

# *Application Bulletin*

## **Lakos Eliminates Plugged Spray Nozzles On Aluminum Strip Cleaning System**

Faced with the inability to monitor their chemical solution spray-wash system when in operation, The West Company in Collegeville, Pennsylvania installed a pair of Lakos Separators and not only eliminated a recurring maintenance problem, but also reduced a potentially high rate of product rejection.

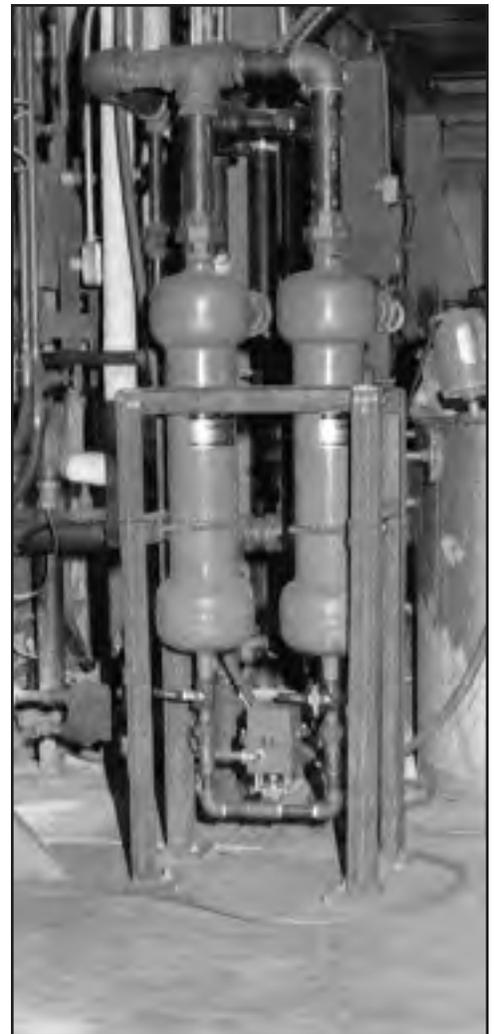
“With plugged nozzles, the aluminum coils we manufacture for the pharmaceutical business simply were not getting cleaned thoroughly or efficiently,” said Kenneth Smith, Process Development Engineer. “That, of course, wasn’t acceptable. And a routine of either checking the nozzles daily or inspecting the finished aluminum strip was neither effective nor cost efficient.”

Analysis of the troublesome solid identified it as the product of various hard water chemicals and cleaner-solution chemicals, combined with the aluminum to form a hard, insoluble precipitate with the appearance and consistency of sand. Suspended in a continuously recirculating tank of 400 gallons (1500 liters) at 168 U.S. gpm (38 m<sup>3</sup>/hr), the problem quickly multiplied and significantly affected the system’s performance.

“We needed a filtering system that didn’t remove particles below 50 micron in size, as some of the chemical surfactants in the cleaning solution would be lost,” says Smith. “It was also critical that the filter perform continuously with no routine maintenance.”

“The results with Lakos Separators include a dramatic increase in productivity of the machine and, more importantly, a high level of confidence that the aluminum strip is clean,” says Smith. “No incidence of clogged nozzles has occurred since the separators were installed, and the solution tank is noticeably cleaner.”

“I am extremely pleased with Lakos Separators and would recommend their use in similar circumstances. With the addition of the automatic valve (see photo), the system is virtually maintenance-free.”



### **CLAUDE LAVAL CORPORATION**

Not connected with The DeLaval Separator Company

1365 N. Clovis Avenue • Fresno, California 93727 USA

Telephone: (559) 255-1601 • Fax: (559) 255-8093

Toll-Free: (800) 344-7205 (USA, Canada & Mexico)

www.lakos.com • E-mail: info@lakos.com