

Title (en)

ELECTROSTATIC FILTER FOR A FLUE DUCT OUTLET FROM A COMBUSTION CHAMBER, EQUIPPED WITH AN IMPROVED CLEANING

Title (de)

ELEKTROSTATISCHER FILTER FÜR EINEN BRENNKAMMER-RAUCHGASABZUG MIT VERBESSERTER REINIGUNG

Title (fr)

FILTRE ÉLECTROSTATIQUE POUR UNE SORTIE DE FUMÉE D'UNE CHAMBRE DE COMBUSTION AVEC NETTOYAGE AMÉLIORÉ

Publication

EP 4235029 A1 20230830 (EN)

Application

EP 22213725 A 20221215

Priority

IT 202200003461 A 20220224

Abstract (en)

Electrostatic filter (4) for flue duct outlets from a combustion chamber, comprising a hollow manifold (8) having an inner side wall (12) delimiting a volume (16) for the passage and conveying of fumes, from an inlet end (20) of the fumes to an outlet end (24) of the fumes, said inlet end (20) and outlet end (24) being offset with respect to a vertical rising direction (Y-Y) of the fumes, said inner side wall (12) being lapped by said fumes, at least one electrode (28), housed at least partially in said volume (16) and/or in a side duct (32) fluidly connected to said volume (16), and configured so as to ionize the fumes crossing said volume (16) so as to adhere the particulate transported by the fumes to said inner side wall (12), and a cleaning device (44) configured so as to at least partially abrade said inner side wall (12) so as to remove the particulate attached thereto. The cleaning device (44) comprises at least one movable frame (48) within the volume (16), operatively connected to motor means (52), the frame (48) being provided with a plurality of brushes (56) configured so as to flap and clean said inner side wall (12), wherein said movable frame (48) comprises vertical sections (50), parallel to the vertical direction Y-Y, provided with said brushes (56).

IPC 8 full level

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CPC (source: EP)

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Citation (search report)

- [A] EP 2236209 A1 20101006 - GEORG HIPPE MASCHB GMBH [DE]
- [A] EP 2583755 A1 20130424 - KARLSRUHER INST TECHNOLOGIE [DE]
- [A] US 2020009579 A1 20200109 - CHEN YAJUN [CN]

Designated contracting state (EPC)

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