

Title (en)  
Method and device for detecting the presence of an analyte in a test sample

Title (de)  
Verfahren und Vorrichtung zur Detektion eines Analyten in einer Probe

Title (fr)  
Procédé et dispositif pour détecter la présence d'un analyte dans un échantillon

Publication  
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Application  
**EP 02077317 A 20020612**

Priority  
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Abstract (en)  
A method and a device for determining the presence or the amount of an analyte in a test sample. The method comprises: (a) introducing a test sample in a chamber (12), (b) performing the following steps in that chamber (12): (b.1) capturing nucleic acids contained in the test sample, said capturing being obtained by use of a binding surface (15) located within said chamber, said binding surface having a high binding affinity for capturing nucleic acids, (b.2) amplifying a target nucleic acid sequence which is part of the captured nucleic acids, and (b.3) detecting the presence of the amplified target nucleic acid sequence. <??>The device comprises the chamber (12). This chamber has a sealable inlet port (13) for introducing into chamber (12) a liquid containing the test sample and a sealable outlet port (14) allowing the exit of liquid from said chamber (12). Chamber (12) contains a binding surface which is adapted to capture nucleic acids contained in the test sample when said liquid containing said test sample flows through said chamber (12). Chamber (12) has at least one wall (16) which enables heating and cooling of the contents of said chamber (12), the temperature of said chamber (12) being thereby modifiable in order to carry out therein a process for amplifying a target nucleic acid sequence which is part of the captured nucleic acids. A part of chamber (12) has a zone (17) which allows examination of the chamber contents by optical means for detecting the presence of an amplified target nucleic acid sequence contained in said chamber (12). <IMAGE>

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Citation (search report)  
• [X] US 2002018998 A1 20020214 - FRITZ MICHAEL [DE], et al  
• [X] WO 0060362 A1 20001012 - YOUNG CHUNG CHANG [US], et al  
• [A] EP 0693560 A2 19960124 - BECTON DICKINSON CO [US]  
• [A] WO 9322053 A1 19931111 - UNIV PENNSYLVANIA [US]

Cited by  
EP2714884A4; EP1878496A1; EP1878495A1; CN103382434A; US8000762B2; EP2705792A1; EP2727531A3; US7695956B2; WO2006078470A3; WO2008006618A1; WO2008006500A1; WO2005084545A1; WO2006078470A2; US10369568B2; US9707556B2; US10661271B2; US7819822B2; US8814808B2; US8162854B2; US8369918B2; US9022952B2; EP1722670B1; US9839909B2; US9902990B2; US10315195B2; US10508299B2; US2006160243A1; US8158410B2

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