

Title (en)

CONTINUOUS SAMPLE DELIVERY PERISTALTIC PUMP

Title (de)

PERISTALTISCHE PUMPE FÜR KONTINUIERLICHE PROBENABGABE

Title (fr)

POMPE PÉRISTALTIQUE DE DÉLIVRANCE D'ÉCHANTILLONS CONTINUE

Publication

**EP 3337977 A4 20190102 (EN)**

Application

**EP 16839908 A 20160819**

Priority

- US 201562208465 P 20150821
- US 2016047877 W 20160819

Abstract (en)

[origin: CN107923380A] A method and apparatus for pumping fluid through tubing are provided. The method includes orbiting first rollers around the periphery of a first disk at a first tangential speed in a first angular sector and a slower, second tangential speed in a second angular sector, orbiting second rollers around the periphery of a second disk at the second tangential speed, and increasing the pressure of fluid in tubing between one first roller and one second roller by causing the one first roller to fully compress the tubing at the first tangential speed and simultaneously causing the one second roller to fully compress the tubing at the second tangential speed. The apparatus includes a first disk with a recess in its periphery, the first angular sector with a nominal first radius, and a second angular sector with a nominal second radius; and a second disk with the nominal first radius and a recess in its periphery.

IPC 8 full level

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CPC (source: EP US)

**F04B 43/0072** (2013.01 - EP US); **F04B 43/1215** (2013.01 - EP); **F04B 43/1253** (2013.01 - EP); **F04B 43/1261** (2013.01 - EP US); **F04B 43/1276** (2013.01 - EP)

Citation (search report)

- [A] US 5533878 A 19960709 - IWATA NOBORU [JP]
- [A] US 5711654 A 19980127 - AFFLERBAUGH RICHARD L [US]
- [A] US 2014356205 A1 20141204 - BAXTER VINCENT A [US]
- [A] JP 2008261240 A 20081030 - DAIICHI TECHNO CO LTD
- [A] JP 2013072287 A 20130422 - DAIICHI TECHNO CO LTD
- See references of WO 2017035020A1

Designated contracting state (EPC)

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CN 107923380 A 20180417; CN 107923380 B 20200207; EP 3337977 A1 20180627; EP 3337977 A4 20190102; EP 3337977 B1 20200129

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CN 201680049919 A 20160819; EP 16839908 A 20160819