

Title (en)

Material for a spectral decoy flare which burns the material

Title (de)

Wirkmasse für ein beim Abbrand der Wirkmasse spektral strahlendes Scheinziel

Title (fr)

Masse active pour une cible fictive à rayonnement spectral lors de la combustion de la masse active

Publication

EP 2698362 A3 20170823 (DE)

Application

EP 13004006 A 20130812

Priority

DE 102012016454 A 20120817

Abstract (en)

[origin: EP2698362A2] Active mass for a decoy, which is radiating spectrally during the combustion of the active mass, with a radiation emitted during combustion of the active mass in the wavelength of 3.7-5.1 μm , comprises at least one nitrate ester and/or nitrosamine as carbon atoms and hydrogen atoms containing fuel, and ammonium perchlorate as an oxidizing agent. The radiation emitted during combustion of the active mass in the wavelength of 3.7-5.1 μm is stronger by a factor 15 than the radiation emitted during combustion of the active mass in the wavelength of 1.9-2.3 μm . Active mass for a decoy, which is radiating spectrally during the combustion of the active mass, with a radiation emitted during combustion of the active mass in the wavelength of 3.7-5.1 μm , comprises at least one nitrate ester and/or nitrosamine as carbon atoms and hydrogen atoms containing fuel, and ammonium perchlorate as an oxidizing agent. The radiation emitted during combustion of the active mass in the wavelength of 3.7-5.1 μm is stronger by a factor 15 than the radiation emitted during combustion of the active mass in the wavelength of 1.9-2.3 μm . The amount of the ammonium perchlorate is dimensioned so that it not sufficient for complete oxidation of the fuel. The active mass either comprises the nitrate ester in the form of a polymeric solid or a binder. Up to 5 carbon atoms are interconnected by a direct bond in the fuel and no elemental carbon-containing carbon source is present in the active mass.

IPC 8 full level

C06B 29/22 (2006.01); **C06B 45/10** (2006.01); **C06C 15/00** (2006.01)

CPC (source: EP US)

C06B 29/22 (2013.01 - EP US); **C06B 45/105** (2013.01 - EP US); **C06C 15/00** (2013.01 - EP US)

Citation (search report)

- [X1] US 2002148540 A1 20021017 - HISKEY MICHAEL A [US], et al
- [X1] US 3821041 A 19740628 - SCURLOCK A, et al
- [X1] GB 1605421 A 19981118 - LAWSON COLIN GEORGE, et al
- [X1] US 5192379 A 19930309 - JOHNSON CRAIG E [US], et al
- [X1] US 3946555 A 19760330 - GOEDE PHILIP J
- [IDA] WO 2007004871 A2 20070111 - TNO [NL], et al

Cited by

EP3995473A1; DE102020006890A1

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

DOCDB simple family (publication)

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DOCDB simple family (application)

EP 13004006 A 20130812; AU 2013213697 A 20130807; DE 102012016454 A 20120817; IL 22758813 A 20130722; US 201313969752 A 20130819; ZA 201306133 A 20130815