VOL. 51, #31 July 31, 2020

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American National Standards

Call for comment on proposals listed

This section solicits public comments on proposed draft new American National Standards, including the national adoption of ISO and IEC standards as American National Standards, and on proposals to revise, reaffirm or withdraw approval of existing American National Standards. A draft standard is listed in this section under the ANSI-accredited standards developer (ASD) that sponsors it and from whom a copy may be obtained. Comments in connection with a draft American National Standard must be submitted in writing to the ASD no later than the last day of the comment period specified herein. Such comments shall be specific to the section(s) of the standard under review and include sufficient detail so as to enable the reader to understand the commenter's position, concerns and suggested alternative language, if appropriate. Please note that the ANSI Executive Standards Council (ExSC) has determined that an ASD has the right to require that interested parties submit public review comments electronically, in accordance with the developer's procedures.

Ordering Instructions for "Call-for-Comment" Listings

- Order from the organization indicated for the specific proposal.
- Use the full identification in your order, including the BSR prefix; for example, Electric Fuses BSR/SAE J554.
- 3. Include remittance with all orders.
- 4. BSR proposals will not be available after the deadline of call for comment.

Comments should be addressed to the organization indicated, with a copy to the Board of Standards Review, American National Standards Institute, 25 West 43rd Street, New York, NY 10036. Fax: 212-840-2298; e-mail: psa@ansi.org

Standard for consumer products

ASHRAE (American Society of Heating, Refrigerating and Air-Conditioning Engineers, Inc.)

1791 Tullie Circle, NE, Atlanta, GA 30329 p: (678) 539-1214 www.ashrae.org

Addenda

BSR/ASHRAE Addendum 55f-202x, Thermal Environmental Conditions for Human Occupancy (addenda to ANSI/ASHRAE Standard 55-2017)

This proposed addendum removes the prohibition against applying the adaptive model described in Section 5.4 for Occupant-Controlled Naturally Conditioned Spaces in spaces that have an air conditioning system installed. It preserves the prohibition against running the air conditioning to achieve conditions in the space that satisfy the adaptive model. This proposed addendum also editorially modifies Sections 7.2.2.2 and L1.1 to achieve consistent terminology. These changes are being made given supporting data from the new ASHRAE Comfort Database II. See supporting research in "Parkinson, Thomas & de Dear, Richard & Brager, Gail. (2020). Nudging the adaptive thermal comfort model. Energy and Buildings. 206. 10.1016/j.enbuild.2019.109559".

Click here to view these changes in full

Send comments (with optional copy to psa@ansi.org) to: Online Comment Database at https://www.ashrae.org/technical-resources/standards-and-guidelines/public-review-drafts

ASHRAE (American Society of Heating, Refrigerating and Air-Conditioning Engineers, Inc.)

1791 Tullie Circle, NE, Atlanta, GA 30329 p: (404) 636-8400 www.ashrae.org

Addenda

BSR/ASHRAE Addendum g to BSR/ASHRAE Standard 154-202x, Ventilation for Commercial Cooking Operations (addenda to ANSI/ASHRAE Standard 154-2016)

This addendum adds the definition of balancing damper.

Click here to view these changes in full

Send comments (with optional copy to psa@ansi.org) to: http://www.ashrae.org/standards-research--technology/public-review-drafts

ASHRAE (American Society of Heating, Refrigerating and Air-Conditioning Engineers, Inc.)

1791 Tullie Circle, NE, Atlanta, GA 30329 p: (404) 636-8400 www.ashrae.org

Addenda

BSR/ASHRAE Addendum h to BSR/ASHRAE Standard 154-202x, Ventilation for Commercial Cooking Operations (addenda to ANSI/ASHRAE Standard 154-2016)

This addendum brings consistency and coherence with IMC 2018 language. It is an energy conservation measure supported by ASHRAE 90.1 for the kitchen exhaust systems section concerning demand ventilation systems.

Click here to view these changes in full

Send comments (with optional copy to psa@ansi.org) to: http://www.ashrae.org/standards-research--technology/public-review-drafts

ASHRAE (American Society of Heating, Refrigerating and Air-Conditioning Engineers, Inc.)

1791 Tullie Circle, NE, Atlanta, GA 30329 p: (404) 636-8400 www.ashrae.org

Addenda

BSR/ASHRAE Addendum i to BSR/ASHRAE Standard 154-202x, Ventilation for Commercial Cooking Operations (addenda to ANSI/ASHRAE Standard 154-2016)

This addendum makes changes to Section 5.4, Fans. Examples of fan types in the parenthesis is not a requirement for the purpose of this section, where such examples and descriptions are detailed in the new Appendix E. The exception is removed because current codes require fan listing for the application, and this requirement is added to the script of the section.

Click here to view these changes in full

Send comments (with optional copy to psa@ansi.org) to: http://www.ashrae.org/standards-research--technology/public-review-drafts

ASHRAE (American Society of Heating, Refrigerating and Air-Conditioning Engineers, Inc.)

1791 Tullie Circle, NE, Atlanta, GA 30329 p: (404) 636-8400 www.ashrae.org

Addenda

BSR/ASHRAE Addendum j to BSR/ASHRAE Standard 154-202x, Ventilation for Commercial Cooking Operations (addenda to ANSI/ASHRAE Standard 154-2016)

Grease ducts for kitchen exhaust must be liquid-tight as per building codes (IMC, NFPA 96, UMC) and must be tested to meet this requirement. It is the position of this committee and IKECA that the Water Test should be the method of execution to be conclusive, as experience shows the alternate Light Test was not as effective to determine leak locations and carries a high level of uncertainty.

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Send comments (with optional copy to psa@ansi.org) to: http://www.ashrae.org/standards-research--technology/public-review-drafts

ASHRAE (American Society of Heating, Refrigerating and Air-Conditioning Engineers, Inc.)

1791 Tullie Circle NE, Atlanta, GA 30329 p: (678) 539-2114 www.ashrae.org

Addenda

BSR/ASHRAE/IES Addendum a to BSR/ASHRAE/IES Standard 100-202x, Energy Efficiency in Existing Buildings (addenda to ANSI/ASHRAE/IES Standard 100-2018)

This proposed addendum is to replace the existing Normative Annex L in Standard 100-2018 with a new one that is based on Section 4 of Standard 100-2018. This annex thus confirms SSPC 100's decision to base Standard 100's operations and maintenance requirements in Section 4 of Standard 180.

Click here to view these changes in full

Send comments (with optional copy to psa@ansi.org) to: Online Comment Database at https://www.ashrae.org/technical-resources/standards-and-guidelines/public-review-drafts

NENA (National Emergency Number Association)

1700 Diagonal Road, Suite 500, Alexandria, VA 22314 p: (727) 312-3230 www.nena.org

New Standard

BSR/NENA STA-011.1-202x, NENA Standards for 9-1-1 Professional Education (new standard)

This work will provide standards related to 9-1-1 professional education to aid in the development of degree programs for Public Safety Telecommunicators and individuals who work on 9-1-1 systems. This effort will ensure the 9-1-1 industry has a reliable workforce both for PSAP operations and to manage, design, construct and maintain the 9-1-1 system and its many components. This effort will also ensure that programs provide a basic level of knowledge and skill, no matter where they may be located.

Click here to view these changes in full

Send comments (with optional copy to psa@ansi.org) to: Submit comments at https://protect-us.mimecast.com/s/FBAGCo2Km2ivy2h1LwUr

NSF (NSF International)

789 N. Dixboro Road, Ann Arbor, MI 48105-9723 p: (734) 827-5643 www.nsf.org

Revision

BSR/NSF 42-202x (i106r1), Drinking Water Treatment Units - Aesthetic Effects (revision of ANSI/NSF 42-2019)

It is the purpose of this Standard to establish minimum requirements for materials, design and construction, and performance of drinking water treatment systems that are designed to reduce specific aesthetic-related (non-health effects) contaminants in public or private water supplies. This Standard also specifies the minimum product literature and labeling information that a manufacturer shall supply to authorized representatives and system owners as well as the minimum service-related obligations that the manufacturer shall extend to system owners.

Click here to view these changes in full

Send comments (with optional copy to psa@ansi.org) to: mleslie@nsf.org

NSF (NSF International)

789 N. Dixboro Road, Ann Arbor, MI 48105-9723 p: (734) 827-5643 www.nsf.org

Revision

BSR/NSF 53-202x (i124r1), Drinking Water Treatment Units - Health Effects (revision of ANSI/NSF 53-2019)

It is the purpose of this Standard to establish minimum requirements for materials, design and construction, and performance of point-of-use and point-of-entry drinking water treatment systems that are designed to reduce specific health-related contaminants in public or private water supplies. Such systems include point-of-entry drinking water treatment systems used to treat all or part of the water at the inlet to a residential facility or a bottled water production facility, and includes the material and components used in these systems. This Standard also specifies the minimum product literature and labeling information that a manufacturer shall supply to authorized representatives and system owners, as well as the minimum service-related obligations that the manufacturer shall extend to system owners.

Click here to view these changes in full

Send comments (with optional copy to psa@ansi.org) to: mleslie@nsf.org

NSF (NSF International)

789 N. Dixboro Road, Ann Arbor, MI 48105-9723 p: (734) 827-5643 www.nsf.org

Revision

BSR/NSF 55-202x (i51r1), Ultraviolet Microbiological Water Treatment Systems (revision of ANSI/NSF 55-2019)

The purpose of this Standard is to establish minimum requirements for the reduction of microorganisms using ultraviolet radiation (UV). UV water treatment systems covered by this Standard are intended for water that may be either microbiologically safe or microbiologically unsafe. This Standard also specifies the minimum product literature and labeling information that a manufacturer shall supply to authorized representatives and system owners, as well as the minimum service-related obligations that the manufacturer shall extend to system owners.

Click here to view these changes in full

Send comments (with optional copy to psa@ansi.org) to: mleslie@nsf.org

NSF (NSF International)

789 N. Dixboro Road, Ann Arbor, MI 48105-9723 p: (734) 827-5643 www.nsf.org

Revision

BSR/NSF 244-202x (i10r1), Supplemental Microbiological Water Treatment Systems - Filtration (revision of ANSI/NSF 244-2019)

The point-of-use (POU) and point-of-entry (POE) systems addressed by this Standard are designed to be used for the supplemental microbial control of specific organisms that may occasionally be present in drinking water (public or private) because of intermittent incursions. Certain of these specific organisms that may be introduced into the drinking water are considered established or potential health hazards. This Standard establishes requirements for POU and POE drinking water treatment systems, and the materials and components used in these systems.

Click here to view these changes in full

Send comments (with optional copy to psa@ansi.org) to: mleslie@nsf.org

NSF (NSF International)

789 N. Dixboro Road, Ann Arbor, MI 48105-9723 p: (734) 827-5643 www.nsf.org

Revision

BSR/NSF 401-202x (i18r1), Drinking Water Treatment Units - Emerging Compounds / Incidental Contaminants (revision of ANSI/NSF 401-2019)

The purpose of this Standard is to establish minimum requirements for materials, design and construction, and performance of drinking water treatment systems that are designed to reduce emerging compounds in public or private water supplies, such as pharmaceutical, personal care products (PPCPs), and endocrine disrupting compounds (EDCs).

Click here to view these changes in full

Send comments (with optional copy to psa@ansi.org) to: mleslie@nsf.org

UL (Underwriters Laboratories)

333 Pfingsten Road, Northbrook, IL 60062-2096 p: (847) 664-3416 https://ul.org/

Revision

BSR/UL 331-202x, Standard for Safety for Strainers for Flammable Fluids and Anhydrous Ammonia (revision of ANSI/UL 331-2013 (R2017))

The following is being proposed: (1) Revisions to 10-Day Moist Ammonia-Air Stress Cracking Test, and (2) Clarifications to the Deformation Test.

Click here to view these changes in full

Send comments (with optional copy to psa@ansi.org) to: Follow the instructions in the following website to enter comments into the CSDS Work Area: https://csds.ul.com/Home/ProposalsDefault.aspx

UL (Underwriters Laboratories)

333 Pfingsten Road, Northbrook, IL 60062-2096 p: (847) 664-3416 https://ul.org/

Revision

BSR/UL 331A-202x, Standard for Safety for Strainers for Gasoline and Gasoline/Ethanol Blends with Nominal Ethanol Concentrations Up to 85 Percent (E0 - E85) (revision of ANSI/UL 331A-2015)

The following is being proposed: (1) Revisions to 10-Day Moist Ammonia-Air Stress Cracking Test, (2) Clarifications to the Deformation Test, and (3) Revisions to add CE40a test fluid requirements.

Click here to view these changes in full

Send comments (with optional copy to psa@ansi.org) to: Follow the instructions in the following website to enter comments into the CSDS Work Area: https://csds.ul.com/Home/ProposalsDefault.aspx

UL (Underwriters Laboratories)

333 Pfingsten Road, Northbrook, IL 60062-2096 p: (847) 664-3416 https://ul.org/

Revision

BSR/UL 331B-202x, Standard for Safety for Strainers for Diesel Fuel, Biodiesel Fuel, Diesel/Biodiesel Blends with Nominal Biodiesel Concentrations up to 20 Percent (B20), Kerosene, and Fuel Oil (revision of ANSI/UL 331B-2020)

The following is being proposed: (1) Revisions to 10-Day Moist Ammonia-Air Stress Cracking Test, and (2) Clarifications to the Deformation Test.

Click here to view these changes in full

Send comments (with optional copy to psa@ansi.org) to: Follow the instructions in the following website to enter comments into the CSDS Work Area: https://csds.ul.com/Home/ProposalsDefault.aspx

UL (Underwriters Laboratories)

333 Pfingsten Road, Northbrook, IL 60062-2096 p: (847) 664-2881 https://ul.org/

Revision

BSR/UL 458-202x, Standard for Safety for Power Converters/Inverters and Power Converter/Inverter Systems for Land Vehicles and Marine Crafts (revision of ANSI/UL 458-2015)

The following changes to UL 458 are being proposed: (1) Revision to polarity color coding, (2) Revision to scope, (3) Revision to production-line test conditions, and (4) Revision to address charging lithium batteries.

