

# Blasting Measurement Microphone

FOR USE WITH ECHOPRO & FUSION BLAST MONITOR

## APPLICATIONS

The 7052S/4052 Measurement Microphone/Preamp is intended for OEM applications requiring a cost-effective, stable, flat, and rugged mic. The back electret construction eliminates the need for any polarizing voltage. The Titanium diaphragm assures both short and longterm stable frequency and amplitude response over a wide range of environmental conditions. The performance exceeds IEC specifications for TYPE 2 microphones. The ES7052/ES4052 extends the low frequency performance of the standard 7052/4052 mic/preamp combination.

SENSORS



Perfect for Compliance Monitoring and other air pressure monitoring applications.

*Microphone and pre-amp assembly shown at right with optional 3" foam wind shield.*



# TECHNICAL SPECIFICATIONS

## 7052 / 4052

<b>Frequency Response:</b>	20 Hz to 20 kHz $\pm$ 3dB Determined by the preamp
<b>Sensitivity:</b>	7052S Capsule - (-)33dBV/Pa (20 mV) Open Circuit
<b>Preamp Loss:</b>	-Preamp Loss: -2 dB Typ
<b>Preamp Operating Voltage:</b>	(+)9Vdc to 15 Vdc
<b>Usable Dynamic Range:</b>	24 dBA (equivalent "A" weighted noise floor) Upper Limit (Determined by Preamp Operating Voltage) 9Vdc - 130 dBSPL 15 Vdc - 140 dBSPL
<b>Preamp Connector</b>	Cable - ACO Pacific Model Number 7052SC
<b>Connector Pinout:</b>	Pin A - (V+) Pin B - N/C Pin C - Signal Pin D - N/C Pin E,F -(V-) Shield at Equipment En

## ES7052H / ES4052

<b>Frequency Response:</b>	<1 Hz $\pm$ 2dB to 20KHz with ES4052 Preamp
<b>Sensitivity:</b>	7052H Capsule -22dBV/Pa (22mV/Pa) Open Circuit typ. On ES4052 Preamp (23 dB loss) -45 dBV/Pa (2 mV/Pa) typ. preamp out
<b>Preamp Loss:</b>	-18 dB typ – measured with DM2-22 (22pF) dummy mic 12Vdc power About -20 dB loss with ES7052H capsule capacitance Capsule "H" Grid Holes in place of slotted Testing to 1 Hz 1Hz (-)2 dB relative to100 Hz response as measured with a B&K 4221 LF source
<b>Preamp Operating Voltage:</b>	(+) 9 Vdc to 15 Vdc
<b>Usable Dynamic Range:</b>	Upper Limit (determined by preamp operating voltage) 12 Vdc – 150+ dBSPL microphone dependent (2 Vrms)
<b>Preamp Connector:</b>	Cable - 7052SC supplied standard or 7052FC (flange) an option
<b>Connector Pinout:</b>	Pin A - (V+) Pin B - N/C Pin C - Signal Pin D - N/C Pin E,F -(V-) Shield at Equipment End

MODIFICATIONS / <b>ES7052</b>	Capsule "H" Grid Holes in place of slotted Testing to 1 Hz 1Hz (-)2 dB relative to100 Hz response as measured with a B&K 4221 LF source
MODIFICATIONS / <b>ES4052</b>	Z in resistor 5000 Megohms Shunt capacitor 150pF (acts as attenuator)

