

Title (en)

METHOD FOR PRODUCING AN ANTIMICROBIAL COATING

Title (de)

VERFAHREN ZUR HERSTELLUNG EINER ANTIMIKROBIELLEN BESCHICHTUNG

Title (fr)

PROCÉDÉ DE PRODUCTION D'UN REVÊTEMENT ANTIMICROBIEN

Publication

**EP 4189133 A1 20230607 (DE)**

Application

**EP 21769626 A 20210802**

Priority

- AT 506502020 A 20200803
- AT 2021060264 W 20210802

Abstract (en)

[origin: WO2022027077A1] The invention relates to a method for producing an antimicrobial coating (2) on a metal or plastics surface or ceramic or mineral surface, according to which method a copper-containing metallic layer is deposited onto this surface by means of a PVD process in a deposition chamber (8), for which purpose particles (4) are generated from a copper-containing target (11) and deposited onto the surface (3) to be coated, and wherein, during the deposition process, oxygen and/or nitrogen are introduced into the deposition chamber (8) so that the surface of the particles (4) is oxidised to form an oxidic surface layer (5) having Cu(I) oxide and/or a nitridic surface layer (5) having Cu(I) nitride, wherein the particles (4) are produced having a metallic-copper proportion of at least 60 wt.%.

IPC 8 full level

**C23C 14/08** (2006.01); **A61L 31/08** (2006.01); **C23C 14/00** (2006.01); **C23C 14/16** (2006.01)

CPC (source: AT EP)

**A61L 31/082** (2013.01 - EP); **A61L 31/16** (2013.01 - EP); **C23C 14/00** (2013.01 - AT); **C23C 14/0021** (2013.01 - AT); **C23C 14/0094** (2013.01 - EP); **C23C 14/08** (2013.01 - AT); **C23C 14/087** (2013.01 - EP); **C23C 14/165** (2013.01 - EP); **C23C 14/34** (2013.01 - AT); **A61L 2300/102** (2013.01 - EP); **A61L 2300/404** (2013.01 - EP)

Citation (search report)

See references of WO 2022027077A1

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

Designated validation state (EPC)

KH MA MD TN

DOCDB simple family (publication)

**WO 2022027077 A1 20220210**; AT 523830 A4 20211215; AT 523830 B1 20211215; EP 4189133 A1 20230607

DOCDB simple family (application)

**AT 2021060264 W 20210802**; AT 506502020 A 20200803; EP 21769626 A 20210802