Click here to view these changes in full

Send comments (with optional copy to psa@ansi.org) to: Follow the instructions in the following website to enter comments into the CSDS Work Area: https://csds.ul.com/Home/ProposalsDefault.aspx

UL (Underwriters Laboratories)

12 Laboratory Drive, Research Triangle Park, NC 27709-3995 p: (613) 368-4432 https://ul.org/

Revision

BSR/UL 827-202X, Standard for Safety for Central-Station Alarm Services (revision of ANSI/UL 827-2019)

Virtual workplace requirements.

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Send comments (with optional copy to psa@ansi.org) to: Follow the instructions in the following website to enter comments into the CSDS Work Area: https://csds.ul.com/Home/ProposalsDefault.aspx

UL (Underwriters Laboratories)

333 Pfingsten Road, Northbrook, IL 60062 p: (847) 664-1292 https://ul.org/

Revision

BSR/UL 1699-202x, Standard for Safety for Arc-Fault Circuit-Interrupters (revision of ANSI/UL 1699-2019)

This proposal for UL 1699 covers: (1) LCDI Shield Monitor Interrupter (SM/I) and (2) Clarification of definitions.

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Send comments (with optional copy to psa@ansi.org) to: Follow the instructions in the following website to enter comments into the CSDS Work Area: https://csds.ul.com/Home/ProposalsDefault.aspx

UL (Underwriters Laboratories)

12 Laboratory Drive, Research Triangle Park, NC 27709-3995 p: (919) 549-1097 https://ul.org/

Revision

BSR/UL 2416-202x, Standard for Safety for Audio/Video, Information and Communication Technology Equipment Cabinet, Enclosure and Rack Systems (revision of ANSI/UL 2416-2019)

This proposal for UL 2416 covers: (1) Additional option for enclosure venting of battery compartments, and (2) Clarification on Battery Supply Performance.

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Send comments (with optional copy to psa@ansi.org) to: Follow the instructions in the following website to enter comments into the CSDS Work Area: https://csds.ul.com/Home/ProposalsDefault.aspx

UL (Underwriters Laboratories)

333 Pfingsten Road, Northbrook, IL 60062-2096 p: (847) 664-1725 https://ul.org/

Revision

BSR/UL 6142-202x, Standard for Safety for Small Wind Turbine Systems (revision of ANSI/UL 6142-2012 (R2018))

This proposal for UL 6142 covers: (1) Removal of references to the Standard for Power Conversion Equipment, UL 508C, and replacement with reference to the Standard for Adjustable Speed Electrical Power Drive Systems - Part 5-1: Safety Requirements - Electrical, Thermal, and Energy, UL 61800-5-1.

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Send comments (with optional copy to psa@ansi.org) to: Follow the instructions in the following website to enter comments into the CSDS Work Area: https://csds.ul.com/Home/ProposalsDefault.aspx

APCO (Association of Public-Safety Communications Officials-International)

351 N. Williamson Boulevard, Daytona Beach, FL 32114 p: 571-289-7402 www.apcoIntl.org

New Standard

BSR/APCO 1.118.1-202x, Key Performance Indicators for Public Safety Communications Personnel (new standard)

This candidate standard provides ECC management with Key Performance Indicators (KPIs) as they relate to personnel performance measurements, accuracy, and quality of information logged or provided by ECC personnel. This candidate standard will identify specific areas of personnel performance, which should be measured in order to benchmark individual effectiveness.

Single copy price: Free

Obtain an electronic copy from: https://www.apcointl.org/standards/standards-call-to-action/ Send comments (with optional copy to psa@ansi.org) to: apcostandards@apcointl.org

APCO (Association of Public-Safety Communications Officials-International)

351 N. Williamson Boulevard, Daytona Beach, FL 32114 p: 571-289-7402 www.apcoIntl.org

New Standard

BSR/APCO 1.119.1-202x, Public Safety Telecommunicator Critical Incident Stress Debriefing Program (new standard)

The health and well-being of Public Safety Telecommunicators (PST) requires a program to identify key signs and symptoms of a PST in need of a Critical Incident Stress Debriefing (CISD). PSTs will soon provide help by streaming video, through photos and text messages. The visual aspect brings a whole new set of challenges to an already stressful job. To assist agencies, this candidate standard will provide the requirements for a CISD program specifically geared towards identifying and assisting PSTs.

Single copy price: Free

Obtain an electronic copy from: https://www.apcointl.org/standards/standards-call-to-action/ Send comments (with optional copy to psa@ansi.org) to: apcostandards@apcointl.org

APCO (Association of Public-Safety Communications Officials-International)

351 N. Williamson Boulevard, Daytona Beach, FL 32114 p: 571-289-7402 www.apcoIntl.org

Revision

BSR/APCO 1.112.2-202x, Best Practices for the Use of Social Media in Public Safety Communications (revision and redesignation of ANSI/APCO 1.112.1-2014)

Social media is a common form of communication used by agencies and agency employees. This candidate standard provides guidance on the use of social media (e.g., Facebook, Twitter, Instagram, etc.) for developing specific local procedures. The purpose of this candidate standard is to provide a consistent foundation for agencies to develop specific operational procedures and competencies while recognizing the need for each agency to customize specific procedures to their local environment.

Single copy price: Free

Obtain an electronic copy from: https://www.apcointl.org/standards/standards-call-to-action/ Send comments (with optional copy to psa@ansi.org) to: apcostandards@apcointl.org

ASHRAE (American Society of Heating, Refrigerating and Air-Conditioning Engineers, Inc.)

1791 Tullie Circle, NE, Atlanta, GA 30329 p: (678) 539-1214 www.ashrae.org

Addenda

BSR/ASHRAE Addendum 55e-202x, Thermal Environmental Conditions for Human Occupancy (addenda to ANSI/ASHRAE Standard 55-2017)

This proposed addendum includes a bug fix to the short-wave solar calculation method explained in Section C1 and the corresponding consequential edits to the prescriptive tables in Section 5.3.2.2.1. The previous method discounted the contribution of diffuse solar radiation by using an incorrect formula for attributing horizontal diffuse radiation. At low angles of solar altitude, this change will increase the short-wave mean radiant temperature compared to the previous version.

Single copy price: \$35.00

Obtain an electronic copy from: Free download at https://www.ashrae.org/technical-resources/standards-and-guidelines/public-review-drafts

Order from: standards.section@ashrae.org

Send comments (with optional copy to psa@ansi.org) to: Online Comment Database at https://www.ashrae.org/technical-resources/standards-and-guidelines/public-review-drafts

ASHRAE (American Society of Heating, Refrigerating and Air-Conditioning Engineers, Inc.)

1791 Tullie Circle, NE, Atlanta, GA 30329 p: (404) 636-8400 www.ashrae.org

New Standard

BSR/ASHRAE/ASPE/AWWA Standard 191P-202x, Standard for the Efficient Use of Water in Building Mechanical Systems (new standard)

ASHRAE Standard 191-202x provides baseline requirements for the design of mechanical systems that minimize the volume of water required to operate HVAC systems.

Single copy price: \$35.00

Obtain an electronic copy from: http://www.ashrae.org/standards-research--technology/public-review-drafts

Order from: standards.section@ashrae.org

Send comments (with optional copy to psa@ansi.org) to: http://www.ashrae.org/standards-research--technology/public-review-drafts

ASME (American Society of Mechanical Engineers)

Two Park Avenue, M/S 6-2B, New York, NY 10016-5990 p: (212) 591-8489 www.asme.org

Revision

BSR/ASME STS-1-202x, Steel Stacks (revision of ANSI/ASME STS-1-2017)

The Standard applies to steel stacks; i.e., those stacks where the primary supporting shell is made of steel. It outlines the consideration that must be made for both the mechanical and structural design, such as what consideration must be taken for wind- and seismic-induced vibrations. The document provides guidelines for the selection of material, linings, and coatings, and gives the requirements for lighting and lightning protection based upon existing building and federal codes. Additionally, this Standard gives the requirements for climbing and access based upon current Occupational Safety and Health Administration (OSHA) standards, emphasizes the important areas regarding fabrication and construction, and outlines areas requiring maintenance and inspection following initial operation. Although many of the topics within these guidelines may be used for all stacks, this Standard is intended to provide design guidelines for stacks containing nonflammable gases, such as combustion exhaust gases at low internal pressures.

Single copy price: Free

Obtain an electronic copy from: http://cstools.asme.org/publicreview

Send comments (with optional copy to psa@ansi.org) to: Justin Cassamassino: (212) 591-8404; cassasmassinoj@asme.org

AWS (American Welding Society)

8669 Doral Blvd, Suite 130, Doral, FL 33166 p: (305) 443-9353 310 www.aws.org

Revision

BSR/AWS D8.1M-202x, Specification for Automotive Weld Quality Resistance Spot Welding of Steel (revision of ANSI/AWS D8.1M -2013)

This specification defines quality characteristics and metrics pertinent to resistance spot welds on steels used in automotive applications. The evaluation methods and inspection criteria specified in this standard can be used to evaluate the effectiveness of particular welding equipment and procedures used to weld a particular base material combination. The criteria and metrics are the same for all welds regardless of the service load.

Single copy price: \$25.00

Obtain an electronic copy from: mdiaz@aws.org
Order from: Mario Diaz: (305) 443-9353; mdiaz@aws.org
Send comments (with optional copy to psa@ansi.org) to: Same

ECIA (Electronic Components Industry Association)

13873 Park Center Road, Suite 315, Herndon, VA 20171 p: (571) 323-0294 www.ecianow.org

Reaffirmation

BSR/EIA 364-104B-2015 (R202x), Flammability Test Procedure for Electrical Connectors (reaffirmation of ANSI/EIA 364-104B-2015)

This standard establishes a test method to determine the connector's resistance to burning when exposed to a flame. Burning resistance is defined as the ability to not support or propagate combustion after an ignition source is removed. This test evaluates the time it takes for the flame of a burning connector to extinguish after removal of the applied flame, and the possibility of the spread of burning, as caused by burning droplets and after-glow. This test does not simulate any actual service application. It is intended to test a connector by itself in a condition that can readily be duplicated in any test laboratory.

Single copy price: \$76.00

Obtain an electronic copy from: https://global.ihs.com/

Order from: Global Engineering Documents, (800) 854-7179, www.global.ihs.com

Send comments (with optional copy to psa@ansi.org) to: Ed Mikoski,emikoski@ecianow.org

ECIA (Electronic Components Industry Association)

13873 Park Center Road, Suite 315, Herndon, VA 20171 p: (571) 323-0294 www.ecianow.org

Reaffirmation

BSR/EIA 364-111A-2015 (R202x), Test Procedure for Determining the Total Ionic Contamination of an Electrical Connector or Socket Assembly or Component (reaffirmation of ANSI/EIA 364-111A-2015)

This standard establishes two methods for determining the total amount of extractable ionic contamination on the surface of an electrical connector or socket assembly or component.

Single copy price: \$82.00

Obtain an electronic copy from: https://global.ihs.com/

Order from: Global Engineering Documents, (800) 854-7179, www.global.ihs.com

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ECIA (Electronic Components Industry Association)

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Reaffirmation

BSR/EIA 364-116-2015 (R202x), Pin Contact Stability Test Procedure for Electrical Connectors (reaffirmation of ANSI/EIA 364-116-2015)

This test standard establishes a test method to determine the relative rigidity a connector insert provides a pin contact, by inserting a gauge pin into a contact cavity, and then measuring the total displacement of a reference point on the tip of the gauge pin when that gauge pin experiences a moment perpendicular to the mating axis.

Single copy price: \$76.00

Obtain an electronic copy from: https://global.ihs.com/

Order from: Global Engineering Documents, (800) 854-7179, www.global.ihs.com

Send comments (with optional copy to psa@ansi.org) to: Ed Mikoski,emikoski@ecianow.org

ECIA (Electronic Components Industry Association)

13873 Park Center Road, Suite 315, Herndon, VA 20171 p: (571) 323-0294 www.ecianow.org

Reaffirmation

BSR/EIA 364-1002A-2015 (R202x), Test Methodology for Assessing the Performance of Compliant Contact Terminations Used as Free Standing Contacts or in Electrical Connectors and Sockets (reaffirmation of ANSI/EIA 364-1002A-2015)

This standard establishes the test procedures and test sequences for evaluating compliant contact terminations. The test sequences defined In this standard shall be considered generic. Unless otherwise specified in the referencing document, this standard applies to the following types of contacts with compliant contact terminations:

- Contacts that are supplied as separate items, but may be inserted into a housing; and
- Free-standing contacts that are not used in a housing.

Single copy price: \$82.00

Obtain an electronic copy from: https://global.ihs.com/

Order from: Global Engineering Documents, (800) 854-7179, www.global.ihs.com

Send comments (with optional copy to psa@ansi.org) to: Ed Mikoski,emikoski@ecianow.org

IAPMO (ASSE Chapter) (ASSE International Chapter of IAPMO)

18927 Hickory Creek Drive, Suite 220, Mokena, IL 60448 p: (708) 995-3017 www.asse-plumbing.org

Revision

BSR/ASSE 1055-202x, Performance Requirements for Chemical Dispensers with Integral Backflow Protection (revision of ANSI/ASSE 1055-2018)

Chemical dispensing systems provide a means of mixing potable water with chemicals to provide the user with a chemical solution which is ready for use. The amount of dilution shall be fixed or adjustable. Devices covered by this standard are intended for stationary installations, mobile devices where the orientations are fixed, and hand-held devices.

