This standard covers wheelchair seating devices that are intended to provide postural support and/or tissue integrity management. The standard is designed to produce objective and comparable information about wheelchair seating products.

Section 1 specifies a global coordinate system that permits the determination and recording of a person’s posture while seated in a wheelchair, and standard terms and definitions for use in describing posture and the dimensions, location and orientation of seating support surfaces. Section 2 specifies multiple test methods for characterizing wheelchair seat cushions intended to maintain tissue integrity. Section 3 specifies test methods for the determination of static, impact, and repetitive load strengths for postural support devices intended for use with wheelchairs. Section 6 specifies test methods that simulate aging and characterize the changes in physical and mechanical properties of seat cushions based on the simulated use. Section 12 specifies a method for the measurement of performance of a wheelchair seat cushions intended to use immersion and envelopment to reduce local areas of pressure. The ability of the cushion to accommodate changes in size and mass are measured to represent the changes that can occur in the life of a user or between users.

This standard is useful for manufacturers and suppliers of wheelchair seating devices that are intended to provide postural support and/or tissue integrity management who wish to provide consistent, quality information to clinicians and consumers about their products.

ANSI/RESNA WC-3 consists of the following sections under the general title Wheelchairs:

Section 1: Vocabulary, reference axis convention and measures for body posture and postural support surfaces
Section 2: Determination of physical and mechanical characteristics of seat cushions intended to manage tissue integrity
Section 3: Determination of static, impact and repetitive load strengths for postural support devices
Section 6: Determination of the changes in properties following simulated extended use of seat cushions
Section 12: Envelopment testing of seat cushions with dual semispherical indenter

Cost: $575
Publication Date: December 2018
How to Order: Standards are available for purchase through RESNA. Go to www.resna.org/at-standards.

The RESNA Standards Committee on Wheelchair and Related Seating is actively recruiting additional members. If interested, go to www.resna.org/at-standards.

RESNA’s Assistive Technology Standards are approved for publication as American National Standards by the American National Standards Institute (ANSI), ensuring that the standards development process meets the Institute’s essential requirements for openness, balance, consensus and due process.

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