



AVTECH ELECTROSYSTEMS LTD.

NANOSECOND WAVEFORM ELECTRONICS
SINCE 1975

P.O. BOX 265
OGDENSBURG, NY
U.S.A. 13669-0265
TEL: (315) 472-5270
FAX: (613) 226-2802

TEL: 1-800-265-6681
FAX: 1-800-561-1970
U.S.A. & CANADA

BOX 5120 STN. F
OTTAWA, ONTARIO
CANADA K2C 3H4
TEL: (613) 226-5772
FAX: (613) 226-2802

INSTRUCTIONS

MODEL AV-142-M1 AMPLIFIER

S.N. :

WARRANTY

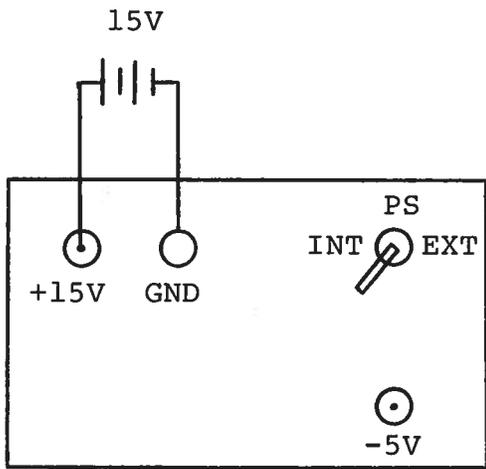
Avtech Electrosystems Ltd. warrants products of its manufacture to be free from defects in material and workmanship under conditions of normal use. If, within one year after delivery to the original owner, and after prepaid return by the original owner, this Avtech product is found to be defective, Avtech shall at its option repair or replace said defective item. This warranty does not apply to units which have been disassembled, modified or subjected to conditions exceeding the applicable specifications or ratings. This warranty is the extent of the obligation or liability assumed by Avtech with respect to this product and no other warranty or guarantee is either expressed or implied.

BASIC SPECIFICATIONS

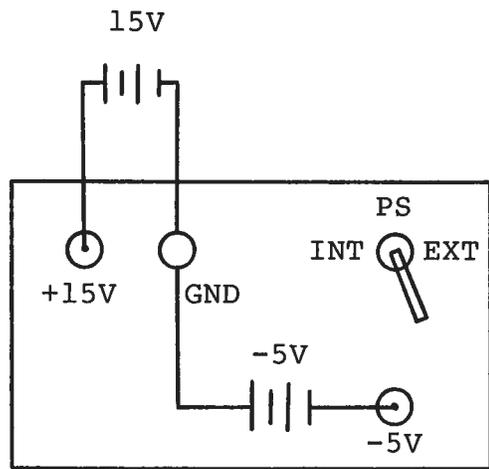
Model designation:	AV-142-M1
Frequency range:	DC to 100 MHz
Input impedance:	100K (< $\pm 0.5\%$ variation over frequency range of 0.8 to 8.0 MHz)
Gain:	≥ 26 db
Input conversion noise:	1.7 nV/ $\sqrt{\text{Hz}}$ (for $f \geq 100$ kHz)
1 db comp. out:	$\geq +7$ dbm (0.5 Vpp at load impedance of 50 Ohms)
Connectors:	SMA
Prime power:	a) PS switch in INT position: i) +15 VDC 100 mA b) PS switch in EXT position: i) +15 VDC 50 mA ii) -5 VDC 50 mA
Other:	See standard AV-142

PS INT-EXT SWITCH

When the PS switch is in the INT position, a self-contained 50 kHz DC to DC convertor generates -5 VDC required internally. This 50 kHz convertor may generate low level interference signals which may appear as noise at the amplifier output. If this 50 kHz interference is found to be a problem, then the PS switch should be placed in the EXT position (in which case the 50 kHz convertor does not function) and the unit then requires that +15 VDC and -5 VDC be applied as shown below.



PS switch in INT position



PS switch in EXT position

MODEL AV-142-M1 POWER SUPPLY CONNECTIONS

Nov. 15/93

Fig. 1

Fig. 2