Single copy price: Free

Obtain an electronic copy from: chris@asse-plumbing.org

Send comments (with optional copy to psa@ansi.org) to: chris@asse-plumbing.org

IAPMO (ASSE Chapter) (ASSE International Chapter of IAPMO)

18927 Hickory Creek Drive, Suite 220, Mokena, IL 60448 p: (708) 995-3015 www.asse-plumbing.org

Revision

BSR/ASSE Series 15000-202x, Professional Qualifications Standard for the Inspection, Testing and Maintenance of Water-Based Fire Protection Systems (revision of ANSI/ASSE Series 15000-2015)

This standard establishes a minimum knowledge and performance criteria as it applies to the qualified individual who provides inspection, testing, and maintenance for Water-Based Fire Protection Systems for compliance with installation, inspection, testing, and maintenance standards. This individual will be referred to as Technician in this standard.

Single copy price: Free

Obtain an electronic copy from: marianne.waickman@asse-plumbing.org

Order from: Marianne Waickman: (708) 995-3015; marianne.waickman@asse-plumbing.org

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IAPMO (Z) (International Association of Plumbing & Mechanical Officials)

5001 East Philadelphia Street, Ontario, CA 91761 p: (909) 230-5534 https://www.iapmostandards.org

Revision

BSR/IAPMO Z1001-202x, Prefabricated Gravity Grease Interceptors (revision of ANSI/IAPMO Z1001-2016)

This Standard covers prefabricated gravity grease interceptors made of concrete, fiber-reinforced polyester (FRP), thermoplastic, or steel and specifies requirements for design, materials, performance, testing, and markings. No technical changes were made to the text of this standard. However requirements for thermoplastic Compression Molded Septic Tanks were added to IAPMO Z1000, which is referenced in Section 7 of this standard. The cover and frontmatter were also updated.

Single copy price: \$10.00

Obtain an electronic copy from: https://iapmomembership.org/index.php?page=shop.product_details&flypage=flypage_iapmo.tpl&product_id=1554&category_id=71&keyword=Z1001&option=com_virtuemart&Itemid=3&redirected=1&Itemid=3

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NFPA FIRE PROTECTION STANDARDS DOCUMENTATION

The National Fire Protection Association announces the availability of the NFPA First Draft Reports for concurrent review and comment by NFPA and ANSI. These First Draft Reports contain the disposition of public inputs that were received for standards in the Custom ERRS Group 1 Revision Cycle (available for review on the next edition tab for each standard).

The First Draft Report is located on the respective standard's information page under the next edition tab at www.nfpa.org/doc#next (for example ww.nfpa.org/101next). In accordance with the published schedule, all Comments on standards in the Custom ERRS Group 1 Revision Cycle must be received by October 9, 2020. The disposition of all comments received from the review of the First Draft Report will be published in the Second Draft Report, and will also be available on the standard's information pages under the next edition tab.

For more information on the rules and for up-to-date information on schedules and deadlines for processing NFPA Documents, check the NFPA website (www.nfpa.org) or contact Standards Administration at NFPA. Those who submit comments to NFPA's online submission system on the Custom ERRS Group 1 Revision Cycle Standards are invited to copy ANSI's Board of Standards Review.

New Standard

BSR/NFPA 475-202x, Recommended Practice for Organizing, Managing, and Sustaining a Hazardous Materials/Weapons of Mass Destruction Response Program (new standard)

This recommended practice establishes a common set of criteria for the organization, management, and deployment of personnel, resources, and programs for those public or private entitles that are responsible for the hazardous-materials/weapons-of-mass-destruction emergency preparedness function.

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Fall Revision Cycle Standards are invited to copy ANSI's Board of Standards Review.

NFPA FIRE PROTECTION STANDARDS DOCUMENTATION

The National Fire Protection Association announces the availability of the NFPA Second Draft Report for concurrent review and comment by NFPA and ANSI. These Second Draft Reports contain the disposition of public comment that were received for standards in the 2020 Fall Revision Cycle (available for review on the next edition tab for each standard). All Notices of Intent to Make A Motion on the 2020 Fall Revision Cycle Second Draft Report must be received by the following date: **August 27, 2020.** For more information on the rules and for up-to-date information on schedules and deadlines for processing NFPA Documents, check the NFPA website (www.nfpa.org) or contact Standards Administration at NFPA. Those who submit comments to NFPA's online submission system on the 2020

Revision

BSR/NFPA 33-202x, Standard for Spray Application Using Flammable or Combustible Materials (revision of ANSI/NFPA 33-2018)

The risk to life and property because of the fire and explosion hazards of spray application of flammable and combustible materials varies depending on the arrangement and operation of the particular process and on the nature of the material being sprayed. The principal hazards addressed in this standard are those of the materials being sprayed: flammable and combustible liquids and combustible powders, as well as their vapors, mists, and dusts, and the highly combustible deposits and residues that result from their use. Properly designed, constructed, and ventilated spray areas are able to confine and control combustible residues, dusts, or deposits and to remove vapors and mists from the spray area and discharge them to a safe location, thus reducing the likelihood of fire or explosion. Likewise, accumulations of overspray residues, some of which are not only highly combustible but also subject to spontaneous ignition, can be controlled. The control of sources of ignition in spray areas and in areas where flammable and combustible liquids or powders are handled, together with constant supervision and maintenance, is essential to safe spray application operations.

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New Standard

BSR/NFPA 1891-202x, Standard on Selection, Care, and Maintenance of Hazardous Materials Clothing and Equipment (new standard)

This standard shall specify the minimum requirements for the selection, care, and maintenance of hazardous materials, CBRN, and emergency medical operations protective ensembles, ensemble elements, and HAZMAT/EMO PPE that are used for protection during hazardous materials emergencies, CBRN incidents, and emergency medical operations.

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Revision

BSR/NFPA 470-202x, Hazardous Materials Standards for Responders (revision, redesignation and consolidation of ANSI/NFPA 1072-2017, ANSI/NFPA 472-2018, and ANSI/NFPA 473-2018)

This standard provides minimum requirements for personnel responding to incidents involving hazardous materials and weapons of mass destruction (WMD).

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Revision

BSR/NFPA 1000-202x, Standard for Fire Service Professional Qualifications Accreditation and Certification Systems (revision of ANSI/NFPA 1000-2017)

This standard establishes the minimum criteria for the following: (1) Accrediting bodies; (2) Assessment and validation of the process used to certify fire and related emergency response personnel to professional qualifications standards; and (3) Nonengineering, fire-related, academic, degree-granting programs offered by institutions of higher education.

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Revision

BSR/NFPA 1033-202x, Standard for Professional Qualifications for Fire Investigator (revision of ANSI/NFPA 1033-2014)

This standard shall identify the professional level of job performance requirements for fire investigators.

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Revision

BSR/NFPA 1140-202x, Standards for Wildland Firefighting (revision, redesignation and consolidation of ANSI/NFPA 1051-2020, ANSI/NFPA 1141-2017, ANSI/NFPA 1143-2018, and ANSI/NFPA 1144-2018)

This standard provides the minimum requirements for wildland fire management and the associated professional qualifications for wildland fire positions.

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Revision

BSR/NFPA 1142-202x, Standard on Water Supplies for Suburban and Rural Fire Fighting (revision of ANSI/NFPA 1142-2017)

This standard identifies a method of determining the minimum requirements for alternative water supplies for structural fire-fighting purposes in areas where the authority having jurisdiction (AHJ) determines that adequate and reliable water supply systems for fire-fighting purposes do not otherwise exist. An adequate and reliable municipal-type water supply is one that is sufficient every day of the year to control and extinguish anticipated fires in the jurisdiction, particular building, or building group served by the water supply.

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Revision

BSR/NFPA 1145-202x, Guide for the Use of Class A Foams in Fire Fighting (revision of ANSI/NFPA 1145-2017)

This document presents information for agencies planning to use Class A foam for fire fighting and protection. It presents information on foam properties and characteristics, proportioning and discharge hardware, application techniques, and safety considerations. This document describes the use and application of Class A foams that meet the requirements of NFPA 1150. This document does not apply to the use of Class A foam in sprinkler systems or on fires involving Class B flammable or combustible liquids. See Annex B for publications that address tactical use of Class A foam. This document is not intended to discourage the use of emerging technologies and practices, provided that the recommended level of safety is not lessened.

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Revision

BSR/NFPA 1225-202x, Standards for Emergency Services Communications (revision, redesignation and consolidation of ANSI/NFPA 1061-2018 and ANSI/NFPA 1221-2019)

This standard identifies the minimum job performance requirements (JPRs) for Public Safety Telecommunications Personnel, and provides minimum requirements for the installation, maintenance, and use of emergency services communications systems.

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Revision

BSR/NFPA 1990-202x, Standards for Protective Ensembles for Hazardous Material and Emergency Medical Operations (revision, redesignation and consolidation of ANSI/NFPA 1991-2017, ANSI/NFPA 1992-2018, ANSI/NFPA 1994-2018, and ANSI/NFPA 1999-2018)

This standard shall specify the minimum design, performance, testing, documentation, and certification requirements for the following: (1) Vapor-protective ensembles for hazardous materials emergencies and CBRN terrorism incidents, (2) Liquid splash-protective ensembles and clothing for hazardous materials emergencies, (3) Protective ensembles for first responders to hazardous materials emergencies and CBRN terrorism incidents, and (4) Protective clothing and ensembles for emergency medical operations.

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Revision

BSR/NFPA 34-202x, Standard for Dipping, Coating, and Printing Processes Using Flammable or Combustible Liquids (revision of ANSI/NFPA 34-2018)

This standard shall apply to dipping, roll coating, flow coating, curtain coating, printing, cleaning, and similar processes, referred to in this standard as "coating processes" or "processes," in which articles or materials are passed through tanks, vats, or containers, or passed over rollers, drums, or other process equipment that contain flammable or combustible liquids. Where a requirement applies to a particular process, the name of that process will be stated. This standard shall also apply to cleaning processes that utilize a solvent vapor, such as vapor degreasing processes. This standard shall also apply to processes that use water-borne, water-based, and water-reducible materials that contain flammable or combustible liquids or that produce combustible deposits or residues. This standard shall not apply to processes that use only noncombustible liquids for processing and cleaning. This standard shall also not apply to processes that use only Class IIIB liquids for processing or cleaning, provided the liquids or mixtures thereof maintain their Class IIIB classification at their point of use. This standard shall not apply to processes that use a liquid that does not have a fire point when tested in accordance with ASTM D 92, ...

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Revision

BSR/NFPA 35-202x, Standard for the Manufacture of Organic Coatings (revision of ANSI/NFPA 35-2016)

This standard shall apply to facilities that use flammable and combustible liquids, as defined in this standard, to manufacture organic coatings for automotive, industrial, institutional, household, marine, printing, transportation, and other applications. This standard shall not apply to the following: (1) Operations involving the use or application of coating materials. [See NFPA 33, Standard for Spray Application Using Flammable or Combustible Materials; NFPA 34, Standard for Dipping, Coating, and Printing Processes Using Flammable or Combustible Liquids; and Chapter 18 of NFPA 30, Flammable and Combustible Liquids Code, for information on the use and application of these coatings.] and (2) Storage of organic coatings in locations other than the manufacturing facility. [See Chapters 9 through 16 of NFPA 30, Flammable and Combustible Liquids Code, for information on storage of these coatings at other locations.]

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Revision

BSR/NFPA 36-202x, Standard for Solvent Extraction Plants (revision of ANSI/NFPA 36-2017)

This standard shall apply to the commercial scale extraction processing of animal and vegetable oils and fats by the use of Class I flammable hydrocarbon liquids, referred to as "solvents" in this standard. Extraction processes that use flammable liquids but are not within the scope of NFPA 36 might be within the scope of NFPA 30, Flammable and Combustible Liquids Code, and the user is referred to that document for guidance. (See Chapter 3 for definitions of terms, including "extraction process" and "solvent.") This standard shall also apply to any equipment and buildings that are located within 30 m (100 ft) of the extraction process. This standard shall also apply to the unloading, storage, and handling of solvents, regardless of distance from the extraction process. This standard shall also apply to the means by which material to be extracted is conveyed from the preparation process to the extraction process. This standard shall also apply to the means by which extracted desolventized solids and oils are conveyed from the extraction process. This standard shall also apply to preparation and meal finishing processes that are connected by conveyor to the extraction process, regardless of intervening ...

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Revision

BSR/NFPA 53-202x, Recommended Practice on Materials, Equipment, and Systems Used in Oxygen-Enriched Atmospheres (revision of ANSI/NFPA 53-2016)

This document establishes recommended minimum criteria for the safe use of oxygen (liquid/gaseous) and the design of systems for use in oxygen and oxygen-enriched atmospheres (OEAs).

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Revision

BSR/NFPA 79-202x, Electrical Standard for Industrial Machinery (revision of ANSI/NFPA 79-2018)

In this standard, the term "electrical" includes both electrical and electronic equipment. Requirements that apply only to electronic equipment are so identified. The general terms "machine" and "machinery" as used throughout this standard mean industrial machinery. See Annex C for examples of industrial machines covered by this standard. The publications referenced throughout Annex A are listed in Annex J with their appropriate dates of issue. The provisions of this standard shall apply to the electrical/electronic equipment, apparatus, or systems of industrial machines operating from a nominal voltage of 600 volts or less, and commencing at the point of connection of the supply to the electrical equipment of the machine. This standard does not include the additional requirements for machines intended for use in hazardous (classified) locations. For additional requirements for machines intended to be used in hazardous (classified) areas, see NFPA 70, Article 500.

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Revision

BSR/NFPA 102-202x, Standard for Grandstands, Folding and Telescopic Seating, Tents, and Membrane Structures (revision of ANSI/NFPA 102-2016)

This standard addresses the following: (1) The construction, location, protection, and maintenance of grandstands and bleachers, folding and telescopic seating, tents, and membrane structures, and (2) Seating facilities located in the open air or within enclosed or semi-enclosed structures such as tents, membrane structures, and stadium complexes.

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Revision

BSR/NFPA 170-202x, Standard for Fire Safety and Emergency Symbols (revision of ANSI/NFPA 170-2018)

This standard presents symbols used for fire safety, emergency, and associated hazards.

