

Title (en)

A system for acquiring data representing sound in a human or animal body

Title (de)

System zur Erfassung von tondarstellenden Daten in einem menschlichen oder tierischen Körper

Title (fr)

Système permettant d'acquérir des données représentant le son dans un corps humain ou animal

Publication

EP 2928209 A1 20151007 (EN)

Application

EP 14163198 A 20140402

Priority

EP 14163198 A 20140402

Abstract (en)

A system (10) for acquiring data representing sound in a human or animal body. The system comprises a disk shaped piezoelectric element (30) with a first side (31) and a second side (32) opposite the first side (31). The piezoelectric element (30) is capable of generating, when exposed to the sound, an analogue electrical signal representing the sound, and the first side (31) is adapted for placing in acoustic contact with the skin of an animal or a human being, and the second side (32) is directly exposed to ambient air, and a device (20) for receiving the electrical signal generated by the piezoelectric element (30). The piezoelectric element (30) can be covered by a protective coating. The electrical signal is sampled at a sampling frequency as high as 96 kHz.

IPC 8 full level

A61B 7/04 (2006.01); **H04R 17/00** (2006.01)

CPC (source: EP)

H04R 17/005 (2013.01); **H04R 1/46** (2013.01)

Citation (applicant)

WO 2004002191 A1 20031231 - BANG & OLUFSEN MEDICOM AS [DK], et al

Citation (search report)

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- [A] WO 2011123071 A1 20111006 - UNIV NANYANG TECH [SG], et al
- [X1] "Heart monitor and final result", 21 February 2013 (2013-02-21), XP055133211, Retrieved from the Internet <URL:http://301realtime.blogspot.nl/> [retrieved on 20140805]
- [X1] SAUMANAHAI: "Subdermal bone conduction headphones?", 1 July 2013 (2013-07-01), XP055133222, Retrieved from the Internet <URL:http://discuss.biohack.me/discussion/252/subdermal-bone-conduction-headphones#Item_33> [retrieved on 20140805] & "Saumanahai discussions", 1 July 2013 (2013-07-01), XP055133226, Retrieved from the Internet <URL:http://discuss.biohack.me/profile/discussions/707/Saumanahai> [retrieved on 20140805]
- [I] BERNARD GRUNDLEHNER ET AL: "Methods to Characterize Sensors for Capturing Body Sounds", BODY SENSOR NETWORKS (BSN), 2011 INTERNATIONAL CONFERENCE ON, IEEE, 23 May 2011 (2011-05-23), pages 59 - 64, XP031896429, ISBN: 978-1-4577-0469-7, DOI: 10.1109/BSN.2011.22

Designated contracting state (EPC)

AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)

BA ME

DOCDB simple family (publication)

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DOCDB simple family (application)

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