

Title (en)

APPARATUS AND METHOD FOR MITIGATING HEARING IMPAIRMENTS

Title (de)

ANORDNUNG UND VORRICHTUNG ZUR HÖRBEEINTRÄCHTIGUNGSKOMPENSATION

Title (fr)

APPAREIL ET PROCEDES SERVANT A ATTENUER LES DYSFONTIONS DUES A UNE ASYNCHRONIE DU DELAI DE PROPAGATION DE PHASE BIAURICULAIRE DU SYSTEME NERVEUX AUDITIF CENTRAL

Publication

**EP 1234480 A2 20020828 (EN)**

Application

**EP 00968722 A 20001005**

Priority

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- US 15777599 P 19991005

Abstract (en)

[origin: WO0126420A2] Pathological binaural phase time delay (PBDT) asynchrony is measured at a variety of frequencies and to speech stimuli to develop a BPTD profile for a subject. Then a corrective device (600, 1000) is designed to apply clinical PBDT to compensate for the subject's pathological BPTD. An electronic device (500) is used to measure the subject's ability to comprehend words at a variety of relative time delays between ears to estimate the ideal overall relative time delay. The optimal relative phase shift at a variety of frequencies is also measured. An electronic device (600) may be used to correct the pathological BPTD by delaying sound in different frequency bands differently to the target ear, according to the BPTD profile, or a passive filtered earplug (1000) may be used to correct smaller amounts of BPTD.

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**H04R 25/00**; **A61B 5/12**

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Citation (search report)

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