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Revision

BSR/NFPA 204-202x, Standard for Smoke and Heat Venting (revision of ANSI/NFPA 204-2018)

This standard shall apply to the design of venting systems for the emergency venting of products of combustion from fires in buildings. The provisions of Chapters 4 through 10 shall apply to the design of venting systems for the emergency venting of products of combustion from fires in nonsprinklered, single-story buildings using both hand calculations and computer-based solution methods as provided in Chapter 9. Chapter 11 shall apply to venting in sprinklered buildings. This standard incorporates engineering equations (hand calculations) and references models to provide a designer with the tools to develop vent system designs. The designs are based on selected design objectives, stated in 4.4.1, related to specific building and occupancy conditions. Engineering equations are included for calculating vent flows, smoke layer depths, and smoke layer temperatures, based on a prescribed burning rate. Examples using the hand calculations and the LAVENT (Link-Actuated VENTs) computer model are presented in Annex D. Previous editions of this document have included tables listing vent areas based on preselected design objectives. These tables were based on the hot upper layer at 20 percent of the ceiling height. Different layer depths were accommodated by using a multiplication factor.

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Revision

BSR/NFPA 214-202x, Standard on Water-Cooling Towers (revision of ANSI/NFPA 214-2016)

This standard applies to fire protection for field-erected and factory-assembled water-cooling towers of combustible construction or those in which the fill is of combustible material. This standard does not apply any more or less strictly to factory-assembled units than did earlier revisions. Because these units have typically been steel frame/structure with PVC fill, the protection requirements should be evaluated in accordance with Section 4.2, with item (2) being specifically noted. In all cases, Section 4.2 should be reviewed for making the determination with regard to the installation of fire suppression systems. In some cases, no fire suppression is required. The fire record of water-cooling towers indicates a failure to recognize the extent or seriousness of the potential fire hazard of these structures either while in operation or when temporarily shut down. Water-cooling towers of combustible construction, especially those of the induced-draft type, present a potential fire hazard even when in full operation because of the existence of relatively dry areas within the towers. A significant percentage of fires in water-cooling towers of combustible construction are caused by ignition from outside sources such as incinerators, smokestacks, or exposure fires.

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Revision

BSR/NFPA 318-202x, Standard for the Protection of Semiconductor Fabrication Facilities (revision of ANSI/NFPA 318-2018)

This standard applies to semiconductor fabrication facilities and comparable fabrication processes, including research and development areas in which hazardous chemicals are used, stored, and handled and containing what is defined in this standard as a cleanroom or clean zone, or both.

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Revision

BSR/NFPA 418-202x, Standard for Heliports (revision of ANSI/NFPA 418-2016)

This standard specifies the minimum requirements for fire protection for heliports and rooftop hangars. This standard does not apply to ground-level helicopter hangars. All hangars not covered by this standard are required to comply with NFPA 409, Standard on Aircraft Hangars. Temporary landing sites and emergency evacuation facilities are outside the scope of this standard.

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Revision

BSR/NFPA 450-202x, Guide for Emergency Medical Services and Systems (revision of ANSI/NFPA 450-2017)

This document is designed to assist individuals, agencies, organizations, or systems as well as those interested or involved in emergency medical services (EMS) system design.

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Revision

BSR/NFPA 520-202x, Standard on Subterranean Spaces (revision of ANSI/NFPA 520-2016)

This standard's primary focus is to safeguard life and property against fire and related hazards. Other safety concerns such as structural adequacy, plumbing, and mechanical system design, including environmental conditions, are beyond the scope of this standard. These issues are considered important, and additional requirements are expected to be enforced by the authority having jurisdiction. Where no authority having jurisdiction exists, the owner or operator should include due consideration of these items. This standard addresses the safeguarding of life and property against fire, explosion, and related hazards associated with developed subterranean spaces. This standard does not cover the following types of subterranean spaces: (1) Tourist caverns, (2) Wine storage caverns, (3) Gas and oil storage reservoirs, (4) Hazardous waste repositories, (5) Utility installations such as pump stations, (6) Working mines, (7) Transportation and pedestrian tunnels, (8) Aboveground buildings with belowground stories, and (9) Cut and cover underground structures specifically addressed in the building code.

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Revision

BSR/NFPA 555-202x, Guide on Methods for Evaluating Potential for Room Flashover (revision of ANSI/NFPA 555-2017)

This guide addresses methods for evaluating the potential for room flashover from fire involving the contents, furnishings, and interior finish of a room. The methods addressed by this guide include prevention of ignition; installation of automatic fire suppression systems; control of ventilation factors; and limitation of the heat-release rate of individual and grouped room contents, furnishings, and interior finish. The accuracy, precision, and relevance of this guide are a function of the accuracy, precision, and relevance of the data from the test methods and calculations used. The principles and concepts presented are among the most reliable available. The use of these techniques can help to minimize the probability of flashover or delay its occurrence, but might not prevent it.

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Revision

BSR/NFPA 901-202x, Standard Classifications for Incident Reporting and Fire Protection Data (revision of ANSI/NFPA 901-2016)

This document describes and defines data elements and classifications used by many fire departments in the United States and other countries to describe fire damage potential and experience during incidents. It does not provide guidelines for a reporting system or related forms.

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Revision

BSR/NFPA 909-202x, Code for the Protection of Cultural Resource Properties - Museums, Libraries, and Places of Worship (revision of ANSI/NFPA 909-2017)

This code describes principles and practices of protection for cultural resource properties (including, but not limited to, museums, libraries, and places of worship), their contents, and collections, against conditions or physical situations with the potential to cause damage or loss. This code covers ongoing operations and rehabilitation and acknowledges the need to preserve culturally significant and character-defining building features and sensitive, often irreplaceable, collections and to provide continuity of operations. Principles and practices for life safety in cultural resource properties are outside the scope of this code. Where this code includes provisions for maintaining means of egress and controlling occupant load, it is to facilitate the evacuation of items of cultural significance, allow access for damage limitation teams in an emergency, and prevent damage to collections through overcrowding or as an unintended consequence of an emergency evacuation. Cultural resource properties should comply with the provisions of NFPA 101, Life Safety Code. Library and museum collections that are privately owned and not open to the public shall not be required to meet the requirements of this code.

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Revision

BSR/NFPA 1037-202x, Standard on Fire Marshal Professional Qualifications (revision of ANSI/NFPA 1037-2016)

This standard identifies the professional level of performance required for Fire Marshal, specifically identifying the minimum job performance requirements (JPRs) necessary to perform as a Fire Marshal. In developing this standard, the technical committee considered the various roles and duties of local, county, state, federal, provincial, and private-sector Fire Marshals. The committee was also aware that many times the Fire Marshal is the only person in the organization and can be performing the specific requirements held by others in larger organizations. In those cases, it is the intent of the technical committee that they also comply with the appropriate professional qualifications standards, such as NFPA 1021, NFPA 1031, NFPA 1033, and NFPA 1035, and at the appropriate levels. It is also the understanding of the committee that not all Fire Marshals perform all of the duties listed in the document, and therefore certain portions of the document could or could not be applicable. It is incumbent upon the management of the organization establishing the Fire Marshal or equivalent title to identify the responsibilities, duties, and expectations of the position. It is recognized that some duties performed by Fire Marshals, such as law enforcement functions, are...

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OPEI (Outdoor Power Equipment Institute)

1605 King Street, Alexandria, VA 22314 p: (703) 549-7600 www.opei.org

Revision

BSR/OPEI B175.1-202x, (Standard) for Outdoor Power Euipment - Internal Combustion Engine-Powered Hand-Held Chain Saws - Safety and Environmental Requirements (revision of ANSI/OPEI B175.1-2012)

The requirements of the standard apply to internal combustion engine-powered hand-held chain saws and replacement saw chains for use primarily in cutting wood. The purpose of this standard is to establish safety and environmental requirements for internal combustion engine-powered hand-held chain saws and replacement saw chains.

Single copy price: Free of charge

Obtain an electronic copy from: gknott@opei.org Order from: Greg Knott, gknott@opei.org

Send comments (with optional copy to psa@ansi.org) to: Greg Knott, gknott@opei.org

TIA (Telecommunications Industry Association)

1320 North Courthouse Road, Suite 200, Arlington, VA 22201 p: (703) 907-7706 www.tiaonline.org

New Standard

BSR/TIA 604-19-202x, FOCIS 19 - Fiber Optic Connector Intermateability Standard - Type: CS Connector (new standard)

The project will create a new Fiber Optic Connector Interface Standard (FOCIS) FOCIS-19 standard for a duplexed 2 ceramic ferrule connector to take advantage of increased density needed in data centers and central offices. The commercial name of the connector is the CS connector.

Single copy price: \$101.00

Obtain an electronic copy from: standards@tiaonline.org

Order from: TIA, standards@tiaonline.org

Send comments (with optional copy to psa@ansi.org) to: standards@tiaonline.org

UL (Underwriters Laboratories)

333 Pfingsten Road, Northbrook, IL 60062-2096 p: (847) 664-3038 https://ul.org/

New Standard

BSR/UL 2557-202X, Standard for Membrane Switches (new standard)

This standard covers membrane switches actuated by human activity, via a membrane or sensing substrate, to operate or control appliances and electrical equipment. The membrane switch electrical rating not to exceed 30 Vrms and power not greater than 100 VA.

Single copy price: Free

Obtain an electronic copy from: https://csds.ul.com/Home/ProposalsDefault.aspx

Order from: http://www.shopulstandards.com

Send comments (with optional copy to psa@ansi.org) to: Follow the instructions in the following website to enter comments into

the CSDS Work Area: https://csds.ul.com/Home/ProposalsDefault.aspx

UL (Underwriters Laboratories)

12 Laboratory Drive, Research Triangle Park, NC 27709-3995 p: (919) 549-0973 https://ul.org/

Revision

BSR/UL 1123-202X, Standard for Marine Buoyant Devices (revision of ANSI/UL 1123-2017)

UL proposes the following revisions to UL 1123: Removal of Hinging Requirements and Revisions to Marking and Labeling.

Single copy price: Free

Obtain an electronic copy from: https://csds.ul.com/Home/ProposalsDefault.aspx

Order from: http://www.shopulstandards.com

Send comments (with optional copy to psa@ansi.org) to: Follow the instructions in the following website to enter comments into the CSDS Work Area: https://csds.ul.com/Home/ProposalsDefault.aspx

NASBLA (National Association of State Boating Law Administrators)

1648 McGrathiana Parkway, Suite 360, Lexington, KY 40511 p: (859) 225-9487 www.nasbla.org

New Standard

Reaffirmations and withdrawals available electronically may be accessed at: webstore.ansi.org

BSR/NASBLA 100-202x, Basic Boating Knowledge - Core (new standard)

This standard establishes the essential knowledge needed to reduce recreational boating risk factors and mitigate their effects. This "Core" standard is designed to be combined with discipline-specific power, sail, and/or human-propelled "Plus" standards for development of basic boating education courses and student assessment. This standard applies to basic boating knowledge for all disciplines (power, sail, or human-propelled) of recreational boating in the U.S. states, territories, and the District of Columbia.

Single copy price: Free

Obtain an electronic copy from: https://esp.nasbla.org/esp/

Order from: pam@nasbla.org

Send comments (with optional copy to psa@ansi.org) to: https://esp.nasbla.org/esp/

NASBLA (National Association of State Boating Law Administrators)

1648 McGrathiana Parkway, Suite 360, Lexington, KY 40511 p: (859) 225-9487 www.nasbla.org

Revision

Reaffirmations and withdrawals available electronically may be accessed at: webstore.ansi.org

BSR/NASBLA 101-202x, Basic Boating Knowledge - Plus Human-Propelled (revision of ANSI/NASBLA 101-2017)

This discipline-specific "Plus" standard, when combined with the "Basic Boating Knowledge - Core" standard, establishes minimum essential knowledge to reduce human-propelled recreational boating risk factors. The combined standards are to be used for development of basic boating education courses and student assessment for human-propelled vessels. This standard applies to basic knowledge for human-propelled recreational boating in the U.S. states, territories, and the District of Columbia.

Single copy price: Free

Obtain an electronic copy from: https://esp.nasbla.org/esp/

Order from: pam@nasbla.org

Send comments (with optional copy to psa@ansi.org) to: https://esp.nasbla.org/esp/

NASBLA (National Association of State Boating Law Administrators)

1648 McGrathiana Parkway, Suite 360, Lexington, KY 40511 p: (859) 225-9487 www.nasbla.org

Revision

Reaffirmations and withdrawals available electronically may be accessed at: webstore.ansi.org

BSR/NASBLA 102-202x, Basic Boating Knowledge - Plus Sailing (revision of ANSI/NASBLA 102-2017)

This discipline-specific "Plus" standard, when combined with the "Basic Boating Knowledge - Core" standard, establishes minimum essential knowledge to reduce recreational sailing risk factors. The combined standards are to be used for development of basic boating education courses and student assessment for sailing vessels. This standard applies to basic knowledge for recreational sailboating in the U.S. states, territories, and the District of Columbia.

Single copy price: Free

Obtain an electronic copy from: https://esp.nasbla.org/esp/

Order from: pam@nasbla.org

Send comments (with optional copy to psa@ansi.org) to: https://esp.nasbla.org/esp/

NASBLA (National Association of State Boating Law Administrators)

1648 McGrathiana Parkway, Suite 360, Lexington, KY 40511 p: (859) 225-9487 www.nasbla.org

Revision

Reaffirmations and withdrawals available electronically may be accessed at: webstore.ansi.org

BSR/NASBLA 103.1-202x, Supplement - Basic Boating Knowledge - Plus Water-Jet Propelled (revision of ANSI/NASBLA 103.1-2018)

This discipline-specific supplement standard, when combined with the "Basic Boating Knowledge - Core" and "Basic Boating Knowledge - Plus Power" standards, establishes minimum essential knowledge to reduce recreational risk factors for water-jet-propelled boat operation. The combined standards are to be used for development of basic boating education courses and student assessment for water-jet-propelled powerboats. This standard applies to basic water-jet-propelled boating knowledge in the U.S. states, territories, and the District of Columbia.

