



Quad Electrostatic Loudspeaker

SPECIFICATIONS (furnished by manufacturer): a full-range electrostatic loudspeaker. **Size:** 34½" w, 31" h, 10½" d. **Power handling capacity:** 6' on axis in free space, 93 db between 50 cps to 10 kc; 100 db in range 70 cps to 7 kc; total integrated radiation, 95 phons in rooms up to 5,000 cubic feet. **Impedance:** 16 ohms. **Price:** \$345. **DISTRIBUTOR:** Lectronics of City Line Center, Inc., Philadelphia 31, Pa.

Jets may cross the Atlantic in six hours, or whatever it is, but it has taken "Walker's Little Wonder" three years to make the commercial crossing. In the June 1956 issue of this magazine, Robert Charles Marsh reported: "Peter Walker . . . is about to produce commercially the first full-range electrostatic speaker in the world . . ." It was not until early this year that the speakers finally got here.

We have been fortunate in having available for test one of the first ones to be imported. Insofar as I can determine, it is identical to the one described in some detail by Mr. Marsh.

Electrostatic speakers are, in general, the least sound-colored of all. If they are good ones, they evidence a dry transparency and clarity. This dry sound is highly enjoyed by most listeners, disliked by some—with opinions seeming to be correlated somewhat with the character of room acoustics. The Quad, too, is dry, transparent, and well balanced. Because it is wholly electrostatic, it produces the same type of sound throughout its range. This often is not true of other systems which combine, say, a cone woofer with a horn-loaded tweeter.

Its range seemed wide and smooth. I was a little timid about pumping in

30-cycle notes with a wide-open 60-watt amplifier, but I did get ample level at 50 cps.

The unit is very sensitive to placement in the room. Because of its shape, it appeared ideally suited for use as a fireplace screen. In fact, it turned out that in this position it was pretty to look at but not to hear. The lows picked up and the highs stayed with us, but the middles dropped out, giving it a bass-heavy sound (surprising for an electrostatic). Neither was it successful in a corner. The best position in my room was out from the wall a few feet, angled toward the listening area. Sound dispersion seemed to be much wider than the 35° claimed in the instruction manual.

Sound output was ample though by no means domineering. My big corner enclosure could outshout the Quad any day and could give a bigger feel to the sound, but the Quad, though less dramatic, was in many ways pleasanter to listen to. It did not project; my corner system spills the sound out into the room. The Quad simply produced sound right where it was, with no enclosure effect at all. The volume could be turned down without loss of clarity or liveness; the effect was that of moving the sound source farther away in an acoustically superlative hall.

The manufacturer recommends that the Quad speaker be used with a Quad amplifier, and this I did. But shifting to a standard American 60-watt amplifier was not fatal; nothing ripped or shattered (that membrane is tough!) and, if anything, the sound was drier than ever.

A second Quad was delivered so that I could listen briefly to a stereo pair. Excellent, indeed—though I was surprised to find a subtle but notice-

able difference in the sound between the two units. The second unit (a later production run) was a bit less dry with a little more sheen.

To "Walker's Little Wonder", a hearty welcome to these shores.—C. F.

MANUFACTURER'S COMMENT: The Quad is flat to 40 cps under free field (out-of-doors) conditions. In corner or tight wall placements, both of which tend to accentuate room resonances, it will exaggerate the very low frequencies, as noted. When placed in the recommended free standing position, the Quad, because of its doublet design, tends to minimize room effects, resulting in very smooth over-all response, tilting upward slightly at the very low frequencies. This smoothness, difficult to obtain with conventionally designed and placed loudspeakers, is an integral part of the Quad "Window on the Orchestra." The reviewer well notes a corollary characteristic—the volume control now affects both level and apparent nearness—an invaluable aid to the serious listener in re-creating the concert illusion.

The maximum permitted input to the speaker is 35 volts peak. Thus most amplifiers of 20 watts or more will need to be specially loaded or modified. Failure to do this invalidates the guarantee since not only will it produce distortion but it will inevitably cause internal damage to the speaker. If one of the loudspeakers had been slightly overdriven, this would alter the frequency balance and could well account for the noted difference between the two.



Walker's "Wonder"—the Quad.