



Industrial Wastewater Facility

This facility imports and accepts a variety of industrial wastewaters including: plating, cutting oils, paint, carwash, printing, textile and many others. The facility treats an average of 300,000 gal/day of these combined wastes.

The current treatment process uses pH adjusting with acid or lime, ferric sulfate, metal precipitate, and a flocculant. The treatment often requires a second treatment or combination with other streams to meet their discharge permit. Often there are regulated compounds in the treated water that require extra labor and treatment to maintain compliance.

Treatability with the Floccin Products

The facility is evaluating the efficacy of the Floccin products versus their chemistry. Based on analytical results, the Floccin products have proven reduce the heavy metals far below their current levels.



Analyte *	Untreated	Treated
Antimony	.087	<.01
Arsenic	0.35	<0.13
Barium	0.68	<0.01
Cadmium	0.14	<0.02
Chromium	8.929	<0.03
Cobalt	1.1	<0.01
Copper	40.850	0.190
Lead	0.690	<0.10
Mercury	0.76	<0.10
Molybdenum	4.218	0.450
Nickel	10.310	<0.05
Selenium	0.938	<0.16
Silver	0.198	0.021
Tin	1.874	0.12
Titanium	0.997	<0.002
Vanadium	0.213	<0.05
Zinc	18.080	0.018

*Units are in mg/L

Current treatment costs according to EPA published reference, 'Economic Analysis of Effluent Limitations Guidelines and Standards for the Centralized Waste Treatment Industry', December 1998, are at of \$0.18/gallon based on 205 sites and the treatability studies have shown the Floccin Products costs are less with lower residual levels making it easier to meet the regulatory discharge limits.