Single copy price: Free

Obtain an electronic copy from: https://esp.nasbla.org/esp/

Order from: pam@nasbla.org

Send comments (with optional copy to psa@ansi.org) to: https://esp.nasbla.org/esp/

NASBLA (National Association of State Boating Law Administrators)

1648 McGrathiana Parkway, Suite 360, Lexington, KY 40511 p: (859) 225-9487 www.nasbla.org

Revision

Reaffirmations and withdrawals available electronically may be accessed at: webstore.ansi.org

BSR/NASBLA 103-202x, Basic Boating Knowledge - Plus Power (revision of ANSI/NASBLA 103-2016)

This discipline-specific "Plus" standard, when combined with the "Basic Boating Knowledge – Core" standard, establishes minimum essential knowledge to reduce recreational powerboating risk factors. The combined standards are to be used for development of basic boating education courses and student assessment for power driven vessels. This standard applies to basic knowledge for recreational powerboating in the U.S. states, territories, and the District of Columbia.

Single copy price: Free

Obtain an electronic copy from: https://esp.nasbla.org/esp/

Order from: pam@nasbla.org

Send comments (with optional copy to psa@ansi.org) to: https://esp.nasbla.org/esp/

UL (Underwriters Laboratories)

12 Laboratory Drive, Research Triangle Park, NC 27709-3995 p: (919) 549-0973 https://ul.org/

New National Adoption

Reaffirmations and withdrawals available electronically may be accessed at: webstore.ansi.org

BSR/UL 12402-5-202X, Standard for Personal Flotation Devices - Part 5: Buoyancy Aids (Level 50) - Safety Requirements (national adoption of ISO 12402-5 with modifications and revision of ANSI/UL 12402-5-2019)

UL proposes the following changes to UL 12402-5: Addition of T-tab construction specifications, 5-percent buoyancy retention, infant requirements, pocket requirements for buoyancy aids, update definition of whitewater icon, and various revisions to UL 12402-5, Section 6.

Single copy price: Free

Obtain an electronic copy from: https://csds.ul.com/Home/ProposalsDefault.aspx

Order from: http://www.shopulstandards.com

Send comments (with optional copy to psa@ansi.org) to: Follow the instructions in the following website to enter comments into the CSDS Work Area: https://csds.ul.com/Home/ProposalsDefault.aspx

UL (Underwriters Laboratories)

333 Pfingsten Road, Northbrook, IL 60062-2096 p: (847) 664-3038 https://ul.org/

Revision

Reaffirmations and withdrawals available electronically may be accessed at: webstore.ansi.org

BSR/UL 793-202X, Standard for Automatically Operated Roof Vents for Smoke and Heat (revision of ANSI/UL 793-2017)

Proposing the fourth edition of UL 793 as an ANSI/CAN standard. Included in this proposal are changes to (a) add Canadian references to UL 793, and (b) add Appendix A which covers French translations.

Single copy price: Free

Obtain an electronic copy from: https://csds.ul.com/Home/ProposalsDefault.aspx

Order from: http://www.shopulstandards.com

Send comments (with optional copy to psa@ansi.org) to: Follow the instructions in the following website to enter comments into

the CSDS Work Area: https://csds.ul.com/Home/ProposalsDefault.aspx

Technical Reports Registered with ANSI

Technical Reports Registered with ANSI are not consensus documents. Rather, all material contained in Technical Reports Registered with ANSI is informational in nature. Technical reports may include, for example, reports of technical research, tutorials, factual data obtained from a survey carried out among standards developers and/or national bodies, or information on the "state of the art" in relation to standards of national or international bodies on a particular subject.

Immediately following the end of a 30-day announcement period in Standards Action, the Technical Report will be registered by ANSI. Please submit any comments regarding this registration to the organization indicated, with a copy to the PSA Center, American National Standards Institute, 25 West 43rd Street, New York, NY 10036 or E-Mail to psa@ansi.org.

ASSP (Safety) (American Society of Safety Professionals)

520 N. Northwest Hwy, Park Ridge, IL 60068 p: (847) 768-3475 www.assp.org

ASSP TR 31010-2020, Technical Report: Risk Management - Techniques for Safety Practitioners (technical report)

The purpose of this technical report is to assist practitioners, decision makers and stakeholders in the management of risk and the application of risk management and assessment techniques that reduce uncertainty and risk and enable an organization to achieve its objectives.

Single copy price: \$110.00

Order from: LBauerschmidt@assp.org

Project Withdrawn

In accordance with clause 4.2.1.3.3 Discontinuance of a standards project of the ANSI Essential Requirements, an accredited standards developer may abandon the processing of a proposed new or revised American National Standard or portion thereof if it has followed its accredited procedures. The following projects have been withdrawn accordingly:

ANS (American Nuclear Society)

555 North Kensington Avenue, La Grange Park, IL 60526-5592 p: (708) 579-8269 www.ans.org

BSR/ANS 2.16-200x, Criteria for Modeling Design - Basis Accidental Releases from Nuclear Facilities (new standard)

Inquiries may be directed to Patricia Schroeder: (708) 579-8269; pschroeder@ans.org

ANS (American Nuclear Society)

555 North Kensington Avenue, La Grange Park, IL 60526-5592 p: (708) 579-8269 www.ans.org

BSR/ANS 3.8.10-200x, Criteria for Modeling Real-Time Accidental Release Consequences at Nuclear Facilities (new standard)

Inquiries may be directed to Patricia Schroeder: (708) 579-8269; pschroeder@ans.org

Project Withdrawn

CTA (Consumer Technology Association)

1919 South Eads Street, Arlington, VA 22202 p: (703) 907-7697 www.cta.tech

BSR/CTA 2070-202x, Considerations for Viewer Quality Experience of Augmented and Mixed Reality Systems (new standard)

Inquiries may be directed to Veronica Lancaster: (703) 907-7697; vlancaster@cta.tech

CTA (Consumer Technology Association)

1919 South Eads Street, Arlington, VA 22202 p: (703) 907-7697 www.cta.tech

BSR/CTA 2071-202x, Considerations for Viewer Quality Experience of Virtual Reality Systems (new standard)

Inquiries may be directed to Veronica Lancaster: (703) 907-7697; vlancaster@cta.tech

VC (ASC Z80) (The Vision Council)

225 Reinekers Lane, Alexandria, VA 22314 p: 585-387-9913 www.z80asc.com

BSR Z80.24-202x, Information Interchange for Ophthalmic Optical Equipment (revision of ANSI Z80.24-2007 (R2017))

Inquiries may be directed to Michele Stolberg: 585-387-9913; ascz80@thevisioncouncil.org

Notice of Withdrawn ANS by an ANSI-Accredited Standards Developer

In accordance with clause 4.2.1.3.2 Withdrawal by ANSI-Accredited Standards Developer of the ANSI Essential Requirements, the following American National Standards have been withdrawn as an ANS.

VC (ASC Z80) (The Vision Council)

225 Reinekers Lane, Alexandria, VA 22314 p: 585-387-9913 www.z80asc.com

ANSI Z80.24-2007 (R2017), Information Interchange for Ophthalmic Optical Equipment

Questions may be directed to: Michele Stolberg: 585-387-9913; ascz80@thevisioncouncil.org

Correction

Error in Call-for-Comment Listing

BSR/NSF 350-202x (i56r2)

The July 24, 2020 Standards Action Public Review notice for BSR/NSF 350-202x (i56r2) had an error in the ballot, so the ballot was withdrawn, the language was corrected, and the ballot was designated r3 (and will be submitted for a second public review) in the August 14, 2020 Standards Action.

Call for Members (ANS Consensus Bodies)

Directly and materially affected parties who are interested in participating as a member of an ANS consensus body for the standards listed below are requested to contact the sponsoring standards developer directly and in a timely manner.

DirectTrust (DirectTrust.org, Inc.)

Contact: Natasha Kreisle P.O. Box 2885 Blairsville, GA 30514 p: (404) 452-4962

e: Natasha.Kreisle@DirectTrust.org;

standards@directtrust.org

BSR/DS202003V01-202x, Implementation Guide for Encounter and Event Notifications via Direct Secure Messaging (new standard)

DirectTrust Standards seeks to convene a consensus body to develop an implementation guide for actors in the healthcare ecosystem who will use the Direct Standard™ for the communication of various transactions in support of Encounter and Event Notifications. Stakeholders include providers of Direct exchange services; users of Direct exchange services; healthcare providers or provider organizations; governmental agencies; non-profit organizations; patients or consumer advocates; general interest. If you are interested in participating, please contact DirectTrust Standards at standards@directtrust.org.

ECIA (Electronic Components Industry Association)

Contact: Laura Donohoe

13873 Park Center Road, Suite 315

Herndon, VA 20171 p: (571) 323-0294

e: Idonohoe@ecianow.org

BSR/EIA 364-104B-2015 (R202x), Flammability Test Procedure for Electrical Connectors (reaffirmation of ANSI/EIA 364-104B -2015)

BSR/EIA 364-111A-2015 (R202x), Test Procedure for Determining the Total Ionic Contamination of an Electrical Connector or Socket Assembly or Component (reaffirmation of ANSI/EIA 364-111A-2015)

BSR/EIA 364-116-2015 (R202x), Pin Contact Stability Test Procedure for Electrical Connectors (reaffirmation of ANSI/EIA 364-116-2015) BSR/EIA 364-1002A-2015 (R202x), Test Methodology for Assessing the Performance of Compliant Contact Terminations Used as Free Standing Contacts or in Electrical Connectors and Sockets (reaffirmation of ANSI/EIA 364-1002A -2015)

FCI (Fluid Controls Institute)

Contact: Leslie Schraff

1300 Sumner Avenue Cleveland, OH 44115 p: (216) 241-7333

e: fci@fluidcontrolsinstitute.org

BSR/FCI 70-3-2016 (R202x), Regulator Seat Leakage (reaffirmation of ANSI/FCI 70-3-2016)

MTConnect (MTConnect Institute)

Contact: Russell Waddell

7901 Jones Branch Drive, Suite 900

McLean, VA 22102 p: (571) 318-7522

e: rwaddell@amtonline.org

BSR/MTC1.5-202x, MTConnect Standard Version 1.5.0 (revision and redesignation of ANSI/MTC1.4-2018)

NASBLA (National Association of State Boating Law Administrators)

Contact: Pamela Dillon

1648 McGrathiana Parkway, Suite 360

Lexington, KY 40511 p: (859) 225-9487 e: pam@nasbla.org

BSR/NASBLA 100-202x, Basic Boating Knowledge - Core (new standard)

BSR/NASBLA 101-202x, Basic Boating Knowledge - Plus Human-Propelled (revision of ANSI/NASBLA 101-2017)

BSR/NASBLA 102-202x, Basic Boating Knowledge - Plus Sailing (revision of ANSI/NASBLA 102-2017)

Call for Members (ANS Consensus Bodies)

Directly and materially affected parties who are interested in participating as a member of an ANS consensus body for the standards listed below are requested to contact the sponsoring standards developer directly and in a timely manner.

BSR/NASBLA 103.1-202x , Supplement - Basic Boating Knowledge - Plus Water-Jet Propelled (revision of ANSI/NASBLA 103.1-2018)

BSR/NASBLA 103-202x, Basic Boating Knowledge - Plus Power (revision of ANSI/NASBLA 103-2016)

NEMA (ASC C136) (National Electrical Manufacturers Association)

Contact: David Richmond

1300 North 17th Street, Suite 900

Rosslyn, VA 22209 p: (703) 841-3234

e: David.Richmond@nema.org

BSR C136.47-202X, Steel Roadway and Area Lighting Poles

(revision of ANSI C136.47-2010 (R2015))

NSF (NSF International)

Contact: Monica Leslie

789 N. Dixboro Road Ann Arbor, MI 48105-9723

p: (734) 827-5643 e: mleslie@nsf.org

BSR/NSF 42-202x (i106r1), Drinking Water Treatment Units - Aesthetic Effects (revision of ANSI/NSF 42-2019)

BSR/NSF 53-202x (i124r1), Drinking Water Treatment Units - Health Effects (revision of ANSI/NSF 53-2019)

BSR/NSF 55-202x (i51r1), Ultraviolet Microbiological Water Treatment Systems (revision of ANSI/NSF 55-2019)

BSR/NSF 244-202x (i10r1), Supplemental Microbiological Water Treatment Systems - Filtration (revision of ANSI/NSF 244 -2019)

BSR/NSF 401-202x (i18r1), Drinking Water Treatment Units - Emerging Compounds/Incidental Contaminants (revision of ANSI/NSF 401-2019)

TIA (Telecommunications Industry Association)

Contact: Teesha Jenkins

1320 North Courthouse Road, Suite 200

Arlington, VA 22201 p: (703) 907-7706

e: standards@tiaonline.org

BSR/TIA 604-19-202x, FOCIS 19 - Fiber Optic Connector Intermateability Standard - Type: CS Connector (new standard)

UL (Underwriters Laboratories)

Contact: Susan Malohn
333 Pfingsten Road

Northbrook, IL 60062-2096

p: (847) 664-1725

e: Susan.P.Malohn@ul.org

BSR/UL 6142-202x, Standard for Safety for Small Wind Turbine

Systems (revision of ANSI/UL 6142-2012 (R2018))

Call for Members (ANS Consensus Bodies)

Call for Committee Members

ASC O1 – Safety Requirements for Woodworking Machinery

Are you interested in contributing to the development and maintenance of valuable industry safety standards? The ASC O1 is currently looking for members in the following categories:

- o General Interest
- o Government
- o Producer
- o User

If you are interested in joining the ASC O1, contact WMMA Associate Director Jennifer Miller at jennifer@wmma.org.

Final Actions on American National Standards

The standards actions listed below have been approved by the ANSI Board of Standards Review (BSR) or by an ANSI-Audited Designator, as applicable.

