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Standard Terminology Relating to Spinal Implants¹

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1. Scope

1.1 This terminology covers basic terms and considerations for spinal implant devices and their mechanical analyses.

2. Referenced Documents

2.1 *ASTM Standards*:²

E6 Terminology Relating to Methods of Mechanical Testing³

E1150 Definition of Terms Relating to Fatigue³

3. Terminology

Definitions Related to Spinal Implant Devices

anchor, *n*—components that are directly attached to the bony elements of the spine (sacrum, lamina, pedicle, vertebral body, spinous process, transverse process, the pelvis, or ribs).

band, *n*—a flexible anchor component with a noncircular cross section that connects the bony elements of the spine, pelvis, or ribs to each other or to other implant components using a knot or similar tying mechanism, forming a locked, closed loop.

bolt, *n*—an anchor component that connects to the bony elements of the spine, pelvis, or ribs by means of threads with the lead threads accommodating a nut thus sandwiching the bony element or implant component between the nut or washer and bolt head or other fixed stop.

expansion anchor, *n*—a component that forms a connection to bony element by means of a mechanism which enlarges once the component is inserted into the bony elements.

¹ This terminology is under the jurisdiction of ASTM Committee F04 on Medical and Surgical Materials and Devices and is the direct responsibility of Subcommittee F04.25 on Spinal Devices.

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² 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.

³ Withdrawn.

hook, *n*—an anchoring component that fastens to the spine by means of a curved blade passed under or over lamina, transverse or spinous processes or into an anatomic or surgically created notch or opening.

hook blade, *n*—that portion of a spinal hook that is placed under, over, or into a bony structure to provide attachment.

hook body—that portion of a spinal hook that connects the hook blade to the longitudinal element.

post, *n*—a non-threaded anchor component that connects to the bony elements of the spine, pelvis, or ribs by means of a non-threaded hole in the bony element.

screw, *n*—an anchor component that connects to the bony elements of the spine, pelvis, or ribs by means of threads.

staple, *n*—an anchor component that connects the bony elements of the spine, pelvis, or ribs to each other or to other implant components by using at least two interconnected posts.

wire—a single strand flexible anchor component with a circular cross section that connects the bony elements of the spine, pelvis, or ribs to each other or to other implant components. A series of wire components can be bound together to form a cable (see **bundle**).

assembly, *n*—a complete implant configuration (not including spine, pelvis, ribs, or substitute material) as intended for surgical use.

component, *n*—any single element used in an assembly.

construct, *n*—a complete implant configuration attached to and including the spine, pelvis, ribs or substitute material as intended for surgical use.

interbody spacer, *n*—a structure (biologic or synthetic) to replace (partially or totally) the vertebral body or intervertebral disk(s), or both.

intervertebral body fusion devices, *n*—a structure which is placed in the disc space between two adjacent vertebral bodies to provide support for eventual arthrodeses of the two adjacent vertebral bodies.

intervertebral body fusion cage, *n*—a hollow device which contains graft material.

partial replacement disc—a structure intended to restore a portion of the support and motion or a portion thereof, between adjacent vertebral bodies.