

Title (en)

DEVICE AND METHOD FOR THE ELECTROCHEMICAL UTILISATION OF CARBON DIOXIDE

Title (de)

VORRICHTUNG UND VERFAHREN ZUR ELEKTROCHEMISCHEN NUTZUNG VON KOHLENSTOFFDIOXID

Title (fr)

DISPOSITIF ET PROCÉDÉ D'UTILISATION ÉLECTROCHIMIQUE DE DIOXYDE DE CARBONE

Publication

EP 3414362 A1 20181219 (DE)

Application

EP 17724515 A 20170508

Priority

- DE 102016209451 A 20160531
- EP 2017060885 W 20170508

Abstract (en)

[origin: WO2017207220A1] The invention relates to a method and an electrolyser for the electrochemical utilisation of carbon dioxide. The electrolyser for the electrochemical utilisation of carbon dioxide comprises at least one electrolytic cell, wherein the electrolytic cell has an anode chamber with an anode and a cathode chamber with a cathode, a first cation-permeable membrane is arranged between the anode chamber and the cathode chamber, and the anode is directly adjacent to the first membrane in the anode chamber, and a second anion-selective membrane is arranged in the cathode chamber between the first membrane and the cathode, and the second membrane is at least partially but not completely directly adjacent to the first membrane.

IPC 8 full level

C25B 3/25 (2021.01); **C25B 9/19** (2021.01); **C25B 13/02** (2006.01); **C25B 15/08** (2006.01)

CPC (source: EP US)

C25B 1/00 (2013.01 - EP); **C25B 3/25** (2021.01 - EP US); **C25B 9/19** (2021.01 - EP US); **C25B 13/02** (2013.01 - EP US);
C25B 15/08 (2013.01 - EP US)

Citation (search report)

See references of WO 2017207220A1

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 102016209451 A1 20171130; AU 2017273604 A1 20181025; AU 2017273604 B2 20200102; CN 109219674 A 20190115;
CN 109219674 B 20210423; DK 3414362 T3 20200615; EP 3414362 A1 20181219; EP 3414362 B1 20200325; ES 2795037 T3 20201120;
PL 3414362 T3 20200824; SA 518400459 B1 20220508; US 11193213 B2 20211207; US 2020325587 A1 20201015;
WO 2017207220 A1 20171207

DOCDB simple family (application)

DE 102016209451 A 20160531; AU 2017273604 A 20170508; CN 201780034534 A 20170508; DK 17724515 T 20170508;
EP 17724515 A 20170508; EP 2017060885 W 20170508; ES 17724515 T 20170508; PL 17724515 T 20170508; SA 518400459 A 20181119;
US 201716305496 A 20170508