AAMI (Association for the Advancement of Medical Instrumentation)

New National Adoption

ANSI/AAMI/IEC 60601-2-16-2018, Medical electrical equipment - Part 2-16: Particular requirements for basic safety and essential performance of haemodialysis, haemodiafiltration and haemofiltration equipment (identical national adoption of IEC 60601-2-16-2018 and revision of ANSI/AAMI/IEC 60601-2-16:2012): 7/23/2020

ANSI/AAMI/IEC 60601-2-39-2018, Medical electrical equipment - Part 2-39: Particular requirements for basic safety and essential performance of peritoneal dialysis equipment (identical national adoption of IEC 60601-2 -39:2018): 7/23/2020

ANS (American Nuclear Society)

Reaffirmation

ANSI/ANS 58.9-2002 (R2020), Single Failure Criteria for Light Water Reactor Safety-Related Fluid Systems (reaffirmation of ANSI/ANS 58.9-2002 (R2015)): 7/23/2020

ANSI/ANS 59.51-1997 (R2020), Fuel Oil Systems for Safety-Related Emergency Diesel Generators (reaffirmation of ANSI/ANS 59.51-1997 (R2015)): 7/27/2020

ANSI/ANS 59.52-1998 (R2020), Lubricating Oil Systems for Safety-Related Emergency Diesel Generators (reaffirmation of ANSI/ANS 59.52-1998 (R2015)): 7/24/2020

Revision

ANSI/ANS 18.1-2020, Radioactive Source Term for Normal Operation of Light Water Reactors (revision of ANSI/ANS 18.1-2016): 7/24/2020

ASME (American Society of Mechanical Engineers)

Revision

ANSI/ASME B16.1-2020, Gray Iron Pipe Flanges and Flanged Fittings - Classes 25, 125, and 250 (revision of ANSI/ASME B16.1-2015): 7/24/2020

ASSP (ASC A10) (American Society of Safety Professionals)

New Standard

ANSI/ASSP A10.30-2020, Safety Requirements for the Installation of Anchors and Micropiles (new standard): 7/22/2020

AWC (American Wood Council)

Revision

ANSI/AWC SDPWS-2021, Special Design Provisions for Wind and Seismic (revision and redesignation of ANSI/AWC SDPWS-2015): 7/22/2020

ECIA (Electronic Components Industry Association)

Reaffirmation

ANSI/EIA 364-47A-2008 (R2020), Conductor Unwrap (Solderless Wrapped Connection) Test Procedure for Electrical Connectors (reaffirmation of ANSI/EIA 364-47A-2008 (R2015)): 7/23/2020

ANSI/EIA 364-68A-2008 (R2020), Actuating Mechanism Test Procedure for Electrical Connectors (reaffirmation of ANSI/EIA 364-68A-2008 (R2015)): 7/23/2020

ANSI/EIA 364-69A-2002 (R2020), Low Level Induction Measurement for Electrical Contacts of Electrical Connectors (reaffirmation of ANSI/EIA 364 -69A-2002 (R2015)): 7/23/2020

ANSI/EIA 364-79-2014 (R2020), Insert Bond Strength Test Procedure for Electrical Connectors (reaffirmation of ANSI/EIA 364-79-2014 (R2015)): 7/23/2020

ANSI/EIA 364-85-2014 (R2020), General Test Procedure for Assessing Wear and Mechanical Damage Testing of Contact Finishes for Electrical Connectors (reaffirmation of ANSI/EIA 364-85-2014 (R2015)): 7/23/2020

ANSI/EIA 364-93-2009 (R2020), Repeated Wire Connection and Disconnection Test Procedure for Insulation Displacement Contacts (IDC) for Electrical Connectors (reaffirmation of ANSI/EIA 364-93-2009 (R2015)): 7/23/2020

ANSI/EIA 364-94-2009 (R2020), Transverse Extraction Force Test Procedure for Insulation Displacement Contacts (IDC) for Electrical Connectors (reaffirmation of ANSI/EIA 364-94-2009 (R2015)): 7/23/2020

ANSI/EIA 364-97-1997 (R2020), Housing Panel Retention Test Procedure for Electrical Connectors (reaffirmation of ANSI/EIA 364-97-1997 (R2015)): 7/23/2020

ANSI/EIA 364-98-2009 (R2020), Housing Locking Mechanism Strength Test Procedure for Electrical Connectors (reaffirmation of ANSI/EIA 364-98 -2009 (R2015)): 7/23/2020

HL7 (Health Level Seven)

Reaffirmation

ANSI/HL7 V3 RPS, R2-2015 (R2020), HL7 Version 3 Standard: Regulated Product Submission, Release 2 (reaffirmation of ANSI/HL7 V3 RPS, R2 -2015): 7/27/2020

IAPMO (ASSE Chapter) (ASSE International Chapter of IAPMO)

New Standard

ANSI/ASSE 1072-2020, Performance Requirements for Barrier Type Trap Seal Protection for Floor Drains (new standard): 7/23/2020

IAPMO (Z) (International Association of Plumbing & Mechanical Officials)

Reaffirmation

ANSI/ASPE/IAPMO Z1034-2015 (R2020), Test Method for Evaluating Roof Drain Performance (reaffirmation of ANSI/ASPE/IAPMO Z1034-2015): 7/24/2020

ANSI/IAPMO Z1033-2015 (R2020), Flexible PVC Hoses and Tubing for Pools, Hot Tubs, Spas, and Jetted Bathtubs (reaffirmation of ANSI/IAPMO Z1033 -2015): 7/24/2020

NECA (National Electrical Contractors Association)

Revision

ANSI/NECA 101-2020, Standard for Installing Steel Conduits (RMC, IMC, EMT) (revision of ANSI/NECA 101-2006 (R2013)): 7/24/2020

NEMA (ASC C18) (National Electrical Manufacturers Association)

Revision

* ANSI C18.5M Part 1-2020, Standard for Portable Lithium Rechargeable Cells and Batteries - General and Specifications (revision and partition of ANSI C18.2M, Part 1-2013): 7/24/2020

OIX (Open-IX Association)

New Standard

ANSI/OIX 1-2020, Open-IX Certified Internet Exchange (new standard): 7/23/2020

TCNA (ASC A108) (Tile Council of North America)

Revision

ANSI A108.5-2020, Installation of Ceramic Tile with Dry-Set Portland Cement Mortar or Latex-Portland Cement Mortar (revision of ANSI A108.5-1999 (R2019)): 7/27/2020

ANSI A108.14-2020, Installation of Paper-Faced Glass Mosaic Tile (revision of ANSI A108.14-2010): 7/27/2020

ANSI A136.1-2020, Standard Specifications for Organic Adhesives for Installation of Ceramic Tile (revision of ANSI A136.1-2008 (R2013)): 7/27/2020

TMA (The Monitoring Association)

Revision

ANSI/TMA CS-V-01-2020, Alarm Confirmation, Verification and Notification Procedures (revision and redesignation of ANSI/CSAA CS-V-01-2016): 7/23/2020

UL (Underwriters Laboratories)

Reaffirmation

ANSI/UL 218-2015 (R2020), UL Standard for Safety for Fire Pump Controllers (reaffirmation of ANSI/UL 218-2015): 7/22/2020

Revision

ANSI/UL 6141-2020, Standard for Safety for Wind Turbines Permitting Entry of Personnel (revision of ANSI/UL 6141-2016): 7/27/2020

Project Initiation Notification System (PINS)

ANSI Procedures require notification of ANSI by ANSI-accredited standards developers (ASD) of the initiation and scope of activities expected to result in new or revised American National Standards (ANS). Early notification of activity intended to reaffirm or withdraw an ANS and in some instances a PINS related to a national adoption is optional. The mechanism by which such notification is given is referred to as the PINS process. For additional information, see clause 2.4 of the ANSI Essential Requirements: Due Process Requirements for American National Standards.

Following is a list of proposed actions and new ANS that have been received recently from ASDs. Please also review the section in Standards Action entitled "American National Standards Maintained Under Continuous Maintenance" for additional or comparable information with regard to standards maintained under the continuous maintenance option. Use the following Public Document Library url to access PDF & EXCEL reports of approved & proposed ANS: List of Approved and Proposed ANS

Directly and materially affected interests wishing to receive more information or to submit comments are requested to contact the standards developer directly within 30 days of the publication of this announcement.

AAFS (American Academy of Forensic Sciences)

Contact: Teresa Ambrosius: (719) 453-1036; tambrosius@aafs.org 410 North 21st Street, Colorado Springs, CO 80904 www.aafs.org

New Standard

BSR/ASB BPR 143-202x, Best Practice Recommendations for Technical Review in Friction Ridge Examination (new standard)

Stakeholders: Forensic science practitioners, litigators.

Project Need: It is essential that friction-ridge examiners provide a sound basis for each conclusion drawn. Technical review of an examiner's work product by another competent examiner is a proactive measure to determine if this basis exists. This document provides several recommendations to guide the technical review process. This document provides best practice recommendations for conducting technical reviews of friction-ridge impression examinations. The document provides general guidance on best practices for technical reviews, including a checklist and sample review forms. This document does not address administrative review or verification.

AAFS (American Academy of Forensic Sciences)

Contact: Teresa Ambrosius: (719) 453-1036; tambrosius@aafs.org 410 North 21st Street, Colorado Springs, CO 80904 www.aafs.org

New Standard

BSR/ASB Std 145-202x, Standard for Consultation during Friction Ridge Examination (new standard)

Stakeholders: Forensic science practitioners, litigators.

Project Need: It is imperative that the friction ridge discipline have a standardized framework for addressing and documenting consultations to ensure clarity and transparency for forensic science stakeholders to understand the nature and outcome of the discussion.

This standard sets documentation, quality, and consultant requirements for consultations during friction-ridge examinations. This document does not apply to conflict resolution.

ASME (American Society of Mechanical Engineers)

Contact: Terrell Henry: (212) 591-8489; ansibox@asme.org

Two Park Avenue, M/S 6-2B, New York, NY 10016-5990 www.asme.org

New Standard

BSR/ASME A112.6.8/CSA B79.8-202x, Trench Drains (new standard)

Stakeholders: Users, manufacturers, inspectors, laboratories, etc.

Project Need: Harmonize the ASME Standard with its corresponding CSA B79 Standard and to bring both Standards up-to-date with current business practices.

This Standard establishes design and performance requirements for trench drain, utility channel, and grate systems that are used inside of, or adjacent to, building structures that are typically non-residential. These channels are not typically subject to high-speed vehicles but may encounter concentrated heavy loads such as hard-wheeled forklifts.

ASME (American Society of Mechanical Engineers)

Contact: Terrell Henry: (212) 591-8489; ansibox@asme.org

Two Park Avenue, M/S 6-2B, New York, NY 10016-5990 www.asme.org

Revision

BSR/ASME A112.6.1-202x, Supports for Off-the-Floor Plumbing Fixtures (revision and redesignation of ANSI/ASME A112.6.1M-1997 (R2017))

Stakeholders: Manufacturers, users, laboratories, inspectors, etc.

Project Need: Revise the Standard to address changing performance requirements in the market and ambiguity in its testing procedure. Additionally, standards for related products in the plumbing waste, drainage, and vent sector have been revised more recently and this standard may need to be revised accordingly to stay current with general requirements and references.

This Standard applies to floor-affixed supports for off-the-floor plumbing fixtures, including combination carriers and waste fittings for water closets and carriers for urinals, lavatories, sinks, and water coolers. This Standard covers definitions, materials and finishes, general requirements, strength and deflection requirements, and details of the various types of supports included in this Standard.

ASME (American Society of Mechanical Engineers)

Contact: Terrell Henry: (212) 591-8489; ansibox@asme.org

Two Park Avenue, M/S 6-2B, New York, NY 10016-5990 www.asme.org

Revision

BSR/ASME A112.14.3/CSA B481.1-202x, Hydromechanical Grease Interceptors (revision, redesignation and consolidation of ANSI/ASME A112.14.3-2018)

Stakeholders: Users, manufacturers, laboratories, inspectors, etc.

Project Need: Harmonize the ASME Standard with its corresponding CSA B481 Standard and to bring both Standards up-to-date with current business practices.

This Standard covers general product requirements as well as the performance criteria for the testing and rating of hydromechanical grease interceptors, rated by flow in gallons per minute (gpm) or liters per minute (L/min).

ASME (American Society of Mechanical Engineers)

Contact: Terrell Henry: (212) 591-8489; ansibox@asme.org

Two Park Avenue, M/S 6-2B, New York, NY 10016-5990 www.asme.org

Revision

BSR/ASME A112.14.4/CSA B481.5-202x, Grease Removal Devices (revision, redesignation and consolidation of ANSI/ASME A112.14.4-2001 (R2017))

Stakeholders: Manufacturers, users, inspectors, laboratories, etc.

Project Need: Harmonize the ASME Standard with its corresponding CSA B481 Standard and to bring both Standards up-to-date with current business practices.

This Standard establishes requirements for grease interceptors that are equipped with automatic grease removal devices (GRD). It includes testing requirements and performance criteria designed to ensure conformance to this Standard.

ASME (American Society of Mechanical Engineers)

Contact: Terrell Henry: (212) 591-8489; ansibox@asme.org

Two Park Avenue, M/S 6-2B, New York, NY 10016-5990 www.asme.org

Revision

BSR/ASME A112.36.2/CSA B79.2-202x, Cleanouts (revision, redesignation and consolidation of ANSI/ASME A112.36.2M-2008 (R2017))

Stakeholders: Users, laboratories, manufacturers, inspectors, etc.

Project Need: Harmonize the ASME Standard with its corresponding CSA B79 Standard and to bring both Standards up-to-date with current business practices.

This Standard specifies requirements for commercial and residential cleanouts.

