

Title (en)  
SECURITY ELEMENT HAVING A MULTILAYER STRUCTURE

Title (de)  
SICHERHEITSELEMENT MIT MEHRSCICHTSTRUKTUR

Title (fr)  
ÉLÉMENT DE SÉCURITÉ À STRUCTURE MULTICOUCHE

Publication  
**EP 3288770 B1 20190626 (DE)**

Application  
**EP 16716825 A 20160411**

Priority  
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Abstract (en)  
[origin: WO2016173696A1] The invention relates to a security element for security papers, value documents, or the like, which consists of a multilayer structure capable of interference, wherein the multilayer structure capable of interference has a reflection layer, a dielectric layer, and a partially transparent layer, wherein the dielectric layer is arranged between the reflection layer and the partially transparent layer. According to the invention, the reflection layer of the multilayer structure capable of interference is formed by a colored layer or a further multilayer structure, wherein the colored layer and the multilayer structure are designed in such a way that the colored layer and the multilayer structure exhibit a metallic shade in incident light and a colorful shade in transmitted light.

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Opponent : OI BASF  
• EP 1504923 A2 20050209 - AGRA VADEKO INC [CA]  
• WO 0103945 A1 20010118 - FLEX PRODUCTS INC [US]  
• WO 0153113 A1 20010726 - FLEX PRODUCTS INC [US]  
• WO 2005038136 A1 20050428 - GIESECKE & DEVRIENT GMBH [DE], et al  
• WO 2011064162 A2 20110603 - BASF SE [DE], et al  
• DE 102009058243 A1 20110616 - GIESECKE & DEVRIENT GMBH [DE]  
• WO 2011032665 A1 20110324 - GIESECKE & DEVRIENT GMBH [DE], et al  
• WO 2014187750 A1 20141127 - BASF SE [DE]  
• WO 2011082761 A1 20110714 - GIESECKE & DEVRIENT GMBH [DE], et al  
• US 7630109 B2 20091208 - PHILLIPS ROGER W [US], et al  
• ROGER W PHILLIPS; ANTON F BLEIKOLM: "Optical coatings for document security", APPLIED OPTICS, vol. 35, no. 28, 1996, pages 5529 - 5534, XP055077565

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