

Immediate Deployment of Waste Energy Technologies at Multiple Sites

Deploying 13 Energy-Efficient Industrial Technologies at 3 Paper Mills

Project Description

This project will deploy industrial technologies to more efficiently recover and reuse water and steam at pulp and paper facilities. Verso Paper Corp. (Verso) will implement the following portfolio of 13 commercially available, proven industrial technologies:

- White water reuse, specialty chemical water injection system, and digester flash steam redirected to chip bin; site location: Jay, Maine
- White water recovery, thermomechanical pulp (TMP) heat recovery, more efficient product drying equipment and energy recovery system to preheat warm water, and specialty chemical feed equipment; site location: Bucksport, Maine
- Vacuum condenser water recovery, vacuum pump water recovery, air compressor heat recovery, dryer exhaust heat capture, TMP heat recovery, and condensate collection system; site location: Sartell, Minnesota

For each subproject, Verso will purchase and install all major equipment; complete commissioning, shakedown, and start-up; and conduct performance testing.

Recipient Organization	Verso Paper Corp.
Location	Jay, Maine; Bucksport, Maine; Sartell, Minnesota
Award Date	November 2009
Expected Operational Date	March 2012
Funding	\$9.3 million in U.S. Department of Energy funding from the American Recovery and Reinvestment Act of 2009; \$9.7 million in private-sector cost share
Equipment	Varies by site



Verso Paper Corp. is improving energy efficiency at paper mills with heat recovery and automatic load controls for multiple air compressors.

Photo courtesy of Verso Paper Corp.

Benefits for Our Industry and Our Nation

Verso will install, test, commission, and operate energy-efficient technologies to validate system efficiency and durability. The benefits of this project will include an overall efficiency of 33%, an estimated 1.28 trillion British thermal units (Btu) in annual energy savings, and a reduction in carbon dioxide emissions by 56,000 tons per year. This project will also increase U.S. energy security, create immediate job opportunities for manufacturing and construction, and provide long-term employment for operation and maintenance of the technologies.

Project Partners

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