

Title (en)

PROCESS FOR PRODUCING COATINGS ON ZINC

Publication

**EP 0355525 B1 19920325 (DE)**

Application

**EP 89114427 A 19890804**

Priority

JP 19937088 A 19880810

Abstract (en)

[origin: GB2221698A] Zinc-base plated steel is treated with an aqueous composition containing 200ppm Ni<sup>2+</sup> and NH<sub>3</sub> in a molar amount of at least 6 times the amount of Ni<sup>2+</sup> and having a pH of less than 11.0 to provide a coating of Ni or Ni compound, prior to phosphating to improve the corrosion resistance. The Ni<sup>2+</sup> is preferably present in an amount of less than 100g/l and the NH<sub>3</sub> is preferably present in an amount of less than 300g/l. Particularly preferred amounts of Ni<sup>2+</sup> and NH<sub>3</sub> are 5-50g/l and 10-100g/l respectively. The composition may be applied by dipping or spraying, or alternatively the composition may be applied by an electrolytic treatment method. The coated surface may be subsequently conversion coated, preferably by phosphating, or painted.

IPC 1-7

**C23C 18/32**; **C23C 22/78**

IPC 8 full level

**C23C 22/60** (2006.01); **C23C 18/32** (2006.01); **C23C 22/78** (2006.01)

CPC (source: EP US)

**C23C 18/32** (2013.01 - EP US); **C23C 22/78** (2013.01 - EP US)

Cited by

EP1381522A4; WO9111542A3

Designated contracting state (EPC)

BE DE ES FR IT NL SE

DOCDB simple family (publication)

**EP 0355525 A1 19900228**; **EP 0355525 B1 19920325**; DE 3925840 A1 19900215; DE 58901024 D1 19920430; ES 2032634 T3 19930216; GB 2221698 A 19900214; GB 2221698 B 19930224; GB 8918153 D0 19890920; JP H0250976 A 19900220; JP H0723543 B2 19950315; US 4985087 A 19910115

DOCDB simple family (application)

**EP 89114427 A 19890804**; DE 3925840 A 19890804; DE 58901024 T 19890804; ES 89114427 T 19890804; GB 8918153 A 19890809; JP 19937088 A 19880810; US 38907189 A 19890803