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NSF International Standard / American National Standard

NSF/ANSI 12 - 2017

Automatic Ice Making Equipment

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NSF/ANSI 12 - 2017

NSF International Standard/ American National Standard for Food Equipment —

Automatic ice making equipment

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Foreword²

NSF/ANSI 12 establishes minimum food protection and sanitation requirements for the materials, design, manufacture, and performance of automatic ice making equipment and their related components.

This edition of the Standard contains the following revision:

Issue 11

This revision updated the Normative References in section 2 and updated language in sections 5.22 and 5.27.1.

This Standard was developed by the NSF Joint Committee on Food Equipment using the consensus process described by the American National Standards Institute.

Suggestions for improvement of this Standard are welcome. This Standard is maintained on a Continuous Maintenance schedule and can be opened for comment at any time. Comments should be sent to Chair, Joint Committee on Food Equipment at standards@nsf.org or, c/o NSF International, Standards Department, P.O. Box 130140, Ann Arbor, Michigan 48113-0140, USA.

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NSF/ANSI Standard for Food Equipment –

Automatic ice making equipment

1 General

1.1 Purpose

This Standard establishes minimum food protection and sanitation requirements for the materials, design, construction, and performance of automatic ice making equipment and their related components.

1.2 Scope

This Standard contains requirements for automatic ice making equipment and devices used in the manufacturing, processing, storing, dispensing, packaging, and transportation of ice intended for human consumption. This Standard does not apply to equipment used solely in the manufacturing of block ice.

Automatic ice making equipment components and materials covered under other NSF or NSF/ANSI Standards or Criteria shall also comply with the requirements therein. This Standard is not intended to restrict new unit design, provided that such design meets the minimum specifications described herein.

1.3 Alternate materials, design, and construction

While specific materials, design, and construction may be stipulated in this Standard, equipment that incorporates alternate materials, design, or construction may be acceptable when such equipment meets the intent of the applicable requirements herein.

1.4 Measurement

Decimal and SI conversions provided parenthetically shall be considered equivalent. Metric conversions and significant figure rounding have been made according to IEEE/ASTM SI 10.

2 Normative references

The following documents contain provisions that, through reference, constitute provisions of this NSF/ANSI Standard. At the time this Standard was balloted, the editions listed below were valid. All documents are subject to revision, and parties are encouraged to investigate the possibility of applying the recent editions of the documents indicated below. The most recent published edition of the document shall be used for undated references.

40 C.F.R. §152.500 Requirements for devices (Pesticide Registration and Classification Procedures)³

³ U. S. Government Printing Office, Washington, DC 20402 <www.gpo.gov>.

40 C.F.R. §§162-180 Federal Insecticide, Fungicide, and Rodenticide Act³

40 C.F.R. §180.940 Tolerance exemptions for active and inert ingredients for use in antimicrobial formulations (Food-Contact Surface Sanitizing Solutions)³

ANSI Z97.1 – 2009. Safety Glazing Materials Used in Buildings – Safety Performance Specifications and Methods of Test⁴

ANSI/ASSE 1001 – 2008. Atmospheric Type Vacuum Breakers⁵

ANSI/ASSE 1020 – 2004. Pressure Vacuum Breaker Assembly⁵

ANSI/ASSE 1022 – 2003. Backflow Preventer for Beverage Dispensing Equipment⁵

ANSI/ASSE 1024 –2004. Dual Check Backflow Preventers 5

APHA Standard Methods for the Examination of Water and Wastewater, 22nd edition⁶

ASSE 1032 – 2004. Dual Check Valve Type Backflow Preventers for Carbonated Beverage Dispensers – Post Mix Type⁵

IEEE/ASTM SI 10 – 2010. American National Standard for Metric Practice⁷

NSF/ANSI 51. Food equipment materials

NSF/ANSI 170. Glossary of food equipment terminology

UL 197 – 2010, Standard for Commercial Electrical Cooking Appliances⁸

3 Definitions

Terms used in this Standard that have special technical meaning are defined in NSF/ANSI 170.

4 Materials

The requirements contained in this section are intended to protect food from contamination and ensure that the materials used in the manufacture of automatic ice making equipment resist wear, penetration by vermin, and the effects of foods, heat, cleaning compounds, sanitizers, and other substances that may contact the materials in the intended use environment. Materials used in unexposed non-food zone areas shall be exempt from all requirements in 4.

4.1 Conformance with NSF/ANSI 51

Materials shall conform to the requirements of NSF/ANSI 51 applicable to the zone in which the material is located.

⁴ American National Standards Institute, 25 West 43rd Street, New York, NY 10036 <www.ansi.org>.

⁵ ASSE International Office, P. O. Box 40362, Bay Village, OH 44140 <www.asse.org>.

⁶ American Public Health Association, 800 I Street, NW, Washington, DC 20001 <www.apha.org>.

⁷ Institute of Electrical and Electronics Engineers, Inc., 345 E. 47th Street, New York, NY 10017 <www.ieee.org>.

⁸ Underwriters Laboratories, Inc., 33 Pfingsten Road, Northbrook, IL 60062 <www.ul.com>.