

Title (en)
PROTON-CONDUCTING POLYMER MEMBRANE COMPRISING AT LEAST ONE POROUS CARRIER MATERIAL, AND USE THEREOF IN FUEL CELLS

Title (de)
PROTONENLEITENDE POLYMERMEMBRAN UMFASSEND MINDESTENS EIN PORÖSES TRÄGER-MATERIAL UND DEREN ANWENDUNG IN BRENNSTOFFZELLEN

Title (fr)
MEMBRANE POLYMERES CONDUCTRICE DE PROTONS CONTENANT AU MOINS UNE MATIERE DE SUPPORT POREUSE ET UTILISATION DE LADITE MEMBRANE DANS DES PILES A COMBUSTIBLE

Publication
EP 1676333 A1 20060705 (DE)

Application
EP 04764852 A 20040904

Priority
• EP 2004009901 W 20040904
• DE 10340929 A 20030904

Abstract (en)
[origin: WO2005024989A1] The invention relates to a proton-conducting polymer membrane containing polymers that are provided with at least one porous carrier material and polymers which comprise phosphonic acid groups and are obtained by polymerizing monomers encompassing phosphonic acid groups.

IPC 1-7
H01M 8/10; **H01M 8/02**

IPC 8 full level
B01D 67/00 (2006.01); **B01D 69/02** (2006.01); **B01D 69/10** (2006.01); **B01D 71/44** (2006.01); **B01D 71/62** (2006.01); **B01D 71/82** (2006.01); **C08J 5/22** (2006.01); **H01M 8/02** (2006.01); **H01M 8/10** (2006.01)

CPC (source: EP US)
B01D 67/0006 (2013.01 - EP US); **B01D 67/00931** (2022.08 - EP US); **B01D 69/107** (2022.08 - EP US); **B01D 71/441** (2022.08 - EP US); **B01D 71/62** (2013.01 - EP US); **B01D 71/82** (2013.01 - EP US); **C08J 5/2231** (2013.01 - EP US); **C08J 5/2275** (2013.01 - EP US); **H01M 8/1023** (2013.01 - EP US); **H01M 8/1039** (2013.01 - EP US); **H01M 8/1062** (2013.01 - EP US); **H01M 8/1067** (2013.01 - EP US); **H01M 8/1072** (2013.01 - EP US); **B01D 2323/225** (2013.01 - EP US); **B01D 2323/30** (2013.01 - EP US); **B01D 2325/04** (2013.01 - EP US); **B01D 2325/24** (2013.01 - EP US); **B01D 2325/26** (2013.01 - EP US); **C08J 2385/02** (2013.01 - EP US); **H01M 8/1004** (2013.01 - EP US); **H01M 2300/0082** (2013.01 - EP US); **H01M 2300/0094** (2013.01 - EP US); **Y02E 60/50** (2013.01 - EP); **Y02P 70/50** (2015.11 - EP US)

Designated contracting state (EPC)
AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HU IE IT LI LU MC NL PL PT RO SE SI SK TR

DOCDB simple family (publication)
WO 2005024989 A1 20050317; DE 10340929 A1 20050407; EP 1676333 A1 20060705; JP 2007504315 A 20070301; US 2007202415 A1 20070830

DOCDB simple family (application)
EP 2004009901 W 20040904; DE 10340929 A 20030904; EP 04764852 A 20040904; JP 2006525127 A 20040904; US 57072204 A 20040904