

# AT4071a LINE + GRADIENT CONDENSER MICROPHONE



- Designed for critical long-distance pickup in broadcasting, film/TV production, and theater sound reinforcement applications
- Direct-coupled, balanced output ensures a clean signal even in high-output conditions
- Exclusive acoustic design provides same directivity as mics up to 50% longer (U.S. Patent No. 4,789,044)
- Rugged housing made of lightweight structural-grade aluminum alloy
- Switchable low-frequency roll-off

The AT4071a is intended for use in professional applications where remote power is available. It requires 11V to 52V DC phantom power, which may be provided by a mixer or console, or by a separate, in-line source such as the Audio-Technica AT8801 single-channel or CP8506 four-channel phantom power supplies.

Output from the microphone's XLRM-type connector is low impedance (Lo-Z) balanced. The signal appears across Pins 2 and 3; Pin 1 is ground (shield). Output phase is "Pin 2 hot" – positive acoustic pressure produces positive voltage at Pin 2.

An integral 150 Hz high-pass filter provides easy switching from a flat frequency response to a low-end roll-off. The roll-off position reduces the pickup of low-frequency ambient noise (such as traffic, air-handling systems, etc.), room reverberation and mechanically coupled vibrations.

Avoid leaving the microphone in the open sun or in areas where temperatures exceed 110° F (43° C) for extended periods. Extremely high humidity should also be avoided.

## AT4071a SPECIFICATIONS†

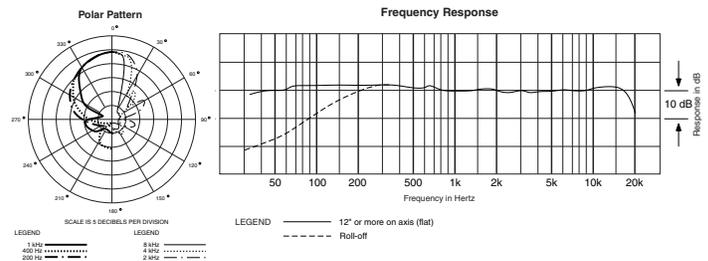
<b>ELEMENT</b>	Externally polarized (DC bias) condenser
<b>POLAR PATTERN</b>	Line + gradient
<b>FREQUENCY RESPONSE</b>	30-20,000 Hz
<b>LOW-FREQUENCY ROLL-OFF</b>	150 Hz, 12 dB/octave
<b>OPEN CIRCUIT SENSITIVITY<sup>1</sup></b>	-21 dB (89.1 mV) re 1V at 1 Pa*
<b>IMPEDANCE</b>	100 ohms
<b>MAXIMUM INPUT SOUND LEVEL</b>	124 dB SPL, 1 kHz at 1% T.H.D.
<b>NOISE<sup>2</sup></b>	12 dB SPL
<b>DYNAMIC RANGE (typical)</b>	112 dB, 1 kHz at Max SPL
<b>SIGNAL-TO-NOISE RATIO<sup>2</sup></b>	82 dB, 1 kHz at 1 Pa*
<b>PHANTOM POWER REQUIREMENTS</b>	11-52V DC, 3.2 mA typical
<b>SWITCH</b>	Flat, roll-off
<b>WEIGHT (less accessories)</b>	5.5 oz (155 g)
<b>DIMENSIONS</b>	15.55" (395.0 mm) long, 0.83" (21.0 mm) body diameter
<b>ACCESSORIES FURNISHED</b>	AT8405a stand clamp for 5/8"-27 threaded stands; AT8135 windscreen; protective carrying case

†In the interest of standards development, A.T.U.S. offers full details on its test methods to other industry professionals on request.

\*1 Pascal = 10 dynes/cm<sup>2</sup> = 10 microbars = 94 dB SPL

<sup>1</sup> Measured at diaphragm

<sup>2</sup> Typical, A-weighted, using Audio Precision System One. Specifications are subject to change without notice.



**Audio-Technica U.S., Inc.**, 1221 Commerce Drive, Stow, Ohio 44224  
**Audio-Technica Limited**, Old Lane, Leeds LS11 8AG England  
[www.audio-technica.com](http://www.audio-technica.com)

P51663-EN ©2004 Audio-Technica U.S., Inc. Printed in Japan