

Title (en)

Apparatus, device and method for filtering fine particulate matter from exhaust gas

Title (de)

Vorrichtung, Gerät und Verfahren zum Filtern feinen Schwebstoffteilchen aus Abgas

Title (fr)

Appareil, dispositif et procédé pour filtrer de la matière particulaire fine de gaz d'échappement

Publication

EP 2583755 B1 20150422 (EN)

Application

EP 11008375 A 20111018

Priority

EP 11008375 A 20111018

Abstract (en)

[origin: EP2583755A1] An aspect of the invention is related to a filter device for filtering fine particulate matter from exhaust gas comprising: - an exhaust gas inlet; - an exhaust gas outlet; - a precipitator device; and - an outfall sewer with a particle discharge valve, wherein, when the filter device is in use, the exhaust gas flowing from the exhaust gas inlet to the exhaust gas outlet passes the precipitator device along a first gas flow direction F1, which is substantially vertically downwards, wherein the precipitator device is capable of at least partially removing fine particulate matter from the exhaust gas; wherein the outfall sewer is configured to collect the removed fine particulate matter, wherein the particle discharge valve is configured to automatically discharge the collected fine particulate matter, wherein the outfall sewer and/or the particle discharge valve is spaced apart from the precipitator device along the first gas flow direction F1 so that fine particulate matter is transportable by means of gravity and/or by means of dragging with the exhaust gas flow along the first gas flow direction F1 from the precipitator device to the outfall sewer as well as an apparatus and a method.

IPC 8 full level

B03C 3/88 (2006.01)

CPC (source: EP)

B03C 3/12 (2013.01); **B03C 3/41** (2013.01); **B03C 3/49** (2013.01); **B03C 3/743** (2013.01); **B03C 3/88** (2013.01)

Citation (examination)

JP 2000140686 A 20000523 - ISHIKAWAJIMA HARIMA HEAVY IND

Cited by

CN107179266A; CN112973332A; CN114034538A; EP3705185A1; DE102019105776A1; EP3112030A1; CN115415053A; EP4235029A1; IT202200003461A1; WO2023052137A1

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

DOCDB simple family (publication)

EP 2583755 A1 20130424; EP 2583755 B1 20150422

DOCDB simple family (application)

EP 11008375 A 20111018