

RESI-BOOST® Adhesive Technology

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Georgia-Pacific Chemicals LLC

PELICE CONFERENCE

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bonds that last. | advancements that work.™

RESI-BOOST® Adhesive Technology Key Benefits



- Lower Resin Usage
- Decreased Cycle Time
- Increased bonding around knots and juvenile wood
- Downfall Reduction
- Prepress Consolidation
- Product Application



RESI-BOOST® Adhesive Technology Field Testing 1/2" 4-Plies

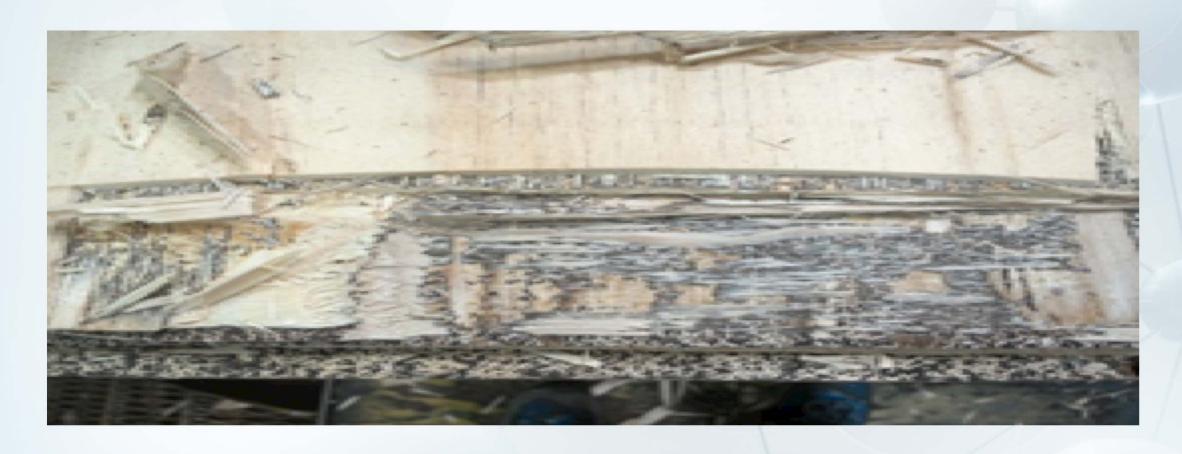






RESI-BOOST® Adhesive Technology Field Testing ½" 4-Plies







RESI-BOOST® Adhesive Technology Field Testing ½" 4-Plies



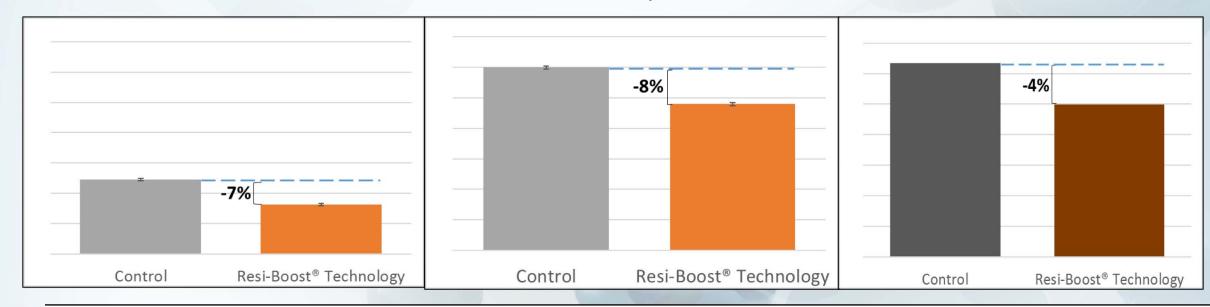




RESI-BOOST® Adhesive Technology Lower Resin Usage



Reduction in spread levels



Annual
Resin
Reduction

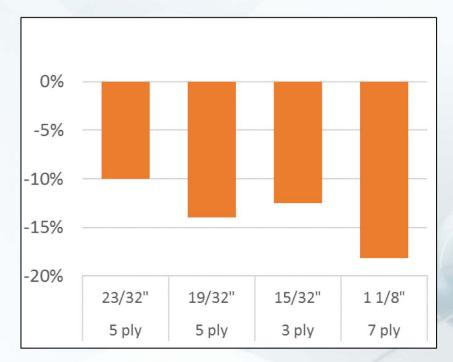
	Douglas Fir	Southern Yellow Pine	LVL
n	3% - 9%	Up to 8%	Up to 5%



RESI-BOOST® Adhesive Technology Decreased Cycle Time



Reduction in hot press time



Douglas Fir

Press Time Reduction 1

10% - 18%



Southern Yellow Pine

6% - 22%



RESI-BOOST® Adhesive Technology Increased bonding around knots and juvenile wood



DEMONSTRATED BENEFITS IN LABORATORY EVALUATION

CONTROL Standard spread rate 4.5 min Press Time 7% Veneer



RESI-BOOST ADHESIVE TECHNOLOGY 20% reduction in Spread Rate 4.5 min Press Time 7% Veneer



Equivalent amount of wood failure in RESI-BOOST Adhesive technology versus Control depicts strong resin bonds at lower glue spread

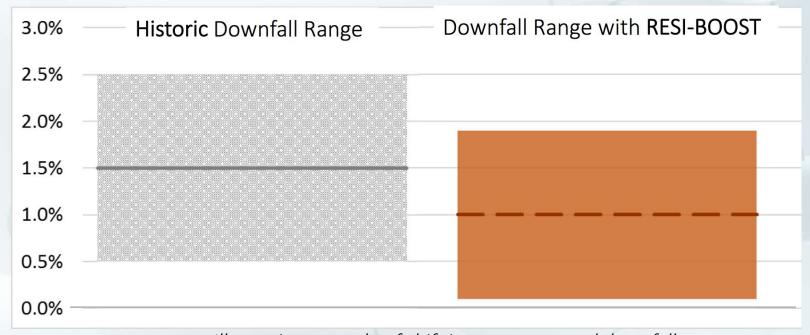


RESI-BOOST® Adhesive Technology Downfall Reduction



RESI-BOOST® Technology reduces Mill Downfall

- Douglas Fir
 - 0.2% reject reduction
- Southern Yellow Pine
 - 0.5% reject reduction



Illustrative example of shift in average annual downfall



RESI-BOOST® Adhesive Technology Customer Value Example



Process	RESI-BOOST® Adhesive Technology Example Value \$M	
Plywood (DF)	Up to \$ 250 per mill	
Plywood (SYP)		
LVL		
Current Industry Value	\$ 1 029	

Value = Press Time + Spread Reduction + Downfall Reduction



RESI-BOOST® Adhesive Technology Additional Benefits



Pre-press consolidation X Reduced tendency for dry out

Removing excess water from the glue increases its tackiness.

The prepressed panels hold their consolidation better & longer, allowing stronger glue bonds to form throughout the panel during hot pressing.



RESI-BOOST® Adhesive Technology Product Application



Why isn't every mill running this product?

- Training
- Knowledge sharing
- "It changes the way we make plywood"
 - Quality Manager at a premium plywood facility



RESI-BOOST® Adhesive Technology Contact Information



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