

Referenz

Detoxication of galvanic waste water, Hermann Huster, Hagen

The Company

The Company Hermann Huster GmbH & Co. KG is a specialist for surface coatings and corrosion protection. Their range of services includes electro galvanizing, zinc ferric coatings, chromatising, passivation, sealing, zink-lamellae-coatings, organic top-coats, duplex procedure, and phosphatising.

The Process

The galvanic process consists of cleaning in acidic and alkaline solutions, rinsing, electrolytic coating, another rinsing, passivation with Cr(II) or Cr(VI)-solutions, and drying. Waste water from the various steps is treated in the company's waste water treatment plant. Water containing Cr(VI) is collected separately, Cr(VI) is reduced to Cr(III), the process is controlled via ORP and pH measurements. Afterwards all waste water streams are collectively neutralised with hydrochloric acid and sodium hydroxide, controlled via another pH measurement. At the outlet of the treatment plant, pH is monitored online to ensure that the water corresponds to the requirements of the municipal waste water treatment plant.

The challenge

pH measurements fulfill various tasks within the treatment process. In the reduction tank, a precise acidic pH ensures speedy reduction. In the neutralisation tank, pH is used to control the process to ensure that the pH of the released water is within the allowed specifications. Online monitoring of the water outlet is a legal requirement when releasing into the sewer system. ORP is used to control the dosing of the reduction chemicals. A fast change of the ORP potential indicates complete detoxication.



Customer's voice

We have selected the company Dr. A. Kuntze years ago for their competence and the excellent price-benefit-ratio. Since then we have never had reason to complain. We are quite satisfied with the performance and the life cycles of the instruments and the sensors, and with the maintenance service. We hold the company Dr. A. Kuntze in high esteem as a competent partner and a reliable supplier.

Eberhard Huster, CEO

Our Solution

The company Dr. A. Kuntze is Hustler's supplier for measuring and control equipment since 1972. To ensure reliability and precision of the measurements, Hustler has used the Dr. A. Kuntze service and maintenance from the beginning.

