

# BP40

## Large-Diaphragm Dynamic Broadcast Microphone



### Features

- **Rich, natural condenser-like sound**
- **Large diameter diaphragm with patented floating-edge construction for optimal performance**
- **Humbucking coil prevents electromagnetic interference (EMI)**
- **Optimized capsule placement for commanding vocal presence even at a distance**
- **Hypercardioid polar pattern provides maximum feedback rejection and isolation of desired sound source**
- **Switchable 100 Hz high-pass filter**
- **Multistage windscreen provides superior internal pop filtering**
- **Rugged, all-metal construction for dependable use in professional broadcast environments**

### Description

The BP40 is a large-diaphragm dynamic microphone with a hypercardioid polar pattern. It is designed for use as a broadcast vocal microphone.

The hypercardioid polar pattern of the microphone is more sensitive to sound originating directly in front of the element, making it useful for controlling feedback and reducing pickup of unwanted sounds.

The output of the microphone is a 3-pin XLRM-type connector.

The microphone is equipped with a switch that permits choice of flat response or low-frequency roll-off (via integral 100 Hz high-pass filter).

The microphone is enclosed in a rugged housing with a multistage windscreen. The capsule is set back from the screen to provide a more consistent response. The included AT8483 mounting clamp fits any microphone stand with 3/8"-27 threads. For improved protection from noise, shock and vibration, the AT8484 shock mount, available separately, may be used in place of the mounting clamp; it likewise fits stands with 3/8"-27 threads. A soft protective pouch is also included.

### Installation and Operation

Output 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.

To avoid phase cancellation and poor sound, all mic cables must be wired consistently: Pin 1-to-Pin 1, etc.

An integral 100 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.

To engage the filter slide the switch toward the "bent" line.

Take care to keep foreign particles from entering the windscreen. An accumulation of iron or steel filings on the diaphragm, and/or foreign material in the windscreen's mesh surface, can degrade performance.

### Specifications

<b>Element</b>	Dynamic
<b>Polar pattern</b>	Hypercardioid
<b>Frequency response</b>	50 - 16,000 Hz
<b>Low frequency roll-off</b>	100 Hz, 6 dB/octave
<b>Open circuit sensitivity</b>	-48 dB (3.9 mV) re 1V at 1 Pa
<b>Impedance</b>	450 ohms
<b>Switches</b>	Flat, roll-off
<b>Weight</b>	632 g with AT8483
<b>Dimensions</b>	164.0 mm long, 56.0 mm diameter
<b>Output connector</b>	Integral 3-pin XLRM-type
<b>Accessories furnished</b>	AT8483 mounting clamp for 3/8"-27 threaded stands; 3/8"-27 to 3/8"-16 threaded adapter; soft protective pouch
<b>Optional Accessory</b>	AT8484 Shock mount

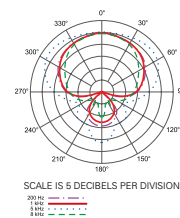


Soft Protective Pouch



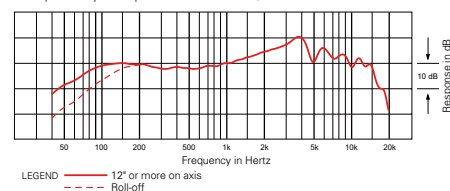
AT8483

### polar pattern



AT8484  
(optional accessory)

### frequency response: 50~16,000 Hz



# BP40

大型振模式广播级动圈话筒



## 特点

- 丰富而自然的音色，有如电容式拾音器的效果。
- 专利的浮动边缘结构，使大直径振膜能发挥最佳的表现。
- **Humbucking** 双音圈结构能有效防止电磁干扰(EMI)。
- 优化拾音器的位置布局，即是在远距离的高处发言亦能接收。
- 超心形指向收音，可提供了最大的反馈抑制并和所需的声源隔离。
- 设有 **100 Hz** 的高通滤波器开关。
- 多层式防风罩提供了出色的内层喷气声过滤。
- 坚固的全金属结构，对专业广播的使用环境更为可靠。

## 介绍

BP40是一枚大型振膜结构的动圈话筒，收超心形指向性收音，是专为广播专业人员的话音收音而设计。

话筒的超心型指向性设计，对于收音单元的正前方音源更为敏感，能直接和有效控制反馈以及和减少收到环境的其他噪声。

话筒输出接线端为标准的XLRM-3卡农公头。

内置高质量高通滤波电路，可由平直的频率响应，开启为于100Hz以下衰减的收音效果(通过一体式100Hz高通滤波器)，该高通滤波器可减低收音环境中低频噪声、房间中的回声及机械性的震动声。

话筒封装在一个坚固的外壳中，配有多层式防风网罩，收音元件安装在网罩后方，能有效提供更稳定的收音响应。随附的AT8483话筒架可连接话筒安装在任何采用 5/8"-27 螺纹的话筒支架上，此外还提供便携保护包。为能获得更良好的收音效果，可选配AT8484防震架，能提供防震及减噪的保护，该防震架相样可安装在任何采用 5/8"-27 螺纹的话筒支架上。

## 安装与操作

话筒的输出端为低阻抗平衡输出，话筒音频信号最终以卡农公头的2号及3号针脚输出，而1号针脚则为地线(屏蔽)连接。输出相位将以正相位电平设于2号针脚上。

为避免出现相位相互抵消而失真的情况，所有话筒连接时，接线必需以1-1, 2-2, 3-3型式把针脚连接。

内置高通滤波电路，可轻易由平直的频率响应，开启为于100Hz以下衰减的收音效果，应用高通滤波器可减低话筒收到环境中低频噪声(如外间汽车引擎声，空调系统的风声等)、或房间中的回声及机械性的震动声。

当需要使用滤波器时，请把开关推至“弯曲线”图示的位置。

小心不要把金属碎或铁屑掉进防风罩内，铁屑会吸进收音头磁铁中，或贴在防风罩内，将会影响及减低收音效果。

## 技术指标

收音头	动圈式
指向特性	超心形指向
频率响应	50 - 16,000 Hz
高通滤波	100 Hz, 6 dB/octave
开通灵敏度	-48 dB (3.9 mV) 以 1V 于 1 Pa
阻抗	450 欧姆
开关	平直/高通滤波
重量	632 克 (连同 AT8483)
外形尺寸	长 164.0 mm, 机体直径 56.0 mm
输出端子	内置 XLRM-3 针卡农公头
标准配置	AT8483 专用带 5/8"-27 螺纹话筒夹; 5/8"-27 至 3/4"-16 螺纹转换头; 便携保护包
选配件	AT8484 带 5/8"-27 螺纹话筒防震架

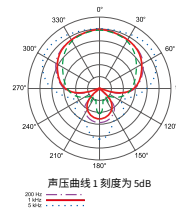


便携保护包



AT8483

## 指向特性

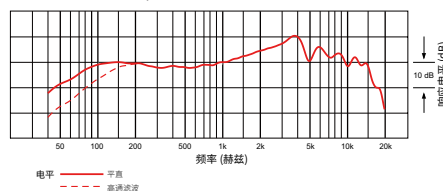


声压曲线 1 刻度为 5dB



AT8484 (选配件)

## 频率响应: 50~16,000 Hz



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