

Title (en)  
SHEET METAL PACKAGING PRODUCT WITH A STRUCTURED SURFACE AND METHOD FOR PRODUCING A SHEET METAL PACKAGING PRODUCT OF THIS TYPE

Title (de)  
VERPACKUNGSBLECHERZEUGNIS MIT STRUKTURIERTER OBERFLÄCHEUND VERFAHREN ZUR HERSTELLUNG EINES SOLCHEN VERPACKUNGSBLECHERZEUGNISSES

Title (fr)  
PRODUIT D'EMBALLAGE EN TÔLE À SURFACE STRUCTURÉE ET PROCÉDÉ DE FABRICATION D'UN PRODUIT D'EMBALLAGE EN TÔLE DE CE TYPE

Publication  
**EP 4097267 A1 20221207 (DE)**

Application  
**EP 21701237 A 20210112**

Priority  
• DE 102020102381 A 20200131  
• EP 2021050447 W 20210112

Abstract (en)  
[origin: CA3162772A1] The invention relates to sheet metal packaging products, in particular tinplate or electrolytically chrome-plated sheet steel (ECCS), consisting of a sheet steel substrate (S) with a thickness in the region of 0.1 mm to 0.6 mm and a coating (B), in particular made of tin and/or chromium or chromium and chromium oxide, that is electrolytically deposited on at least one side of the sheet metal substrate. In addition, at least one surface of the sheet metal packaging product provided with the coating (B) has a surface profile with periodically repeating structure elements in at least one direction, wherein an autocorrelation function resulting from the surface profile has a plurality of side lobes with a height of at least 20%, preferably at least 30% of the height of the main lobe. These sheet metal packaging products have improved and novel surface properties.

IPC 8 full level  
**C22C 38/04** (2006.01); **B21B 1/22** (2006.01); **B21B 27/00** (2006.01); **B21H 8/00** (2006.01); **C21D 8/02** (2006.01); **C21D 9/46** (2006.01); **C25D 5/00** (2006.01); **C25D 5/36** (2006.01); **C25D 5/50** (2006.01); **C25D 7/06** (2006.01); **C25D 9/10** (2006.01)

CPC (source: EP KR US)  
**B21B 1/227** (2013.01 - US); **B21B 27/005** (2013.01 - US); **B32B 15/013** (2013.01 - US); **C21D 6/001** (2013.01 - US); **C21D 6/005** (2013.01 - US); **C21D 6/008** (2013.01 - US); **C21D 8/0205** (2013.01 - US); **C21D 8/0226** (2013.01 - US); **C21D 8/0273** (2013.01 - US); **C21D 8/0436** (2013.01 - EP KR); **C21D 8/0473** (2013.01 - EP KR); **C21D 9/48** (2013.01 - EP KR US); **C21D 10/00** (2013.01 - US); **C22C 38/001** (2013.01 - EP KR US); **C22C 38/002** (2013.01 - US); **C22C 38/008** (2013.01 - US); **C22C 38/02** (2013.01 - US); **C22C 38/04** (2013.01 - EP KR US); **C22C 38/06** (2013.01 - EP KR US); **C22C 38/08** (2013.01 - US); **C22C 38/12** (2013.01 - US); **C22C 38/14** (2013.01 - US); **C22C 38/16** (2013.01 - US); **C22C 38/42** (2013.01 - EP KR); **C25D 5/10** (2013.01 - US); **C25D 5/36** (2013.01 - EP KR US); **C25D 5/505** (2013.01 - EP KR US); **C25D 5/605** (2020.08 - EP KR US); **C25D 5/627** (2020.08 - EP KR US); **C25D 7/0614** (2013.01 - EP KR US); **C25D 9/10** (2013.01 - EP KR US); **B21B 1/227** (2013.01 - EP KR); **B21B 27/005** (2013.01 - EP KR)

Citation (search report)  
See references of WO 2021151652A1

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Designated extension state (EPC)  
BA ME

Designated validation state (EPC)  
KH MA MD TN

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**DE 102020102381 A1 20210805**; CA 3162772 A1 20210805; CN 114929921 A 20220819; EP 4097267 A1 20221207; JP 2023513037 A 20230330; KR 20220137058 A 20221011; US 2023081814 A1 20230316; WO 2021151652 A1 20210805

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**DE 102020102381 A 20200131**; CA 3162772 A 20210112; CN 202180008503 A 20210112; EP 2021050447 W 20210112; EP 21701237 A 20210112; JP 2022546364 A 20210112; KR 20227030244 A 20210112; US 202117796296 A 20210112