

Compression Shear Fixture for Adhesive Bonds

Built to ASTM D905 — Standard Test Method for Strength Properties of Adhesive Bonds in Shear by Compression Loading



OVERVIEW

Compression shear tool for testing adhesive bonds per ASTM D905. A bonded block specimen is seated in the fixture and a shearing tool pushes one block past the other, loading the bond line in shear. A self-aligning seat helps keep load parallel to the glue line.

KEY FEATURES

- Shearing tool loads the bond line in compression shear
- Self-aligning seat promotes uniform load across the bond
- Adjustable specimen hold for consistent positioning
- Hardened shearing edges for long service
- Loaded between standard compression platens

TECHNICAL SPECIFICATIONS

Test method	Shear by compression loading
Test type / loading	Static compression shear
Specimens	Bonded block specimens per ASTM D905
Load capacity	50 kN standard; higher capacities on request
Fixture material	Hardened tool steel
Contact surfaces	Hardened shearing tool and self-aligning seat
Machine connection	Loaded by compression platens or threaded adapter
Compatible frames	Electromechanical and servo-hydraulic universal test machines

APPLICATIONS

- Wood adhesives
- Engineered wood products
- Adhesive formulation development
- Wood products QC

ABOUT THE STANDARD

ASTM D905 determines the comparative shear strength of adhesives used for bonding wood and similar materials, loaded in compression shear. Two blocks are bonded with an offset, and one block is pushed relative to the other until failure. Results are reported as shear strength and percent wood failure.

Ordering & customization: Specify specimen size, required capacity and test machine connection.

Specifications are typical and may vary by configuration; confirm at time of quote. Users should refer to the current edition of the standard for test procedures.
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