

Title (en)  
Method for producing a heat-sensitive recording material

Title (de)  
Verfahren zur Herstellung eines wärmeempfindlichen Aufzeichnungsmaterials

Title (fr)  
Procédé de fabrication d'un matériel d'enregistrement sensible à la chaleur

Publication  
**EP 2487043 B1 20131009 (DE)**

Application  
**EP 11154121 A 20110211**

Priority  
EP 11154121 A 20110211

Abstract (en)  
[origin: EP2487043A1] Producing a recording material comprises feeding a substrate; applying a first coating composition comprising 4,4'-dihydroxydiphenyl and a sensitizer to form a recording layer; drying the composition; applying a second coating composition comprising (meth)acrylates, photoinitiators and wax to form a protective layer; crosslinking the protective layer; applying the second coating composition to form a coating on back side of the substrate; and crosslinking the coating using high-energy radiation. Producing a heat-sensitive recording material with a substrate comprising a front and a back side, a color developer and a color acceptor containing heat-sensitive recording layer arranged on the front side of the substrate, a protective layer covering the thermosensitive recording layer and a coating on the back side of the substrate, comprises preparing a first coating composition comprising 85 wt.% of 4,4'-dihydroxydiphenyl, as color acceptor, and at least one sensitizer comprising methylol stearamide, stearic acid amide or dimethyl terephthalate; preparing a second coating composition comprising at least 65-95 wt.% of one or more (meth)acrylates comprising polyether(meth)acrylate, epoxy(meth)acrylate or urethane(meth)acrylate, 0-20 wt.% of photoinitiators and 0.5-20 wt.% of wax, where the amount of the second composition is 65.5-100 wt.%; continuously feeding the web-shaped substrate; applying the prepared first coating composition to form the heat-sensitive recording layer; drying the first coating composition; applying the second coating composition to form the protective layer; crosslinking the protective layer using high-energy radiation; applying the prepared second coating composition to form the coating on the back side of the substrate; and crosslinking the coating on the back side of the substrate using high-energy radiation.

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