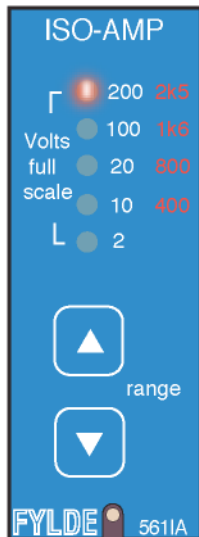


FE-561-IA Isolation Amplifier



Front panel shown actual size

Power Line Monitoring

Ground Loop Elimination

Current Shunt Measurements

Data Acquisition or Oscilloscope front end

The FE-561-IA is a high voltage isolation amplifier for front end use when hazardous inputs must be measured.

The amplifier comprises a low noise, low drift input stage with differential characteristics, a high performance isolation stage and a filter with buffered voltage output.

Voltage isolation is 1500V RMS.

There are 9 input ranges with a maximum of 2500V pk (1800V RMS sinewave).

The amplifier is exceptionally easy to use and is fully protected on all ranges to 3kV pk continuous.

Maximum Bandwidth is 50kHz.

Applications include power line monitoring including high side current shunts, ground loop elimination and as a protected front end for data acquisition systems recorders and oscilloscopes.

Two sizes of enclosure are available :-
FE-PE8 for up to 8 amplifiers.
FE-PE17 for up to 16 amplifiers.

Power source is either 115 or 230V 50/60Hz

ISOLATION	Voltage Capacitance Resistance Mode Rejection Leakage Current	>1500V RMS (tested 5s @2500V). 15pF. >50 x 10 ⁹ ohms. >120dB (dc to 60Hz). S/C source. < 2μA RMS at 230V RMS 50Hz.
RANGES	Switched Indication Linearity Accuracy Temp.Coefficient Stability Locking	2500V,1600V, 800V, 400V, 200V, 100V, 20V, 10V, 2V input for 10V Fullscale (10V) output. Green LED to 200V, Red LED from 400V. ±0.02% FS. ±0.25 % of gain setting. < 0.01% per °C. < 0.1% change over 12 months. Internal jumper locks range.
FREQUENCY RESPONSE		DC - 50kHz (3dB).
INPUT	Voltage Withstand Protection rating Offset Voltage / TC Impedance Noise	Maximum 2.5kV Pk or 2kV DC continuous. 3kV pk continuous or 2.5kV DC 2 minutes. CAT III 600V. CAT IV 300V. <200μV / <10μV/°C RTI. >2.5M Ω. < 50μV pk-pk dc-50kHz RTI.
FILTER	Internal Low Pass filter Setting	3 pole Butterworth (60dB/decade). 50Hz to 50kHz by plug in Resistor network. (delivery standard 50kHz).
OUTPUT	Voltage Range Noise / offset Offset Temp Coefficient	± 10V nominally @ ± 2mA. <2mV RMS DC - 50kHz / <±15mV. < 1mV/°C.
TEMPERATURE RANGE		0 - 50°C.
POWER SUPPLY	Requirement	200-250V 50Hz standard. 100-125V 50/60Hz to order. 11-14VDC by FE-605-DCC fitment.
CONNECTOR		25 way 0.1" pitch edge connector.
MECHANICAL	Dimensions / weight	panel 2.75" x 1", overall depth 8.2" / 200gm
HOUSING		8 modules fit FE-PE8. Up to 16 in FE-PE17(RK) RK= Rack Mount.
PRESENTATION		Blue front panel 2.75" x 1".