

Title (en)

ARRANGEMENT FOR IMPROVING THE EXCHANGE OF GASES VIA SEMIPERMEABLE MEMBRANES IN AN AQUEOUS MEDIUM

Title (de)

ANORDNUNG ZUR VERBESSERUNG DES AUSTAUSCHES VON GASEN ÜBER SEMIPERMEABLE MEMBRANEN IM WÄSSRIGEN MILIEU

Title (fr)

AGENCEMENT PERMETTANT D'AMÉLIORER L'ÉCHANGE DE GAZ AU MOYEN DE MEMBRANES SEMI-PERMÉABLES EN MILIEU AQUEUX

Publication

EP 4045104 A1 20220824 (DE)

Application

EP 20800540 A 20201015

Priority

- DE 102019007144 A 20191015
- EP 2020078987 W 20201015

Abstract (en)

[origin: WO2021074267A1] The invention relates to a method and an arrangement wherein gases are removed via semipermeable membranes from aqueous, optionally complex biological substance mixtures by dialysis in an aqueous medium. Special carrier molecules for gases are used in the dialysate and these carrier molecules are regenerated in the dialysate circuit so that they can be used for further gas exchange cycles on the membrane.

IPC 8 full level

A61M 1/16 (2006.01); **A61M 1/32** (2006.01); **A61M 1/36** (2006.01)

CPC (source: CN EP US)

A61M 1/1603 (2014.02 - US); **A61M 1/1621** (2014.02 - US); **A61M 1/1627** (2014.02 - US); **A61M 1/1654** (2013.01 - US); **A61M 1/1676** (2014.02 - CN EP); **A61M 1/1698** (2013.01 - CN EP); **A61M 1/32** (2013.01 - CN EP); **A61M 1/3666** (2013.01 - CN EP); **A61M 2202/0208** (2013.01 - US); **A61M 2202/0225** (2013.01 - US); **A61M 2202/0413** (2013.01 - US); **A61M 2202/0433** (2013.01 - CN EP US)

Citation (search report)

See references of WO 2021074267A1

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

DOCDB simple family (publication)

DE 102019007144 A1 20210415; CN 114555146 A 20220527; EP 4045104 A1 20220824; JP 2023500797 A 20230111; US 2022339333 A1 20221027; WO 2021074267 A1 20210422

DOCDB simple family (application)

DE 102019007144 A 20191015; CN 202080072262 A 20201015; EP 2020078987 W 20201015; EP 20800540 A 20201015; JP 2022522827 A 20201015; US 202217722039 A 20220415