Pratt Recycled Paper Mill Eliminates Boiler Trips and Saves \$18,000/Hour with Fisher™ Diagnostic Solution

RFSUITS

- Eliminated boiler trips, costing \$18,000 per hour
- Avoided an unplanned shutdown and the cost of lost production
- Improved valve monitoring and performance on three critical damper drives
- Extended the time between regularly scheduled maintenance shutdowns by two weeks



APPLICATION

Boiler fan damper drives (inlet, outlet, and fuel gas regulator)

CUSTOMER

Pratt Recycled Paper Mill in Shreveport, Louisiana, USA

CHALLENGE

Since the startup of this grass-roots paper mill, its maintenance managers have had trouble with non-Emerson positioners on the fan dampers to the boiler. The control problems ranged from a lack of signal response to missed positions with the inlet damper. These problems led to a lack of control on the fuel gas and outlet dampers as well.

Eventually, the boiler would trip without warning, shut down the paper machine, and bring plant production to a halt. After several attempts to correct this on-going issue, mill managers called the John H. Carter Company, an Emerson sales representative, for help. They needed to repair the damper controls and implement a long-term solution.

SOLUTION

Led by the account manager, the John H. Carter Company team studied the application and suggested that Pratt replace the positioners on the inlet damper with FIELDVUE™ digital valve controllers, preferably units with Advanced Diagnostics. With FIELDVUE instruments on other valves throughout the mill, managers were receptive to the idea.

"Applying Emerson diagnostic capabilities is the best thing we have done to improve availability and production since the mill started up."

Maintenance Supervisor Pratt Paper Mill Shreveport, Louisiana, USA



PULP & PAPER

During an unplanned shutdown, the Emerson services personnel made a quick-swap of old for new positioners on the inlet damper. The FIELDVUE instrument upgrade on the inlet damper had an immediate, positive impact on the performance of the boiler. And improving boiler control increased the mill's overall production.

One week later, during a scheduled shutdown, the team at the Pratt-Shreveport mill put FIELDVUE instruments on the remaining damper controls (fuel gas and outlet).

Since the diagnostics upgrade, the boiler has not tripped due to any problems with damper control. Improved reliability and monitoring has saved the mill about \$18,000 per hour in downtime, which equates to hundreds of thousands of dollars annually.

The mill has also been able to extend the time between regularly scheduled outages from less than six weeks to at least eight weeks.

RESOURCES

Product Bulletin: FIELDVUE DVC6200 Instruments

http://www.emerson.com/documents/automation/product-bulletinfieldvue-dvc6200-digital-valve-controller-en-123336.pdf

Brochure: FIELDVUE DVC6200 Instruments

http://www.emerson.com/documents/automation/brochure-fisherfieldvue-dvc6200-series-digital-valve-controller-en-125178.pdf



Pratt installed an OVER Meccanica four-drinier type board machine at the Shreveport mill to produce high performance, lightweight linerboard from 100% recycled paper.

f http://www.Facebook.com/FisherValves



http://www.Twitter.com/FisherValves

http://www.YouTube.com/user/FisherControlValve



http://www.LinkedIn.com/groups/Fisher-3941826

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