# Electro-Voice



## N/D967

## N/DYM<sup>®</sup> Dynamic Supercardioid Concert Vocal Microphone

- Highest gain-before-feedback
  performance vocal microphone
- Optimized response for live performance
- Unique removable front grille assembly and pop filter for easy hygienic cleaning
- · EV-exclusive personality switch
- Superior multistage shock mount for unmatched low handling noise

#### Description

The Electro-Voice N/D967 is a supercardioid dynamic microphone ideally suited for vocal use in live sound reinforcement, including large and small concert sound venues. The characteristics of the N/D967 have been optimized to dramatically reduce feedback under live performance conditions, particularly with typical monitor speaker placement, ensuring superior gain-before-feedback. The N/ D967 utilizes a revolutionary neodymium alloy to form the EV-exclusive N/DYM® magnet. With a computer-optimized design, the N/DYM<sup>®</sup> magnetic structure is maximized in the N/D967 to provide unprecedented output sensitivity over conventional dynamic designs. The exceptional sensitivity of the N/D967, combined with the inherently low noise of a dynamic transducer, insures superior signal-to-noise which is ideal for digital recording and sampling. To further reduce noise, a highly effective humbucking coil is used to cancel hum from lighting and other power sources.

The N/DYM<sup>®</sup> magnet geometry combined with a reinforced diaphragm design forms a smooth, extended frequency response with a warm, open, transparent sound quality only found in studio-quality microphones. The N/D967 microphone features an advanced version of the AcoustiDYM<sup>TM</sup> shockmount system. This unique vibration isolating system works as a multistage device. At low frequencies, a rear sound wave cancels the diaphragm motion, while at high frequencies, the specially designed rubber shock mount isolates the transducer from motion. To work optimally in concert-sound applications, the AcoustiDYM<sup>TM</sup> shock mount is tuned to a low-resonant frequency. A custom transformer limits the low-frequency response and adjusts the impedance. This combination has been matched to preserve the accurate reproduction of the voice range. Combining AcoustiDYM<sup>TM</sup> with the custom transformer, elastomeric Warm-Grip<sup>™</sup> handle, and windscreen bumper, an advanced-technology vibration isolating system is formed which dramatically reduces all forms of handling noise for the most demanding situations.

The N/D967 has a unique personality switch to fit the demands of live sound. In the normal position (–), the microphone exhibits a very smooth slightly rising response. This provides a fuller sound and is preferred where the microphone is used several inches from the lips. In the presence position ( $\neg$ ), the mid frequencies are slightly attenuated. This gives the microphone more cut when used with high level monitors or when used in a lips-touching-the-screen fashion.

The microphone has a washable grille screen and two-stage pop filter to reduce wind blast noise, a problem especially troublesome where extended-response woofer systems are used. Within the grille screen is a stainlesssteel retainer which holds the hygienic pop filter in position, reducing explosive wind blasts. The stainless-steel retainer and hygienic pop filter make cleaning and disinfecting the grille screen a simple task, desirable for on-the-road use where stage makeup and perspiration often enter the microphone.

The N/D967 has a broadband supercardioid polar pattern. Compared to the more traditional, heart-shaped cardioid pattern, a supercardioid pattern rejects more sound at the sides and rear overall. The N/D967 also features improvements to the transducer that increase sensitivity and provide an extremely uniform polar pattern throughout the vocal frequency range. These characteristics tend to reduce feedback under live performance conditions, particularly with typical monitor speaker placement, ensuring superior gain-before-feedback in live applications.

### N/D967 Supercardioid Concert Vocal Microphone

The dynamic element of the N/D967 provides reliable operation in extreme temperature and humidity. The metal handle is covered with the unique Warm-Grip<sup>TM</sup> handle. This design provides the strength, light weight and comfort needed for on-stage handheld use. The Memraflex<sup>TM</sup> grille screen is made from a specially hardened material to resist damage. This all-metal-core construction will provide years of trouble-free, on-the-road operation.

The exceptional sensitivity of the N/D967 combined with the inherently low noise of a dynamic transducer ensures a superior signal-to-noise ratio ready for high-dy-namic-range sound systems.

#### Operation

The switch-selected response of the N/D967 allows the user the option of adding more presence to the sound when needed. The normal position (-) provides a slightly rising response when the microphone is positioned further than 12 inches from the sound source. The low-frequency response can be extended by positioning the microphone closer to the sound source. This "proximity effect" occurs when the microphone is placed less than 12 inches from the sound source and increases as the distance is reduced. The presence position (-) reduces the mid-frequency response to improve clarity when the microphone is used very close to the sound source, where the "proximity effect" can overwhelm the output.

