

Title (en)

FLOW LIMITER FOR A FUEL INJECTION SYSTEM, AND FUEL INJECTION SYSTEM COMPRISING A FLOW LIMITER

Title (de)

DURCHFLUSSBEGRENZER FÜR EIN KRAFTSTOFFEINSPIRITSYSTEM SOWIE KRAFTSTOFFEINSPIRITSYSTEM MIT EINEM DURCHFLUSSBEGRENZER

Title (fr)

LIMITEUR DE DÉBIT D'UN SYSTÈME D'INJECTION DE CARBURANT ET SYSTÈME D'INJECTION DE CARBURANT COMPRENANT UN LIMITEUR DE DÉBIT

Publication

**EP 4172486 A1 20230503 (DE)**

Application

**EP 21763311 A 20210816**

Priority

- DE 102020124511 A 20200921
- EP 2021072692 W 20210816

Abstract (en)

[origin: WO2022058105A1] The present invention relates to a flow limiter (1) for a fuel injection system, which flow limiter comprises a throttling sleeve (2) with a through-hole (3), a throttle insert (4) which is received movably in the through-hole (3), a sealing portion (5) in the through-hole (3), which sealing portion is a cross-sectional reduction of the through-hole as compared to a first portion of the through-hole in which the throttle insert (4) is arranged, and a spring element (6) which is received in the through-hole (3) and pushes the throttle insert (4) away from the sealing portion (5). The invention is characterised in that the throttle insert (4) has, on its side nearest the sealing portion (5), a sealing surface (10), which closes the through-hole (3) when the sealing surface is in contact with the sealing portion (5). The throttle insert (4) has at least one throttle line (12), which provides a fluidic connection along the through-hole from an inlet opening in the side of the throttle insert (4) furthest from the sealing surface (10) to an outlet opening in the side of the throttle insert (4) closest to the sealing surface (10). The outlet opening is preferably arranged in such a way that the flow exiting from said outlet opening exits within the spring element (6).

IPC 8 full level

**F02M 55/02** (2006.01); **F02M 63/00** (2006.01); **F02M 63/02** (2006.01); **F16K 17/04** (2006.01)

CPC (source: EP)

**F02M 55/02** (2013.01); **F02M 63/005** (2013.01); **F02M 63/0215** (2013.01); **F16K 15/063** (2013.01); **F16K 17/30** (2013.01)

Citation (search report)

See references of WO 2022058105A1

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

Designated validation state (EPC)

KH MA MD TN

DOCDB simple family (publication)

**DE 102020124511 A1 20220324**; EP 4172486 A1 20230503; WO 2022058105 A1 20220324

DOCDB simple family (application)

**DE 102020124511 A 20200921**; EP 2021072692 W 20210816; EP 21763311 A 20210816