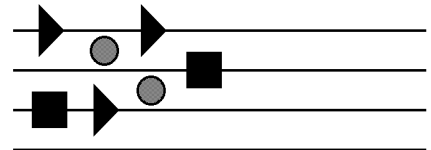


drefahaudio



peter drefahl
sierenmoosstr.54
d-78464 konstanz
www.drefahaudio.com
tel +49-7531-51405
info@drefahaudio.com

AC701-FD

Replacement Circuit for Telefunken AC701/AC701k Microphone Tube

General Information

The most renowned 1950s to '60s microphones are based on the Telefunken AC701k tube, custom-developed for this application and still regarded as a summit in vacuum tube technology.

As an inescapable matter of physics however, also the last AC701 tubes in service are bound to suffer from poor gain and excessive noise one day, rendering even the most valuable microphone useless. Stocks of AC701 aren't left, so this is where the AC701-FD takes over:

Drefahaudio's newly developed substitute allows unrestricted further use of the microphone at excellent specs, lowest noise and an expectable lifespan of several 10.000 operation hours.

The wide range of microphones comprises the Neumann **KM53**, **KM54**, **KM56**, **KM64**, the **M49 / M50**, as well as their RF-shielded versions with the "2" prefix. Also several AKG models were fitted with the AC701, including the priceless Telefunken **Ela M250 / M251**. The highly valued Schoeps **M221** series can be converted to the AC701-FD as well, fully maintaining its outstanding performance for acoustic string instruments.

Installation

The AC701-FD is designed to fit into the original tube slot, with minimum or just little modification needed. The original signal path remains all the same, from capsule through Cs and Rs down to the output transformer. Since the signal takes exactly the same way as before, original performance of the microphone is preserved to the best possible extent.

Should a good AC701 spare come available later, the microphone can be re-converted with little effort.

NOTE: Installation can be performed by drefahaudio only. Faulty small parts found at the same time will be swapped out to ensure trouble-free operation.

Powering

The AC701-FD requires no alterations to the original power supply and cabling at all. Current consumption equals the original tube, and alignment can remain exactly the same, unless in need of adjustments anyway.

Technical Data

Operating voltage	120V DC +/-10%
Current consumption	0.6...1.2mA
Operating conditions	0...50°C
Residual Noise	-104 dBu (measured in KM254)
Dimensions	10 x 10 x 40mm approx. (wires excluded)
CE Conformity	EG-Niederspannungsrichtlinie 73/23/EWG, Anhang I DIN EN 50081-1:1992
RoHS/WEEE Conformity	All materials and processes are RoHS compliant