

Going Digital Pays Dividends for Mill Operators

Upgrading to Moog Digital Servo Valves can deliver significant performance enhancements to plant as well as enable the introduction of preventative maintenance diagnostics.

MOOG

Industry Sector: PULP & PAPER

Application:

TENSION CONTROL APPLICATIONS





Digital Servo Valves maximise machine productivity, improve uptime and lower maintenance costs.

Problem:

A paper rolling mill operator wanted to upgrade their machinery with a new electronic interface to assist with the accuracy of the calliper profile which used internal hydraulic pistons, as well as speeding up the profiling process with improved closed-loop control. Cost and ROI were key considerations, with technical support from ordering through to commissioning also influencing the buying decisions.

Solution:

After testing a prototype digital valve with the customer's machine manufacturer, Moog supplied 18 x D639 Profibus Servo Valves with integrated pressure sensors to replace the existing analogue servo valves.

The upgrade met the customers goal of improving the machine performance and also delivered a number of additional advantages including:

- Better static and dynamic performance via higher resolution and advanced control electronics
- Utilisation of the same electrical command signals, meaning fewer changes in the automation system
- Higher reliability and uptime as well as better machine safety
- Lower maintenance costs and cost of ownership
- Digital electronics enabling superior pressure control
- Profibus communication allowing the customer to take advantage of the diagnostic functions and internal valve error handling integrated in the digital valves

The new digital servo valves were installed and commissioned in under two days, minimising downtime, and the customer also received a day's training on Profibus.

