

Title (en)

Method and apparatus for cleaning a soot filter.

Title (de)

Verfahren und Vorrichtung zum Reinigen eines Russfilters.

Title (fr)

Procédé et dispositif de nettoyage d'un filtre de suie.

Publication

EP 0296435 A2 19881228 (DE)

Application

EP 88109324 A 19880611

Priority

DE 3720829 A 19870624

Abstract (en)

[origin: JPS6435007A] PURPOSE: To enhance combustion efficiency of the soot within the soot filter in down-stream of a combustion chamber by providing a combustion chamber on the way of an exhaust passageway, mixing the fuel and exhaust gas in the combustion chamber, and igniting and effecting the burning-down of the unburned oxygen component contained in the exhaust gas. CONSTITUTION: To the exhaust gas pipe 6 of a diesel engine 1, an exhaust pipe 8 is connected by way of a soot filter 7 and a combustion chamber 13 is provided on the way of the exhaust gas pipe 6. In the combustion chamber 13, the fuel within a fuel tank 2 is made ready to be supplied by way of a fuel pipe 11 on the actuation of a feed pump 12 and an after burning of the exhaust gas flow conducted in the combustion chamber 13 is made possible. In this instance, within the combustion chamber 13, the first exhaust gas flow portion bifurcated from the exhaust gas flow and the fuel are spark-ignited and burned, causing to generate an ignition gas consisting of high-temperature combustion exhaust gas and evaporated unburned fuel, and subsequently the second exhaust gas flow portion is conducted into the ignition gas to burn the said ignition gas including the unburned fuel.

Abstract (de)

Ein Verfahren und eine Vorrichtung zum Reinigen eines Rußfilters (7) in der Abgasleitung (6) eines Dieselmotors (1) mit einer vor dem Rußfilter (7) angeordneten Brennkammer (13), in welcher eine Kraftstoffdüse (34) und eine dieser zugeordnete elektrische Zündvorrichtung eingebaut sind, ermöglichen eine Nachverbrennung des Abgases ohne Sekundärluft. Das Abgas in der Brennkammer (13) wird mit dem durch die Kraftstoffdüse (34) eingespritzten Kraftstoff vermischt und mit dem im Abgas vorhandenen Anteil an unverbranntem Sauerstoff durch die Zündvorrichtung gezündet. Das heiße Abgas bewirkt im Rußfilter (7) den Abbrand des dort angesammelten Rußes.

IPC 1-7

F01N 3/02

IPC 8 full level

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CPC (source: EP KR US)

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