

Title (en)  
Regenerative soot filter device and method for regenerating a soot filter

Title (de)  
Regenerierbarer Partikelfilter und Verfahren zum regenerieren eines Partikelfilters

Title (fr)  
Filtre à particules régénérable et méthode de régénération d'un filtre à particules

Publication  
**EP 1304456 A1 20030423 (EN)**

Application  
**EP 01203954 A 20011017**

Priority  
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Abstract (en)  
The invention pertains to a regenerative soot filter (1) device applicable to exhaust gases from combustion engines, particularly diesel type engines. The device comprises a microwave generator (16) and a soot filter material (10), wherein a microwave absorbing material is provided on the soot filter material. The invention also pertains to a method of regenerating a soot filter comprising soot filter material applicable to exhaust gases from combustion engines, particularly diesel type engines. The method comprises applying microwave radiation to the soot filter by a microwave generator and passing a gas flow comprising oxygen over the soot filter, wherein the microwave radiation applied to the soot filter is absorbed by a microwave absorbing material that is provided on the soot filter material. <IMAGE>

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Citation (applicant)  
EP 0635625 A1 19950125 - DORNIER GMBH [DE]

Citation (search report)  
• [XY] DE 4028720 A1 19910411 - INTERATOM [DE]  
• [YA] US 5622680 A 19970422 - MONCEAUX LAURENCE [FR], et al  
• [E] EP 1160427 A2 20011205 - CORNING INC [US]  
• [X] PATENT ABSTRACTS OF JAPAN vol. 017, no. 080 (M - 1368) 17 February 1993 (1993-02-17)

Cited by  
EP1820562A1; US7923408B2; EP2169191A1

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