

Title (en)

Method for manufacturing an ultrasonic sensor and corresponding ultrasonic sensor

Title (de)

Verfahren zur Herstellung eines Ultraschallsensors und entsprechender Ultraschallsensor

Title (fr)

Procédé de fabrication d'un capteur à ultrasons et capteur à ultrasons correspondant

Publication

EP 1796076 A1 20070613 (DE)

Application

EP 06019834 A 20060922

Priority

DE 102005059146 A 20051210

Abstract (en)

The method involves generating ultrasonic signals by a diaphragm that includes a diaphragm base (4). A surface coating is coated on the base, where the surface coating includes a chromium layer (20). A nickel layer (18) is a multi-layer and is arranged between the base and the chromium layer. The thickness (26) of the base and the thicknesses (22, 24) of the layers (18, 20) of the coating are influenced such that a given resonance frequency of composite materials is adjusted by the base and the layers. A layer of the nickel layer is galvanically coated using a sulfamate electrolyte. An independent claim is also included for an ultrasonic sensor.

IPC 8 full level

G10K 9/122 (2006.01)

CPC (source: EP)

G10K 9/122 (2013.01)

Citation (search report)

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- [A] WO 03045586 A1 20030605 - DANFOSS AS [DK], et al
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- [AP] WONDRISE F: "Surface coating", INTERNET CITATION, 2005, XP002344583, Retrieved from the Internet <URL:http://search.eb.com/eb/article_81466> [retrieved on 20050913]

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Designated contracting state (EPC)

CZ DE ES FR IT

Designated extension state (EPC)

AL BA HR MK YU

DOCDB simple family (publication)

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DOCDB simple family (application)

EP 06019834 A 20060922; DE 102005059146 A 20051210; DE 502006001023 T 20060922; ES 06019834 T 20060922