

Title (en)

SYNERGISTIC FLAME RETARDANT COMBINATIONS FOR POLYMER COMPOSITIONS AND USE THEREOF

Title (de)

SYNERGISTISCHE FLAMMSCHUTZMITTELKOMBINATIONEN FÜR POLYMERZUSAMMENSETZUNGEN UND DEREN VERWENDUNG

Title (fr)

COMBINAISONS SYNERGIQUES D'AGENTS IGNIFUGES POUR COMPOSITIONS POLYMÈRES ET LEUR UTILISATION

Publication

EP 3679095 A1 20200715 (DE)

Application

EP 18762272 A 20180829

Priority

- DE 102017215780 A 20170907
- EP 2018073236 W 20180829

Abstract (en)

[origin: WO2019048313A1] The invention relates to flame retardant combinations containing: phosphinic acid salt of formula (I) as component A in which R1 and R2 represent ethyl, M represents Al, Fe, TiOp or Zn, m represents 2 to 3, and $p = (4 - m) / 2$; a compound selected from the group consisting of Al-, Fe-, TiOp- or Zn salts of ethylbutylphosphinic acid, dibutylphosphinic acid, ethylhexylphosphinic acid, butylhexylphosphinic acid and/or dihexylphosphinic acid as component B; phosphonic acid salt of formula (II) as component C in which R3 represents ethyl, Met represents Al, Fe, TiOq or Zn, n represents 2 to 3, and $q = (4 - n) / 2$; melamine polyphosphate having an average degree of condensation between 2 to 200 as component D; and melamine cyanurate as component E. The polymer compositions can be used to produce fibres, films, and moulded bodies, in particular for applications in the field of electronics.

IPC 8 full level

C08K 3/32 (2006.01); **C08K 5/3492** (2006.01); **C08K 5/5313** (2006.01); **C08K 5/5317** (2006.01); **C08K 7/14** (2006.01); **C08L 67/02** (2006.01); **C08L 77/02** (2006.01); **C08L 77/06** (2006.01)

CPC (source: CN EP)

C08K 3/32 (2013.01 - EP); **C08K 5/3492** (2013.01 - CN); **C08K 5/34922** (2013.01 - EP); **C08K 5/34924** (2013.01 - EP); **C08K 5/34928** (2013.01 - EP); **C08K 5/5205** (2013.01 - EP); **C08K 5/5313** (2013.01 - CN EP); **C08K 5/5317** (2013.01 - EP); **C08K 5/5337** (2013.01 - CN); **C08K 7/14** (2013.01 - CN EP); **C08K 13/04** (2013.01 - CN); **C08L 67/02** (2013.01 - EP); **C08L 77/02** (2013.01 - EP); **C08L 77/06** (2013.01 - EP); **C08K 5/0066** (2013.01 - EP); **C08K 2201/005** (2013.01 - EP); **C08K 2201/014** (2013.01 - EP); **C08L 2201/02** (2013.01 - CN)

Citation (search report)

See references of WO 2019048313A1

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)

DE 102017215780 A1 20190307; CN 109467747 A 20190315; CN 109467747 B 20210706; EP 3679095 A1 20200715; TW 201912771 A 20190401; WO 2019048313 A1 20190314

DOCDB simple family (application)

DE 102017215780 A 20170907; CN 201810143528 A 20180212; EP 18762272 A 20180829; EP 2018073236 W 20180829; TW 107129744 A 20180827