



## CRY3261-S02

### 1/2" Free-field, Pre-polarized, Ultra-low noise Microphone Set



#### Features

- **Features**

Sensitivity	450 mV/Pa
Dynamic Range	6.5 dB to 100 dB
Frequency Range	6 Hz to 20 kHz

- **Applications**

Low-noise Testing  
Product Self-noise Testing  
Home Appliance Noise Measurement

- **Components**

CRY3261 1/2" Free-field Pre-polarized Microphone  
CRY517 1/2" IEPE Preamplifier

#### Introduction

The CRY3261 - S02 is a 1/2 - inch free - field pre - polarized measuring microphone and pre - amplifier, specifically designed for noise measurements below 10 dB.

The CRY3261 - S02 has a background noise as low as 6.5 dB, making it an ideal choice for detecting and measuring ultra - low noise levels. Typical applications include measuring product self - noise, home appliance noise, transformer current noise, and evaluating environmental noise.

#### Check out our Microphone Selection Guide

[acsoft.co.uk/microphone-selection-tool](http://acsoft.co.uk/microphone-selection-tool)

#### Highlights

- **Use of Ultra-low noise Free-field Microphones**

The dynamic range of the low-noise microphone can be as low as 6.5 dB, enabling it to measure sound pressure levels close to the threshold of human hearing. It is an ideal choice for the detection of extremely low noise.

Free-field microphone sets are specifically designed for measurements in environments that are free from reflections or echoes and are widely used in fields such as acoustic research, noise monitoring, and sound system testing.

- **Compatibility**

The CRY3261 - S02 low - noise microphone set abandons the pre - amplifier that requires a traditional power supply module for power supply. Instead, it adopts the IEPE power - supply method and can be directly connected to data analysis instruments compatible with IEPE.

- **TEDS Microphone Set**

Supports TEDS, and TEDS programmed to the IEEE 1451.4 standard for SMART transducers, V 1.0 format.

- **Calibration**

Each CRYSOUND microphone set is calibrated at the factory using traceable calibration equipment. Calibration certificates are provided with each unit. CRYSOUND recommends recalibration at least once a year.

- **Quality & Warranty**

All CRYSOUND microphone capsules use 3rd generation titanium diaphragms and protection grids and synthetic sapphire insulators - resulting in the most rugged and reliable measurement microphones on the market. Titanium provides superior corrosion resistance, high temperature stability, impact resistance and strength-to-mass than traditional nickel and stainless steel. All capsules are assembled in strict clean-room environments for maximum quality.

CRYSOUND microphones enjoy a ten-years warranty period. We will provide users with comprehensive aftersales support services.

# Technical Specifications

## Specifications

Field Type	Free-field
Sensitivity ( $\pm 1.5$ dB)	450 mV/Pa, -7 dB re 1V/Pa
Frequency Response	10 Hz to 16kHz $\pm 2$ dB 6 Hz to 20kHz $\pm 3$ dB
Polarization Voltage	0V
Dynamic Range Lower Limit	6.5 dB, Typical: 6.0 dB
Dynamic Range Upper Limit (re. 20uPa)	6.5 dB, Typical: 6.0 dB
Power Supply (IEPE)	4mA -20mA, typical 4mA
Operating Temperature	-20°C to +60°C (-4°F to +140°F)
Temperature Stability	0.012 dB/°C (-10°C to +50°C) 0.008 dB/°F (+14°F to +122°F)
Static Pressure Stability	-0.01 dB/kPa
Operating Humidity Range	0 to 90%RH no condensation
Humidity Stability	< 0.1 dB (0 to 90%RH no condensation)
Pressure Equalization Vent	Rear vented
IEC 61094-4 Type	WS2F
Output Impedance	35 $\Omega$
Interface Type	BNC

## Frequency Response

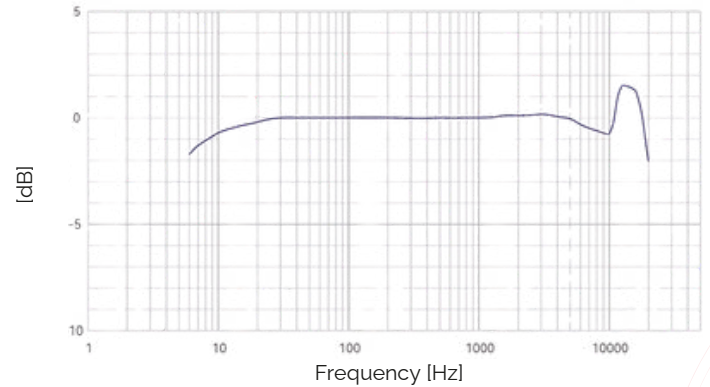


Fig.1 CRY3261-S02 Microphone Set Typical Frequency Response

## Dimensions

Height with Grid	91.5 mm (3.6")
Diameter with Grid	13.2 mm (0.52")

## Drawings (mm) [inch]

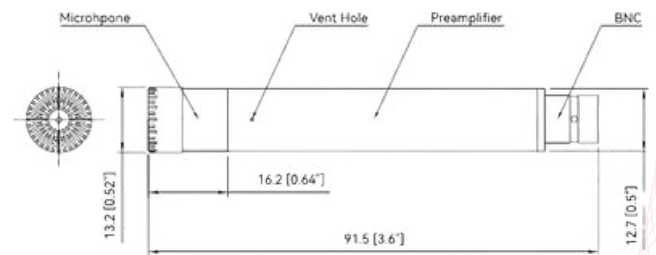


Fig.2 CRY3261-S02 Microphone Set Drawings

# Ordering information

## Consisting of

Measurement Microphone	CRY3261 1/2" Free-field Pre-polarized Microphone
Pre-amplifier	CRY517 IEPE Pre-amplifier
Cable	BL5001 BNC to BNC Cable /1.6m

## Related Products

CRY3203-S01	1/2" free-field prepolarized microphone set, 50mV/Pa, 3.15Hz-20kHz, 15dB-138dB
CRY3401-S01	1/4" free-field prepolarized low-noise microphone set, 15.8 mV/Pa, 4 Hz-40 kHz, 26 dB-148dB
CRY3721-S01	IEC 60318 - 4 Ear simulator set for the measurement of Insert earphones, 9 dB - 110 dB