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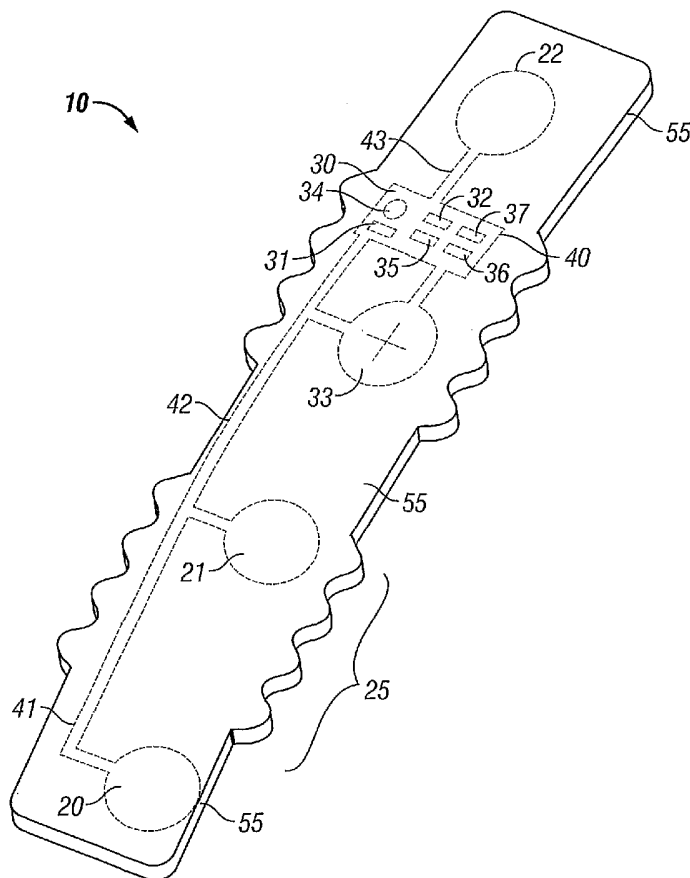
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(54) Title: DISPOSABLE FETAL MONITOR PATCH



(57) Abstract: The invention provides a low cost, fully integrated, disposable patch for the noninvasive, continuous monitoring of fetal electrocardiogram (ECG). The patch detects fetal ECG by filtering the dominant maternal ECG therefrom. In one embodiment, an upper electrode is used to obtain a relatively pure maternal ECG signal for its cancellation from the signal obtained from the abdominal fetal ECG. In another embodiment, multiple abdominal electrodes are used and the dominant periodic features of maternal ECG are identified and eliminated. The fetal monitor patch is thin, flexible, and incorporates a battery and an alarm to indicate an adverse health condition for the fetus. The fetal monitor patch is particularly designed for long-term wear applications. The patch is unobtrusive and thus worn continuously, even during sleep and bathing. In another embodiment, the fetal monitor patch is programmable and stored fetal ECG data can be transmitted to a remote receiver.

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INTERNATIONAL SEARCH REPORT

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A. CLASSIFICATION OF SUBJECT MATTER

IPC(8) A61B 5/04
US 600/511

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)
US 600/511, 600/376; IPC A61B 5/04

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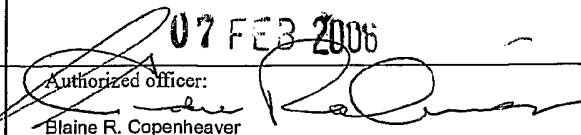
Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)
USPAT; USPGPUB; Micropatent; NCBI Entrez PubMed

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	US 4,781,200 A (BAKER) 01 November 1988 (01.11.1988) entire document	1-51
A	US 4,957,109 A (GROEGER et al.) 18 September 1990 (18.09.1990) claims 1, col 1 ln 26	1-51
A	WO 9115995 A1 (ROSENTHAL) 31 October 1991 (31.10.1991) p 6 ln 22-37	1-51
A	US 4,945,917 A (AKSELROD et al.) 07 August 1990 (07.08.1990) abstract	1-51
A	US 5,776,073 A (GARFIELD et al.) 07 July 1998 (07.07.1998) col 15 ln 26-31	1-51
A	US 4,773,424 A (INUOE et al.) 27 September 1988 (27.09.1988) claim 1	1-51

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