, V/ms	~1000
Ripple on a 4 nF load	Less than 200 mV
Price	EUR 400 p/p for a single unit, EUR 300 p/p for 10+, EUR 250 p/p for 25+

