

Title (en)  
Microphone

Title (de)  
Mikrofon

Title (fr)  
Microphone

Publication  
**EP 1122977 A3 20050511 (DE)**

Application  
**EP 01100976 A 20010117**

Priority  
DE 10004408 A 20000202

Abstract (en)

[origin: US2001012374A1] A microphone module, comprising a microphone capsule (2) with an amplifier printed circuit board (4) attached thereto, is provided with a shield arrangement in the form of a half-shell, which encompasses the amplifier component elements located on one side of the printed circuit board, and which is soldered to the continuous metal lamination coating located on the opposite side of said board. The resulting shield trough surrounds the half of the metallic microphone capsule, fitted into it, while making contact thereto. The half of the rear side of the microphone capsule projecting above the printed circuit board (4) is provided with a metallised shield (14), which is in contact with the capsule housing and with the lamination coating (12) of the printed circuit board (4). The amplifier circuit on the printed circuit board is therefore completely shielded and effectively protected against interference scatter. To achieve the desired directional effect, sound pressure apertures (22) are arranged on the rear side of the microphone capsule (2), and, in order to retain and improve their effectiveness, the amplifier printed circuit board (4) is provided with corresponding cut-outs (24) on its edge on the microphone side.

IPC 1-7  
**H04R 1/02; H04R 1/08; H04R 1/34; H05K 9/00**

IPC 8 full level  
**H04R 1/08** (2006.01)

CPC (source: EP US)  
**H04R 1/083** (2013.01 - EP US)

Citation (search report)

- [DA] DE 19545760 C1 19970220 - SIEMENS AUDIOLOGISCHE TECHNIK [DE]
- [A] DE 4343702 C1 19950309 - SIEMENS AUDIOLOGISCHE TECHNIK [DE]
- [A] DE 3502178 A1 19850829 - PHONAK AG [CH]
- [A] US 5740261 A 19980414 - LOEPPERT PETER V [US], et al
- [A] PATENT ABSTRACTS OF JAPAN vol. 1997, no. 08 29 August 1997 (1997-08-29)

Designated contracting state (EPC)  
AT BE CH CY DE DK ES FI FR GB GR IE IT LI LU MC NL PT SE TR

DOCDB simple family (publication)

**US 2001012374 A1 20010809; US 6643380 B2 20031104;** AT E346474 T1 20061215; DE 10004408 C1 20010621; DE 50111474 D1 20070104;  
EP 1122977 A2 20010808; EP 1122977 A3 20050511; EP 1122977 B1 20061122

DOCDB simple family (application)

**US 77316601 A 20010131;** AT 01100976 T 20010117; DE 10004408 A 20000202; DE 50111474 T 20010117; EP 01100976 A 20010117