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## Standard Terminology Relating to Flax and Linen<sup>1</sup>

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### 1. Scope

1.1 This terminology covers definitions of technical terms related to flax and linen.

### 2. Referenced Documents

2.1 *ASTM Standards*:<sup>2</sup>

D123 Terminology Relating to Textiles

### 3. Terminology

3.1 *Definitions*:

**bast fibers**, *n—in flax stems*, fibers found in the layer of phloem of the flax stem between the inner xylem tissue and the epidermis tissue.

**breaking**, *v—in flax stems*, the crushing of the structure of the stem; loosening the bond between the fiber bundles and shives and breaking the shives into short pieces to facilitate its removal.

**combing**, *v—in flax*, the processing of tow so as to produce tops or silver which have the staple length and width suitable for use in the worsted spinning system.

**cottonizing**, *v—in flax*, the processing of flax fiber so as to make it suitable for use in the cotton spinning system.

**decortivating**, *v—in flax*, the process of mechanically separating fiber bundles from straw.

**de-seeding**, *v—in flax*, the process of removing seeds and seed-holding structures from plants.

**fiber bundle**, *n—in flax*, group of ultimate fibers which are held together in the flax stem by pectins, lignins or any combination thereof.

**flax**, *n*—the generic name for plants that are botanically classified as *Linum usitatissimum*, which are cultivated for seed and/or fiber.

**hackling**, *v—in flax*, the process of cleaning and aligning long-line fibers to improve fineness and remove non-fibrous materials and short fibers.

**linen**, *n*—a yarn or fabric made solely from flax fibers.

**linen blend**, *n*—a yarn or fabric made from a combination of flax and other fibers.

**long line**, *n—in flax*, flax fiber bundles that have a minimum length of 50 cm.

**over-retting**, *v—in flax*, indicates that decomposition has caused excessive deterioration of bast fibers. (See retting and underretting)

**retting**, *v—in flax*, the process of partial biological or chemical decomposition of pectins and other components which bind the fiber, fiber bundles, and the non-fiber structures, thereby facilitating removal of bast fibers from stems. (See underretting and over-retting)

**scutching**, *v*—the mechanical beating and scraping of flax straw subsequent to breaking to separate the shives and tow from the long line flax fiber.

**shives**, *n*—the woody parts of the flax plant which are not fibers.

**straw**, *n—in flax*, refers to dried stems and plant parts such as roots, leaves, and seed holding structures.

**tow**, *n—in flax fibers*, a combination of fiber bundles and ultimate fibers that have a maximum length of 50 cm.

DISCUSSION—Tow can be made during any stage of processing. For example, breaker, scutched and hackled tow are respectively created subsequent to breaking, scutching and hackling.

**trash**, *n—in flax fiber*, any non-fibrous material.

**ultimate fiber**, *n—in flax*, an individual bast fiber.

**under-retting**, *v—in flax*, indicates that decomposition is insufficient to allow fiber bundles to be easily removed from the non-fibrous parts of the stem. (See retting and over-retting)

3.2 *Other Definitions*—For the definitions of other textile terms used in this standard, refer to Terminology D123.

<sup>1</sup> This terminology is under the jurisdiction of ASTM Committee D13 on Textiles and is the direct responsibility of Subcommittee D13.17 on Flax and Linen.

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<sup>2</sup> For referenced ASTM standards, visit the ASTM website, www.astm.org, or contact ASTM Customer Service at service@astm.org. For *Annual Book of ASTM Standards* volume information, refer to the standard's Document Summary page on the ASTM website.