

Title (en)
Adaptive residual feedback suppression

Title (de)
Adaptive Restrückkopplungsunterdrückung

Title (fr)
Suppression adaptative de rétroaction résiduelle

Publication
EP 2869600 A1 20150506 (EN)

Application
EP 13191660 A 20131105

Priority
EP 13191660 A 20131105

Abstract (en)
A hearing aid includes: an input transducer for generating an audio signal; a feedback suppression circuit configured for modelling a feedback path of the hearing aid; a subtractor for subtracting an output signal of the feedback suppression circuit from the audio signal to form a feedback compensated audio signal; a signal processor that is coupled to an output of the subtractor for processing the feedback compensated audio signal to perform hearing loss compensation; and a receiver that is coupled to an output of the signal processor for converting the processed feedback compensated audio signal into a sound signal; wherein the hearing aid further comprises a gain processor for performing gain adjustment of the feedback compensated audio signal based at least on an estimate of a residual feedback signal of the feedback compensated audio signal, wherein the estimate of the residual feedback signal is based at least on the audio signal.

IPC 8 full level
H04R 25/00 (2006.01)

CPC (source: EP)
H04R 25/453 (2013.01); **H04R 25/305** (2013.01)

Citation (applicant)
• EP 2203000 A1 20100630 - GN RESOUND AS [DK]
• WO 03015468 A1 20030220 - GN RESOUND AS [DK]

Citation (search report)
• [XY] WO 2006063624 A1 20060622 - WIDEX AS [DK], et al
• [YD] EP 2203000 A1 20100630 - GN RESOUND AS [DK]
• [A] US 5259033 A 19931102 - GOODINGS RUPERT L A [GB], et al
• [A] EP 2217007 A1 20100811 - OTICON AS [DK]
• [A] EP 2136575 A2 20091223 - STARKEY LAB INC [US]

Cited by
CN106911992A; EP3448064A1; EP3576433A1; CN110557708A; US10687151B2; US10873817B2

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

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DOCDB simple family (application)
EP 13191660 A 20131105; DK 13191660 T 20131105