

Title (en)
PISTON PUMP ASSEMBLY FOR A HYDRAULIC POWER BRAKE SYSTEM OF A VEHICLE

Title (de)
Kolbenpumpenaggregat für eine hydraulische Fremdkraft-Fahrzeugsbremsanlage

Title (fr)
ENSEMBLE POMPE À PISTON POUR SYSTÈME DE FREINAGE HYDRAULIQUE DE VÉHICULE ACTIONNÉ PAR UNE FORCE EXTÉRIEURE

Publication
EP 3673177 A1 20200701 (DE)

Application
EP 18750112 A 20180719

Priority
• DE 102017214593 A 20170822
• EP 2018069652 W 20180719

Abstract (en)
[origin: WO2019037967A1] The invention relates to a piston pump assembly (1) for a hydraulic power brake system of a vehicle, comprising an electric motor (2), a planetary transmission (3), helical gearing (4), and a piston (5) which can be moved in a cylinder (7). In order to rotationally secure the piston (5) in the cylinder (7), the piston (5) has a ring (15) which is rotationally fixed to the piston by means of a formfitting connection, is connected to the piston by a shaping process, and comprises semicircular grooves on the outer circumference of the ring, wherein cylinder pins (13) which are arranged in the cylinder (7) in a fixed axially parallel manner engage into said grooves.

IPC 8 full level
F04B 9/02 (2006.01); **F04B 9/04** (2006.01); **F04B 17/03** (2006.01)

CPC (source: EP KR US)
B60T 8/368 (2013.01 - KR); **B60T 17/02** (2013.01 - KR); **F04B 9/02** (2013.01 - EP); **F04B 9/025** (2013.01 - EP KR); **F04B 9/042** (2013.01 - US); **F04B 9/047** (2013.01 - EP KR US); **F04B 17/03** (2013.01 - EP KR US); **F04B 53/14** (2013.01 - KR US); **B60Y 2400/81** (2013.01 - KR US)

Citation (search report)
See references of WO 2019037967A1

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)
WO 2019037967 A1 20190228; CN 110945242 A 20200331; CN 110945242 B 20220104; DE 102017214593 A1 20190228; EP 3673177 A1 20200701; KR 102518760 B1 20230410; KR 20200044854 A 20200429; US 11248600 B2 20220215; US 2021122342 A1 20210429

DOCDB simple family (application)
EP 2018069652 W 20180719; CN 201880054601 A 20180719; DE 102017214593 A 20170822; EP 18750112 A 20180719; KR 20207008027 A 20180719; US 201816639790 A 20180719