

Title (en)

CORRECTION APPARATUS FOR CORRECTING THE PLANARITY OF A METAL STRIP AND RELATED CORRECTION METHOD

Title (de)

KORREKTURVORRICHTUNG ZUR KORREKTUR DER PLANHEIT EINES METALLSTREIFENS UND ENTSPRECHENDES KORREKTURVERFAHREN

Title (fr)

APPAREIL DE CORRECTION POUR CORRIGER LA PLANÉITÉ D'UNE BANDE MÉTALLIQUE ET PROCÉDÉ DE CORRECTION ASSOCIÉ

Publication

**EP 4176104 A1 20230510 (EN)**

Application

**EP 21749696 A 20210702**

Priority

- IT 202000016012 A 20200702
- IB 2021055965 W 20210702

Abstract (en)

[origin: WO2022003646A1] A correction apparatus for correcting the planarity of a metal strip (1 ) advancing into a coating system for coating said metal strip with a layer of molten metal, said apparatus comprising - a bridle roll (2), which modifies the feeding direction of the metal strip (1) exiting an annealing furnace (10); - only one sink roll (3), arranged downstream of said bridle roll (2) and inside a tank (11) adapted to contain a bath (12) of said molten metal; - a correction device (4) for correcting the planarity of the metal strip arranged between said bridle roll (2) and said sink roll (3); wherein said correction device (4) comprises at least two motorized rolls (5, 6); wherein a first motorized roll (5) of said at least two motorized rolls is distal from said bridle roll (2) in a fixed position with respect to a feeding path of the metal strip (1), said first motorized roll (5) being arranged on a first side of said feeding path; wherein said bridle roll (2) is also arranged on said first side; and wherein a second motorized roll (6) of said at least two motorized rolls is proximal to said bridle roll (2) and movable along the direction of the strip thickness, said second motorized roll (6) being arranged on a second side, opposite to the first side, of said feeding path.

IPC 8 full level

**C23C 24/00** (2006.01)

CPC (source: EP US)

**C21D 9/0012** (2013.01 - EP US); **C21D 9/564** (2013.01 - EP US); **C23C 2/00344** (2022.08 - EP US); **C23C 2/0035** (2022.08 - EP US); **C23C 2/0038** (2022.08 - EP US); **C23C 2/004** (2022.08 - EP US); **C23C 2/40** (2013.01 - EP US)

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 2022003646 A1 20220106**; CN 116324033 A 20230623; EP 4176104 A1 20230510; IT 202000016012 A1 20220102; JP 2023531063 A 20230720; JP 7511034 B2 20240704; US 2023257842 A1 20230817

DOCDB simple family (application)

**IB 2021055965 W 20210702**; CN 202180057345 A 20210702; EP 21749696 A 20210702; IT 202000016012 A 20200702; JP 2022580031 A 20210702; US 202118003675 A 20210702