Title (en)

ZINC PHOSPHATIZING USING EPOXIDES

Title (de)

ZINKPHOSPHATIERUNG MIT EPOXIDEN

Title (fr)

PROCEDE DE PHOSPHATATION AU ZINC FAISANT INTERVENIR DES EPOXYDES

Publication

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Application

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Abstract (en)

[origin: DE19940619A1] The invention relates to a method for phosphatizing metal surfaces made of steel, galvanized or alloy-galvanized steel, aluminum and/or of aluminum alloys during which the metal surfaces are brought into contact with a phosphatizing solution that contains zinc by spraying or immersing the metal surfaces for a duration ranging from 3 seconds to 8 minutes. Said phosphatizing solution contains 0.2 to 3 g/l of zinc ions and 3 to 50 g/l of phosphate ions, whereby the weight ratio of phosphate ions to zinc ions is at least 3.7, and optionally contains one or more accelerators. In addition, the metal surfaces are brought into contact with an aqueous solution or suspension of an organic polymer during or after the phosphatizing. The inventive method is characterized in that the organic polymer is a polyepoxide selected from glycidyl ethers based on aliphatic polyols or based on bisphenol A or bisphenol F provided in a quantity ranging from 0.1 to 5 g/l in the aqueous solution or suspension.

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