ASME (American Society of Mechanical Engineers)

Contact: Terrell Henry: (212) 591-8489; ansibox@asme.org

Two Park Avenue, M/S 6-2B, New York, NY 10016-5990 www.asme.org

Revision

BSR/ASME A112.6.3/CSA B79.3-202x, Floor Drains (revision and redesignation of ANSI/ASME A112.6.3-2019)

Stakeholders: Manufacturers, users, laboratories, inspectors, etc.

Project Need: Harmonize the ASME Standard with its corresponding CSA B79 Standard and to bring both Standards up-to-date with current business practices.

This Standard specifies design and performance requirements for floor drains, adjustable floor drains, and area drains that are used inside of, or adjacent to, building structures.

ASME (American Society of Mechanical Engineers)

Contact: Terrell Henry: (212) 591-8489; ansibox@asme.org

Two Park Avenue, M/S 6-2B, New York, NY 10016-5990 www.asme.org

Revision

BSR/ASME A112.6.4/CSA B79.4-202x, Roof, Deck, and Balcony Drains (revision and redesignation of ANSI/ASME A112.6.4-2003 (R2012))

Stakeholders: Manufacturers, users, laboratories, inspectors, etc.

Project Need: Harmonize the ASME Standard with its corresponding CSA B79 Standard and to bring both Standards up-to-date with current business practices.

This Standard specifies design and performance requirements for roof drains. It covers the following types: (a) general purpose, (b) gutter and cornice, (c) parapet and promenade, (d) balcony, and (e) deck.

ASME (American Society of Mechanical Engineers)

Contact: Terrell Henry: (212) 591-8489; ansibox@asme.org

Two Park Avenue, M/S 6-2B, New York, NY 10016-5990 www.asme.org

Revision

BSR/ASME A112.6.7/CSA B79.7-202x, Sanitary Floor Sinks (revision and redesignation of ANSI/ASME A112.6.7-2010 (R2019))

Stakeholders: Manufacturers, users, laboratories, inspectors, etc.

Project Need: Publish the ASME Standard as a joint Standard with CSA and to bring both Standards up-to-date with current business practices.

This Standard covers sanitary floor sinks and specifies requirements for materials, construction, inspection, testing, and marking. The provisions of this Standard are not intended to prevent the use of any alternate materials or methods of construction, provided any such alternate meets the intent of this Standard.

ASME (American Society of Mechanical Engineers)

Contact: Terrell Henry: (212) 591-8489; ansibox@asme.org

Two Park Avenue, M/S 6-2B, New York, NY 10016-5990 www.asme.org

Revision

BSR/ASME A112.6.9/CSA B79.9-202x, Siphonic Roof Drains (revision and redesignation of ANSI/ASME A112.6.9-2005 (R2019))

Stakeholders: Users, manufacturers, laboratories, inspectors, etc.

Project Need: Harmonize the ASME Standard with its corresponding CSA B79 Standard and to bring both Standards up-to-date with current business practices.

This Standard establishes minimum requirements and provides guidelines for the proper design, installation, examination, and testing of siphonic roof drains. It includes definitions of terms and parameters involved in the proper design of siphonic drainage systems.

ASTM (ASTM International)

Contact: Laura Klineburger: (610) 832-9744; accreditation@astm.org

100 Barr Harbor Drive, West Conshohocken, PA 19428-2959 www.astm.org

New Standard

BSR/ASTM WK73586-202x, New Specification for Selection and Application of Cryogenic Tank Insulation Systems on LNG-Fueled Ships (new standard)

Stakeholders: Insulation/Processes industry.

Project Need: To develop an industry standard for properly insulating cryogenic tank (bunker) vessels and LNG-fueled vessels. The target audience is intended to be engineers, architects, and construction employees in the LNG ship-building market.

Develop an installation guideline for installing cryogenic insulation materials on new vessels with cryogenic tanks and/or using LNG fuel.

DirectTrust (DirectTrust.org, Inc.)

Contact: Natasha Kreisle: (404) 452-4962; Natasha.Kreisle@DirectTrust.org; standards@directtrust.org P.O. Box 2885, Blairsville, GA 30514 www.DirectTrust.org

New Standard

BSR/DS202003V01-202x, Implementation Guide for Encounter and Event Notifications via Direct Secure Messaging (new standard)

Stakeholders: Providers of direct exchange services; users of direct exchange services; healthcare providers or provider organizations; governmental agencies; non-profit organizations; patients or consumer advocates; general interest

Project Need: Today's healthcare environment sees care teams distributed across organizational boundaries - a primary care physician may not be on the hospital staff where care is initially delivered. Likewise, payers and care managers may have relationships with the patient but may not be formally aligned with the facility where an encounter occurs. To facilitate effective coordination of care team activities, the CMS Interoperability and Patient Access rule established a Condition of Participation for the Medicare program for Hospitals, Emergency Departments, Critical Access Hospitals, and Psychiatric Hospitals to send notifications to care team members for Admissions, Discharges, and Transfers (ADT). Hospitals do this utilizing third-party solutions, most of which offer Direct Secure Messaging to deliver notifications into the workflow of providers. While the Direct Standard™ is one of the most common mechanisms for this delivery, there is no standard for the contents of messages or for workflow expectations in sending and receiving systems.

This project will establish content and workflow standards for Direct Secure Messaging between inpatient facilities and downstream providers, as well as subscription services that act as intermediaries in this flow. In order to ensure effective interoperability and to limit burdensome workflows, standardization of these messages is essential. DirectTrust Standards seeks to develop an implementation guide for actors in the healthcare ecosystem who will use the Direct Standard™ for the communication of various transactions in support of Encounter and Event Notifications as established in CMS Interoperability and Patient Access rule. This project will establish content and workflow standards for Direct Secure Messaging between inpatient facilities and downstream providers, as well as subscription services that act as intermediaries in this flow. In order to ensure effective interoperability and to limit burdensome workflows, standardization of these messages is essential.

FCI (Fluid Controls Institute)

Contact: Leslie Schraff: (216) 241-7333; fci@fluidcontrolsinstitute.org 1300 Sumner Avenue, Cleveland, OH 44115 www.fluidcontrolsinstitute.org

Reaffirmation

BSR/FCI 70-3-2016 (R202x), Regulator Seat Leakage (reaffirmation of ANSI/FCI 70-3-2016)

Stakeholders: Manufacturers of pressure regulators.

Project Need: To provide test methods for pilot-operated and direct-acting pressure-reducing, pressure-relieving (back pressure), differential-pressure, and temperature regulators.

This standard establishes a series of seat leakage classes for regulators and defines the production test procedures.

IAPMO (International Association of Plumbing & Mechanical Officials)

Contact: Gabriella Davis: (909) 472-4203; gaby.davis@iapmo.org 4755 East Philadelphia Street, Ontario, CA 91761-2816 www.iapmo.org

Revision

BSR/IAPMO UMC 1-2024, Uniform Mechanical Code (revision of ANSI/IAPMO UMC 1-2021)

Stakeholders: Manufacturers, users, installers and maintainers, labor research/standards/testing laboratories, enforcing authorities, consumers, and special experts.

Project Need: Designation of the UMC as an ANS has provided the built industry with uniform mechanical standards resulting in a reduction in training costs and product development costs, and in price reduction for consumers. This ANS provides consumers with safe mechanical systems while allowing latitude for innovation and new technologies. This project is intended to keep the code current.

This code provides minimum standards to safeguard life or limb, health, property and public welfare by regulating and controlling the design, construction, installation, quality of materials, location, operation and maintenance or use of heating, ventilating, cooling, refrigeration systems, incinerators and other miscellaneous heat producing appliances. The provisions of this code apply to the erection, installation, alteration, repair, relocation, replacement, addition to, use, or maintenance of mechanical systems.

IAPMO (International Association of Plumbing & Mechanical Officials)

Contact: Gabriella Davis: (909) 472-4203; gaby.davis@iapmo.org 4755 East Philadelphia Street, Ontario, CA 91761-2816 www.iapmo.org

Revision

BSR/IAPMO UPC 1-2024, Uniform Plumbing Code (revision of ANSI/IAPMO UPC 1-2021)

Stakeholders: Manufacturers, users, installers and maintainers, labor, research/standards/testing laboratories, enforcing authorities, consumers, and special experts.

Project Need: Designation of the UPC as an ANS has provided the built industry with uniform plumbing standards resulting in a reduction in training costs and product development costs, and in a price reduction for consumers. This ANS provides consumers with safe and sanitary plumbing systems while allowing latitude for innovation and new technologies. This project is intended to keep the code current.

This code provides minimum standards and requirements to safeguard life or limb, health, property, and public welfare by regulating and controlling the design, construction, installation, quality of materials, location, operation, and maintenance or use of plumbing systems. The provisions of this code apply to the erection, installation, alteration, repair, relocation, addition to, use or maintenance of plumbing systems.

MTConnect (MTConnect Institute)

Contact: Russell Waddell: (571) 318-7522; rwaddell@amtonline.org 7901 Jones Branch Drive, Suite 900, McLean, VA 22102 http://www.amtonline.org

Revision

BSR/MTC1.5-202x, MTConnect Standard Version 1.5.0 (revision and redesignation of ANSI/MTC1.4-2018)

Stakeholders: Manufacturers, manufacturing software developers, industrial system integrators.

Project Need: This project revises and updates the previous MTConnect version to include new data items and definitions and make editorial corrections.

To foster greater interoperability between factory and industrial systems and equipment, MTConnect provides a semantic vocabulary and information models for manufacturing equipment, devices, and processes particularly in discrete manufacturing. The standard will be submitted for consideration to ISO/TC 184/SC 4.

NEMA (ASC C136) (National Electrical Manufacturers Association)

Contact: David Richmond: (703) 841-3234; David.Richmond@nema.org 1300 North 17th Street, Suite 900, Rosslyn, VA 22209 www.nema.org

Revision

BSR C136.47-202X, Steel Roadway and Area Lighting Poles (revision of ANSI C136.47-2010 (R2015))

Stakeholders: Light pole manufacturers, users.

Project Need: Revise to update references, bring language in line with other C136 standards and reflect current industry practices.

This standard applies to steel lighting poles. This standard includes nomenclature, dimensional data, performance criteria, and some interchangeability features for standard poles as well as those that must meet breakaway requirements for poles as described in Standard Specifications for Structural Supports for Highway Signs, Luminaires and Traffic Signals, AASHTO LTS.

UL (Underwriters Laboratories)

Contact: Tony Partridge: (919) 549-1392; Tony.Partridge@ul.org 12 Laboratory Drive, Research Triangle Park, NC 27709-3995 https://ul.org/

New Standard

BSR/UL 248-18-202X, Standard for Safety for Low-Voltage Fuses - Part 18: Class CD Fuses (new standard)

Stakeholders: Producers of Class CD fuses, fuseholder manufacturers, retailers, consumers.

Project Need: To obtain national recognition of a standard covering Class CD Fuses. The new standard supports the ongoing harmonization activity for fuses under CANENA and North American harmonization for the US, Canada, and Mexico. The new standard is supported by UL, CSA, and ANCE for evolution as a trinational standard. This new Part 2 standard would be used in coordination with the Part 1 standard, UL 248-1, General Requirements for Fuses, by adding to the types of fuses for which the general requirements are adapted for specific application.

UL 248-18 applies to Class CD fuses rated 31 - 60 A and 600 V AC. DC ratings are optional.

American National Standards Maintained Under Continuous Maintenance

The ANSI Essential Requirements: Due Process Requirements for American National Standards provides two options for the maintenance of American National Standards (ANS): periodic maintenance (see clause 4.7.1) and continuous maintenance (see clause 4.7.2). Continuous maintenance is defined as follows:

The standard shall be maintained by an accredited standards developer. A documented program for periodic publication of revisions shall be established by the standards developer. Processing of these revisions shall be in accordance with these procedures. The published standard shall include a clear statement of the intent to consider requests for change and information on the submittal of such requests. Procedures shall be established for timely, documented consensus action on each request for change and no portion of the standard shall be excluded from the revision process. In the event that no revisions are issued for a period of four years, action to reaffirm or withdraw the standard shall be taken in accordance with the procedures contained in the ANSI Essential Requirements.

The Executive Standards Council (ExSC) has determined that for standards maintained under the Continuous Maintenance option, separate PINS announcements are not required. The following ANSI Accredited Standards Developers have formally registered standards under the Continuous Maintenance option.

- AAMI (Association for the Advancement of Medical Instrumentation)
- AARST (American Association of Radon Scientists and Technologists)
- AGA (American Gas Association)
- AGSC (Auto Glass Safety Council)
- ASC X9 (Accredited Standards Committee X9, Incorporated)
- ASHRAE (American Society of Heating, Refrigerating and Air-Conditioning Engineers, Inc.)
- ASME (American Society of Mechanical Engineers)
- ASTM (ASTM International)
- GBI (Green Building Initiative)
- HL7 (Health Level Seven)
- IES (Illuminating Engineering Society)
- ITI (InterNational Committee for Information Technology Standards)
- MHI (Material Handling Industry)
- NAHBRC (NAHB Research Center, Inc.)
- NBBPVI (National Board of Boiler and Pressure Vessel Inspectors)
- NCPDP (National Council for Prescription Drug Programs)
- NEMA (National Electrical Manufacturers Association)
- NISO (National Information Standards Organization)
- NSF (NSF International)
- PRCA (Professional Ropes Course Association)
- RESNET (Residential Energy Services Network, Inc.)
- SAE (SAE International)
- TCNA (Tile Council of North America)
- TIA (Telecommunications Industry Association)
- UL (Underwriters Laboratories)

To obtain additional information with regard to these standards, including contact information at the ANSI Accredited Standards Developer, please visit ANSI Online at www.ansi.org/asd, select "American National Standards Maintained Under Continuous Maintenance." Questions? psa@ansi.org.

ANSI-Accredited Standards Developers Contact Information

The addresses listed in this section are to be used in conjunction with standards listed in PINS, Call for Comment and Final Actions. This section is a list of developers who have submitted standards for this issue of *Standards Action* – it is not intended to be a list of all ANSI-Accredited Standards Developers. Please send all address corrections to Standards Action Editor at standact@ansi.org.

