

## ABSTRACT

Galvanic coatings in machine building industry. The development of technological process for protective–decorative chromium coating on steel details.

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In presented project the technology of 1  $\mu\text{m}$  of chromium plating on nickel sublayer for steel details was developed. Chromium deposition is carried out from sulphate electrolyte at 55° C and cathodic current density of 50 A/dm<sup>2</sup>. In project constructive and technologic calculations were made. The suitable equipment were chosen and automatic system for chromium deposition process proposed. Energy balance calculations and salary were made. Electroflotation method for sewage water purification proposed. Harmful and dangerous influences were analyzed and measures for labor safety and prevention of accidents proposed.

Key words: galvanic chromium plating, galvanic bath, voltage balance, electrolysis, electroflotation, corrosion.