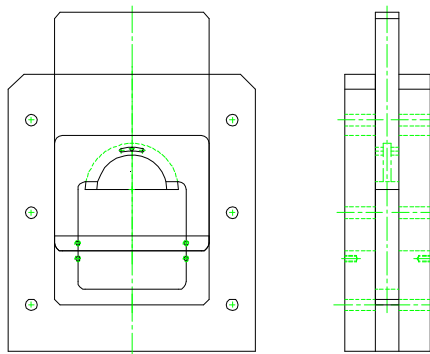


## SHEAR PARALLEL TO GRAIN



Specimen	Width	Up to 2.0"
	Thickness	Up to 2.5"
	Length	Up to 2.0"
Fixture	Construction	High strength steel with protective black oxide
	Temperature	-120 to 250°F (-85 to 122°C)
	Mounting	Platen to platen (not included) or 1/2" -20 loading coupling
	Capacity	15,000 lbs (66.7kN)
	Weight	20 lbs approximately
	Dimensions	Assembled - 3" x 8" x 10"
	Standard	Manufactured in accordance with ASTM D143

### Model No. ASTM.D0143.70 - Shear Parallel to Grain

Fixture can handle specimens up to 2" wide by 2" long by 2.5" thick. The loading anvil has a self-alignment seat that allows uniform lateral distribution of load. A 1/2" -20 coupling supplied in loading plate or can be used platen to platen. The compression loading fixture that applies a shear load to a bonded wooden sample has a 15,000lbs capacity. The fixture is constructed of high strength steel in accordance with ASTM D143, D905, D2559, D3931 and D5751.

# **MODEL NO. ASTM.D0143.70**

## **ADHESIVE, SHEAR**

### **ACCESSORIES**

#### **Upper fixture attachment is supplied with 1/2"-20 female coupling. (Common adapter sizes include:)**

Model No. M01S21 - 1/2" Male Clevis (Type B) to 1/2" -20 Threaded Stud Adapter  
Model No. M02S21 - 5/8" Male Clevis to (Type C) 1/2" -20 Threaded Stud Adapter  
Model No. M03S21 - 1.25" Male Clevis (Type D) to 1/2" -20 Threaded Stud Adapter  
Model No. M12S21 - 12mm Male Clevis (Type O) to 1/2" -20 Threaded Stud Adapter  
Model No. S36S21 - 1" -14 to 1/2" -20 Threaded Step Stud  
Model No. LN21 - 1/2" -20 Threaded Locking Nut with Knurled OD

#### **Lower fixture attachment is supported on a platen or flat surface of the test machine. (Common adapter sizes include:)**

Model No. PLAT.RF061.10 - 6" Diameter Round Fixed Compression Platen  
Model No. PLAT.RA061.10 - 6" Diameter Round Articulating Compression Platen  
Model No. PLAT.SF061.10 - 6" Square Fixed Compression Platen  
Model No. PLAT.SA061.10 - 6" Square Articulating Compression Platen  
Model No. M03S36 - 1.25" Male Clevis to 1" -14 Threaded Stud Adapter

### **SPARE PARTS**

### **REFERENCE DOCUMENT AND TEST METHOD SCOPE:**

#### Reference

ASTM Test Method D143 - 14

Standard Test Methods for Small Clear Specimens of Timber

#### 1. Scope

1.1 These test methods cover the determination of various strength and related properties of wood by testing small clear specimens.

1.1.1 These test methods represent procedures for evaluating the different mechanical and physical properties, controlling factors such as specimen size, moisture content, temperature, and rate of loading.

1.1.2 Sampling and collection of material is discussed in Practice D5536. Sample data, computation sheets, and cards have been incorporated, which were of assistance to the investigator in systematizing records.

1.1.3 The values stated in inch-pound units are to be regarded as the standard. The values given in parentheses are mathematical conversions to SI units that are provided for information only and are not considered standard. When a weight is prescribed, the basic inch-pound unit of weight (lbf) and the basic SI unit of mass (Kg) are cited.

1.2 The procedures for the various tests appear in the following order

Photographs of Specimens (5) Control of Moisture Content and Temperature (6) Record of Heartwood and Sapwood (7)

Static Bending (8) Compression Parallel to Grain (9) Impact Bending (10) Toughness (11) Compression Perpendicular to Grain (12)

Hardness (13) Shear Parallel to Grain (14) Cleavage (15) Tension Parallel to Grain (16) Tension Perpendicular to Grain (17) Nail Withdrawal (18) Specific Gravity and Shrinkage in Volume (19) Radial and Tangential Shrinkage (20) Moisture Determination (21) Permissible Variations (22) Calibration (23)

1.3 *This standard does not purport to address all of the safety concerns, if any, associated with its use. It is the responsibility of the user of this standard to establish appropriate safety and health practices and determine the applicability of regulatory limitations prior to use.*

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