**GENERAL**

The 527B microphone is an extremely reliable handheld dynamic microphone with an extended low- and high-frequency response particularly suited to ham radio use, mobile FM transmission, and top-quality paging systems. The microphone has a clear, crisp, and natural voice response. It features small size, light weight, and modular construction.

The modular construction of the 527B permits ease of field serviceability. The design of the cartridge, switch, and cable makes them easily replaceable. The microphone is wired to prevent lead breakage or crimping.

The unit fits naturally and comfortably in the hand and is not affected by heat or humidity. The exclusive ARMO-DUR® case is immune to oil, grease, fumes, salt spray, sun, rust, and corrosion and is outstanding in its ability to withstand mechanical shocks and vibrations. The “Million-Cycle” leaf-type switch is designed to withstand severe operating conditions and constant usage.

**INTERNAL CONNECTIONS**

![Internal Connections Diagram](image)

**APPLICATIONS**

The 527B microphone is highly recommended for all types of mobile communications, ham radios, industrial and commercial paging systems, and outdoor public address systems. The 527B is a low-impedance microphone and is recommended where long cable lengths are required.

**INSTALLATION**

A quick release mounting bracket for permanent installation is supplied with each microphone. The bracket has mounting holes with clearance for No. 6 or No. 8 screws (see Figure 4).

**CONNECTIONS**

The internal switch connections of the 527B are shown in Figure 1. The 527B has a four-conductor, coiled cord cable and a double-pole, single-throw, leaf-type switch to control the microphone circuit and an external relay or switching circuit. The WHITE and GREEN leads are the audio conductors for balanced-line connection to the microphone circuit; the shield is connected to the microphone circuit ground (see Table 1).

![Cable-To-Connector Wiring Table](image)
The 527B is wired for balanced-line operation and is recommended for use where long cable lengths are required, or areas where strong noise fields may exist. The 527B microphone can be fed directly into a standard low-impedance amplifier, or a Shure A95 Series Line Matching Transformer can be used for coupling the 527B to the input of a high-impedance amplifier. A two-conductor shielded cable can be used for extending only the microphone circuit. If both the microphone circuit and the remote circuit are to be extended, a four-conductor cable, having two shielded conductors for the microphone, should be used.

OPERATION

The 527B will operate satisfactorily under all ordinary conditions of humidity, heat, and cold. Dropping the microphone or other severe mechanical shocks should be avoided.

SPECIFICATIONS

Type
Dynamic

Frequency Response
300 to 5,000 Hz (see Figure 2)

Sensitivity (at 1,000 Hz)
Open Circuit Voltage* ................. -53 dBV/Pa (2.2 mV)
*1 Pascal=94 dB SPL

Impedance
Microphone impedance rating is 150 Ω (200 Ω actual) for connection to microphone inputs rated at 19 to 300 Ω

Switch
Double-pole, single-throw, leaf-type

Cable
Attached, 1.8 m (6 ft), 4-conductor (2 shielded), neoprene-jacketed

Dimensions (See Figure 3)

OVERALL DIMENSIONS

MOUNTING HOLES, CLEARANCE FOR No. 8 SCREWS

Net Weight
337 g (11.9 oz)

Packaged Weight
533 g (18.8 oz)

Certification
Meets European Union EMC Emissions and Immunity Requirements (EN 50081-1: 1992, EN 50082-1: 1992).

FURNISHED ACCESSORY
Mounting Bracket (3 in kit)................................. RK6MB

REPLACEMENT PARTS
Cartridge......................................................... R131
Switch......................................................... RK319S
Cable......................................................... C29C