

Polydirectional Microphone

TYPE 77-D

(MI-4045-A)

TECHNICAL DATA

Output Impedance

50, 250 and 600 ohms

Load Impedance

Open circuit

Effective Output Level at 1,000 Cycles*†

(all output connections)
Bi-directional (B) -54.3 dbm
Uni-directional (U) -57.3 dbm
Non-directional (N) -60.3 dbm
L-1, L-2, L-3, between -54.3 and -57.3 dbm

Output Level for Speech at 2 Feett

(all output connections)
Bi-directional (B) -61 db
Uni-directional (U) -64 db
Non-directional (N) -67 db
L-1, L-2, L-3, between -61 and -64 db

Dimensions and Weight

Length—11½ inches Width—3¾ inches Depth—2½ inches

Weight: Total-41/2 pounds

Less cable—3 pounds

Cable

MI-43, 3 conductor, shielded, 30 feet long, no plug

Mounting

1/2-inch pipe thread

* Sound Pressure = 10 dynes/cm.2

† dbm = decibel level referred to one milliwatt

DESCRIPTION

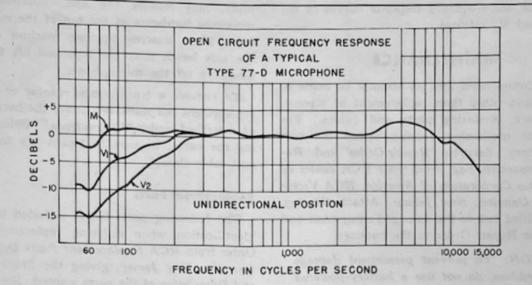
The RCA-Type 77-D Polydirectional Microphone is a high-fidelity microphone of the ribbon type. It is possible, as indicated by the name, to obtain easily a variety of directional patterns.

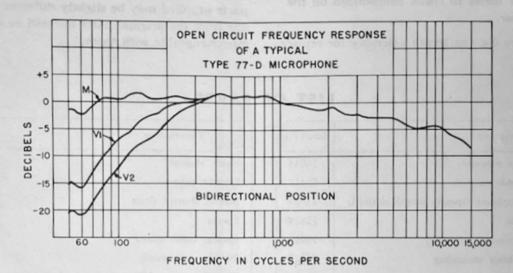
Instead of being open on both sides as in the conventional velocity microphone, the ribbon element in this microphone is coupled to an acoustic labyrinth which forms the body portion of the microphone. The tube connecting the back of the ribbon to the labyrinth is slotted directly be-

hind the ribbon and fitted with an adjustable shutter to secure various areas of opening. When the opening is completely closed, the microphone operates as a non-directional pressure microphone; at the wide-open position the microphone becomes



Figure 1—Type 77-D Microphone on Stand





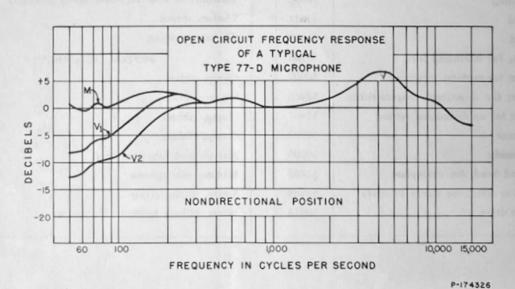


Figure 4—Frequency Response Curves