#### **Certified Performace**

Every N/D967 is inspected by a qualitycontrol tester and subjected to a computercontrolled test system that verifies numeous performance parameters. After the performance meets or exceeds our rigorous standards, the actual measured frequency response of each unit's plotted on a "Certificate of Performance" and included with the microphone. Certified performance response may vary from published "Average Response." This certificate guaranties that each N/D967 will perform to the exacting standards established by EV design engineers — **100% quality-assurance testing.** 

#### Limited Warranty

Electro-Voice products are guaranteed against malfunction due to defects in materials or workmanship for a specified period, as noted in the individual product-line statement(s) below, or in the individual product data sheet or owner's manual, beginning with the date of original purchase. If such malfunction occurs during the specified period, the product will be repaired or replaced (at our option) without charge. The product will be returned to the customer prepaid. Exclusions and Limitations: The Limited Warranty does not apply to: (a) exterior finish or appearance; (b) certain specific items described in the individual product-line statement(s) below, or in the individual product data sheet or owner's manual; (c) malfunction resulting from use or operation of the product other than as specified in the product data sheet or owner's manual; (d) malfunction resulting from misuse or abuse of the product; or (e) malfunction occurring at any time after repairs have been made to the product by anyone other than EVI Audio Service or any of its authorized service representatives. Obtaining Warranty Service: To obtain warranty service, a customer must deliver the product, prepaid, to EVI Audio Service or any of its authorized service representatives together with proof of purchase of the product in the form of a bill of sale or

receipted invoice. A list of authorized service representatives is available from EVI Audio Service at 600 Cecil Street, Buchanan, MI 49107 (800/685-2606 or FAX 616/695/4743). Incidental and Consequential Damages Excluded: Product repair or replacement and return to the customer are the only remedies provided to the customer. Electro-Voice shall not be liable for any incidental or consequential damages including, without limitation, injury to persons or property or loss of use. Some states do not allow the exclusion or limitation of incidental or consequential damages so the above limitation or exclusion may not apply to you. Other Rights: This warranty gives you specific legal rights, and you may also have other rights which vary from state to state.

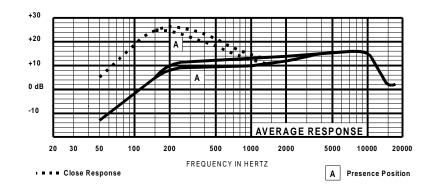
Electro-Voice Wired Microphones are guaranteed against malfunction from any cause for two (2) years from the date of original purchase. In addition, the Limited Warranty for the acoustic system contained in these microphones shall apply for the life of the product, defined as a period of ten (10) years from the date that the manufacture of the specific microphone has been discontinued. Any and all active electronics incorporated in these microphones are guaranteed against malfunction due to defects in materials or workmanship for a period of three (3) years from the date of original purchase. The Limited Warranty does not extend to cables, cable connectors, or switches. Additional details are included in the Uniform Limited Warranty statement.

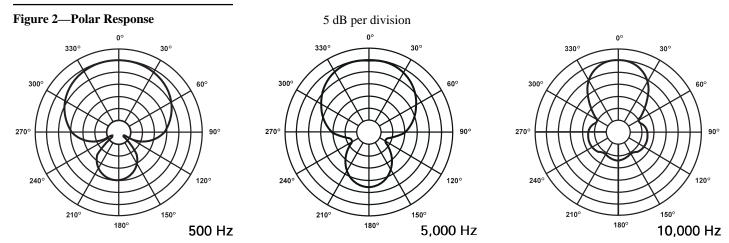
For technical assistance, contact Technical Support at 800/234-6831 or 616/695-6831, M-F, 8:00 a.m. to 5:00 p.m. Eastern Standard time.

Specifications subject to change without notice.

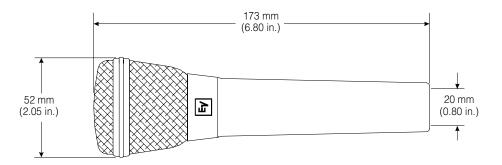
## N/D967 Supercardioid Concert Vocal Microphone

#### Figure 1—Frequency Response





#### Figure 3—Dimensions



## N/D967 Supercardioid Concert Vocal Microphone

pecifications
requency Response,
Close Response:
50-13,000 Hz
Far Response:
120-13,000 Hz
olar Pattern:
Supercardioid
ensitivity,
Open Circuit Voltage @ 1 kHz:
4.0 mV/pascal
ower Level @ 1 kHz:
-52 dB
(0  dB = 1  mW/pascal)
ynamic Range:
142 dB
quivalent Output Noise:
16 dB A weighted
(0  dB = 0.00002  pascal)
olarity:
Positive pressure on diaphragm causes
positive voltage on pin 2 ref. pin 3
npedance:
600 ohms balanced (low-Z)
laterials,
Grille Screen:
Memraflex <sup>TM</sup>
Handle:
Warm-Grip <sup>TM</sup>
Finish:
Nonreflecting black
ccessories Included:
323S stand clamp
Soft zippered "gig" bag
imensions,
Length:
173 mm (6.80 in.)
Diameter:
52 mm (2.05 in.)
Shank:
20 mm (0.80 in.)
et Weight:
260 g (9.2 oz)
hipping Weight:
655 g (19 oz)

#### MADE IN USA



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MICROPHONES - N/DYM®