Title (en)

MOULDING MATERIAL MIXTURE CONTAINING PHOSPHORUS FOR PRODUCING CASTING MOULDS FOR MACHINING METAL

Title (de)

PHOSPHORHALTIGE FORMSTOFFMISCHUNG ZUR HERSTELLUNG VON GIESSFORMEN FÜR DIE METALLVERARBEITUNG

Title (fr)

MÉLANGE DE MATIÈRES DE MOULAGE À BASE DE PHOSPHORE, UTILISÉ POUR PRODUIRE DES MOULES POUR LA TRANSFORMATION DE MÉTAUX

Publication

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Application

EP 07819175 A 20071019

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Abstract (en)

[origin: CA2666761A1] The invention relates to a moulding material mixture for producing castin g moulds for machining metal, to a method for producing casting moulds, and to casting mouldes obtained according to said method and to the use thereof. A fire-resistant moulding base material and a binding agent based on water glass is used in the production of said casting moulds. A proportion of a pa rticulate metal oxide is added to the binding agent, said metal oxide being selected from the group of silicon dioxide, aluminium oxide, titanium oxide and zinc oxide. Synthetic amorphous silicon dioxide is preferably used. Said moulding material mixture contains a phosphate as an essential component. T he addition of phosphate permits the mechanical resistance of casting moulds to be improved under high thermal stress.

IPC 8 full level

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CPC (source: EP KR US)

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Citation (search report)

See references of WO 2008046653A1

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DE102017114628A1; US10061143B2; WO2020253917A1; WO2021023493A1; WO2019002452A1; DE102020119013A1; WO2022013129A1

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