AAFS

American Academy of Forensic Sciences 410 North 21st Street Colorado Springs, CO 80904 Phone: (719) 453-1036 Web: www.aafs.org

AAMI

Association for the Advancement of Medical Instrumentation 901 N. Glebe Road, Suite 300 Arlington, VA 22203 Phone: (703) 253-8263 Web: www.aami.org

ANS

American Nuclear Society 555 North Kensington Avenue La Grange Park, IL 60526 Phone: (708) 579-8268 Web: www.ans.org

APCO

Association of Public-Safety Communications Officials-International 351 N. Williamson Boulevard Daytona Beach, FL 32114 Phone: 571-289-7402 Web: www.apcoIntl.org

ASHRAE

American Society of Heating, Refrigerating and Air-Conditioning Engineers, Inc. 1791 Tullie Circle, NE Atlanta, GA 30329 Phone: (678) 539-1214 Web: www.ashrae.org

ASME

American Society of Mechanical Engineers Two Park Avenue M/S 6-2B New York, NY 10016-5990 Phone: (212) 591-8489 Web: www.asme.org

ASSP (Safety)

American Society of Safety Professionals 520 N. Northwest Hwy Park Ridge, IL 60068 Phone: (847) 768-3475 Web: www.assp.org

ASTM

ASTM International 100 Barr Harbor Drive West Conshohocken, PA 19428 -2959

Phone: (610) 832-9744 Web: www.astm.org

AWC

American Wood Council 222 Catoctin Circle Suite 201 Leesburg, VA 20175 Phone: (202) 463-2770 Web: www.awc.org

AWS

American Welding Society 8669 Doral Blvd Suite 130 Doral, FL 33166 Phone: (305) 443-9353 Web: www.aws.org

DirectTrust

DirectTrust.org, Inc.
P.O. Box 2885
Blairsville, GA 30514
Phone: (404) 452-4962
Web: www.DirectTrust.org

ECIA

Electronic Components Industry Association 13873 Park Center Road Suite 315 Herndon, VA 20171 Phone: (571) 323-0294 Web: www.ecianow.org

FCI

Fluid Controls Institute 1300 Sumner Avenue Cleveland, OH 44115 Phone: (216) 241-7333

Web: www.fluidcontrolsinstitute.

org

HL7

Health Level Seven 3300 Washtenaw Avenue Suite 227 Ann Arbor, MI 48104 Phone: (313) 550-2073 Web: www.hl7.org

IAPMO

International Association of Plumbing & Mechanical Officials 4755 East Philadelphia Street Ontario, CA 91761-2816 Phone: (909) 472-4203 Web: www.iapmo.org

IAPMO (ASSE Chapter)

ASSE International Chapter of IAPMO
18927 Hickory Creek Drive Suite 220
Mokena, IL 60448
Phone: (708) 995-3017
Web: www.asse-plumbing.org

IAPMO (Z)

International Association of Plumbing & Mechanical Officials 5001 East Philadelphia Street Ontario, CA 91761 Phone: (909) 230-5534 Web: https://www. iapmostandards.org

MTConnect

MTConnect Institute 7901 Jones Branch Drive Suite 900 McLean, VA 22102 Phone: (571) 318-7522 Web: http://www.amtonline.org

NASBLA

National Association of State Boating Law Administrators 1648 McGrathiana Parkway Suite 360 Lexington, KY 40511 Phone: (859) 225-9487 Web: www.nasbla.org

NECA

National Electrical Contractors Association 3 Bethesda Metro Center Suite 1100 Bethesda, MD 20814 Phone: (301) 215-4549 Web: www.neca-neis.org

NEMA (ASC C136)

National Electrical Manufacturers Association 1300 North 17th Street Suite 900 Rosslyn, VA 22209 Phone: (703) 841-3234 Web: www.nema.org

NEMA (ASC C8)

National Electrical Manufacturers Association 1300 North 17th Street Rosslyn, VA 22209 Phone: (703) 841-3278 Web: www.nema.org

NENA

National Emergency Number Association 1700 Diagonal Road Suite 500 Alexandria, VA 22314 Phone: (727) 312-3230 Web: www.nena.org

NFPA

National Fire Protection Association One Batterymarch Park Quincy, MA 02269-9101 Phone: (617) 984-7248 Web: www.nfpa.org

NSF

NSF International 789 N. Dixboro Road Ann Arbor, MI 48105-9723 Phone: (734) 827-5643 Web: www.nsf.org

OIX

Open-IX Association 340 South Lemon Avenue #7988 Walnut, CA 91789 Phone: (214) 305-2444 Web: http://www.open-ix.org

OPEI

Outdoor Power Equipment Institute 1605 King Street Alexandria, VA 22314 Phone: (703) 549-7600 Web: www.opei.org

TCNA (ASC A108)

Tile Council of North America 100 Clemson Research Blvd. Anderson, SC 29625 Phone: (864) 646-8453 Web: www.tcnatile.com

TIA

Telecommunications Industry Association 1320 North Courthouse Road Suite 200 Arlington, VA 22201 Phone: (703) 907-7706 Web: www.tiaonline.org

TMA

The Monitoring Association 7918 Jones Branch Drive Suite 510 McLean, VA 22102 Phone: (703) 242-4670 Web: www.csaaul.org

UL

Underwriters Laboratories 12 Laboratory Drive Research Triangle Park, NC 27709 -3995

Phone: (919) 549-1392 Web: https://ul.org/

ISO & IEC Draft International Standards



This section lists proposed standards that the International Organization for Standardization (ISO) and the International Electrotechnical Commission (IEC) are considering for approval. The proposals have received substantial support within the technical committees or subcommittees that developed them and are now being circulated to ISO and IEC members for comment and vote. Standards Action readers interested in reviewing and commenting on these documents should order copies from ANSI.

Comments

Comments regarding ISO documents should be sent to ANSI's ISO Team (isot@ansi.org); comments on ISO documents must be submitted electronically in the approved ISO template and as a Word document as other formats will not be accepted.

Those regarding IEC documents should be sent to Tony Zertuche, General Secretary, USNC/IEC, at ANSI's New York offices (tzertuche@ansi.org). The final date for offering comments is listed after each draft.

Ordering Instructions

ISO and IEC Drafts can be made available by contacting ANSI's Customer Service department. Please e-mail your request for an ISO or IEC Draft to Customer Service at sales@ansi.org. When making your request, please provide the date of the Standards Action issue in which the draft document you are requesting appears.

ISO Standards

AGRICULTURAL FOOD PRODUCTS (TC 34)

- ISO/DIS 23418, Microbiology of the food chain Whole genome sequencing for typing and genomic characterization of foodborne bacteria - General requirements and guidance - 10/12/2020, \$112.00
- ISO/DIS 24673, Concentrated date juice Specifications and test methods 10/9/2020, \$29.00

AIRCRAFT AND SPACE VEHICLES (TC 20)

- ISO/DIS 9528, Aerospace Standard-weight polytetrafluoroethylene (PTFE) hose assemblies, classification 204 degrees C/21 000 kPa -Procurement specification - 10/10/2020, FREE
- ISO/DIS 9938, Aerospace Polytetrafluoroethylene (PTFE) hose assemblies, classification 204 degrees C/28 000 kPa Procurement specification 10/10/2020, FREE

BLOCKCHAIN AND DISTRIBUTED LEDGER TECHNOLOGIES (TC 307)

ISO/DIS 23257, Blockchain and distributed ledger technologies -Reference architecture - 10/8/2020, \$125.00

CORROSION OF METALS AND ALLOYS (TC 156)

ISO/DIS 10270, Corrosion of metals and alloys - Aqueous corrosion testing of zirconium alloys for use in nuclear power reactors - 10/9/2020, \$67.00

ESSENTIAL OILS (TC 54)

ISO/DIS 3065, Essential oil of Eucalyptus, Australian type - 10/12/2020, \$40.00

FURNITURE (TC 136)

ISO/DIS 7170, Furniture - Storage units - Test methods for the determination of strength and durability - 11/8/2015, \$107.00

PLASTICS PIPES, FITTINGS AND VALVES FOR THE TRANSPORT OF FLUIDS (TC 138)

ISO/DIS 4152, Glass-reinforced thermosetting plastics (GRP) pipes - Determination of the apparent axial long-term modulus of pipes subject to beam bending - 10/12/2020, \$46.00

ISO/DIS 10952, Glass-reinforced thermosetting plastics (GRP) pipes and fittings - Determination of the resistance to chemical attack for the inside of a section in a deflected condition - 10/11/2020, \$46.00

SOLID BIOFUELS (TC 238)

ISO/DIS 17225-9, Solid biofuels - Fuel specifications and classes -Part 9: Graded hog fuel and wood chips for industrial use -10/9/2020, \$46.00

TEXTILES (TC 38)

ISO/DIS 16322-3, Textiles - Determination of spirality after laundering - Part 3: Woven and knitted garments - 10/9/2020, \$46.00

TOBACCO AND TOBACCO PRODUCTS (TC 126)

- ISO 20193/DAmd1, Tobacco and tobacco products Determination of the width of the strands of cut tobacco Amendment 1 10/11/2020, \$29.00
- ISO/DIS 6488, Tobacco and tobacco products Determination of water content Karl Fischer method 10/12/2020, \$46.00

TRACTORS AND MACHINERY FOR AGRICULTURE AND FORESTRY (TC 23)

- ISO/DIS 12003-1, Tractors for agriculture and forestry Roll-over protective structures on narrow tractors Part 1: Front-mounted ROPS 10/9/2020, \$134.00
- ISO/DIS 12003-2, Tractors for agriculture and forestry Roll-over protective structures on narrow tractors Part 2: Rear-mounted ROPS 10/9/2020, \$134.00

IEC Standards

- 2/2014/CD, IEC 60034-33 ED1: Rotating electrical machines Part 33: Specific technical requirements for synchronous hydrogenerators including motor-generators, /2020/10/1
- 8B/61/NP, PNW TS 8B-61: Guideline for the planning and design of the decentralized direct current distribution systems, /2020/10/1
- 9/2614/NP, PNW 9-2614: Railway applications Fixed installations Electronic power converters Part 2-1: DC Traction Applications Diode rectifiers. /2020/10/1
- 13/1816/CDV, IEC 62057-1 ED1: Test equipment, techniques and procedures for electrical energy meters Part 1: Stationary Meter Test Units (MTU), /2020/10/1

- 23A/904(F)/CDV, IEC 61386-21 ED2: Conduit systems for cable management Part 21: Particular requirements Rigid conduit systems, 2020/10/2
- 23A/905(F)/CDV, IEC 61386-22 ED2: Conduit Systems for cable management Part 22: Particular requirements Pliable conduit systems, 2020/10/2
- 23A/906(F)/CDV, IEC 61386-23 ED2: Conduit systems for cable management - Part 23: Particular requirements - Flexible conduit systems, 2020/10/2
- 31J/307/FDIS, IEC 60079-10-1 ED3: Explosive atmospheres Part 10 -1: Classification of areas Explosive gas atmospheres, 020/9/4/
- 34/714/CD, IEC 63117 ED1: General requirements for lighting systems Safety, /2020/10/1
- 34D/1564/CD, IEC 60598-1/FRAG7 ED10: Fragment 7 Luminaires Part 1: General requirements and tests, /2020/10/1
- 34D/1563/CD, IEC 60598-1 ED10: Luminaires Part 1: General requirements and tests, /2020/10/1
- 46C/1157/NP, PNW 46C-1157: Multicore and symmetrical pair/quad cables for digital communications Part 15: Symmetrical pair/quad cables for horizontal floor wiring with transmission characteristics up to 1 000 MHz and resistance to fire performance characteristics Sectional specification, /2020/10/1
- 46C/1158/CD, IEC 61156-1 ED4: Multicore and symmetrical pair/quad cables for digital communications Part 1: Generic specification, /2020/10/1
- 48B/2837/NP, PNW 48B-2837: Connectors for electronic equipment product requirements Part 8-10X: Power connectors Detail specification for 2-pole snap locking power rectangular connectors with plastic housing for rated current of 63 A, /2020/10/1
- 51/1348/FDIS, IEC 63182-2 ED1: Magnetic powder cores Guidelines on dimensions and the limits of surface irregularities Part 2: Ringcores, 020/9/4/
- 51/1349/DTR, IEC TR 63307 ED1: Measurement methods of the complex relative permeability and the complex relative permittivity of noise suppression sheet, 2020/9/18
- 62D/1780/FDIS, ISO 80601-2-70 ED2: Medical Electrical Equipment -Part 2-70: Particular requirements for basic safety and essential performance of sleep apnoea breathing therapy equipment, 020/9/4/
- 62D/1781/FDIS, ISO 80601-2-69 ED2: Medical electrical equipment -Part 2-69: Particular requirements for basic safety and essential performance of oxygen concentrator equipment, 020/9/4/
- 77A/1080/CDV, IEC 61000-4-30/AMD1 ED3: Amendment 1: Electromagnetic compatibility (EMC) - Part 4-30: Testing and measurement techniques - Power quality measurement methods, /2020/10/1
- 86B/4324(F)/FDIS, IEC 61753-071-02 ED1: Fibre optic interconnecting devices and passive components Performance standard Part 071 -02: Non-connectorized single-mode fibre optic 1 × 2 and 2 × 2 spatial switches for category C Controlled environments, 2020/8/21
- 87/745/Q, Revision of IEC 62359, 020/9/4/
- 95/432/CD, IEC TR 60255-216-1 ED1: Measuring relays and protection equipment Part 216-1: Guidelines for requirements and tests for protection functions with digital inputs and outputs, /2020/10/1
- 100/3465/CD, IEC 63296-1 ED1: Portable multimedia equipment -Determination of battery duration - Part 1: Powered loudspeaker equipment (TA 19), /2020/10/1
- 110/1222/FDIS, IEC 63211-3-5 ED1: Durability test methods for electronic displays Part 3-5: Mechanical tests Surface durability, 020/9/4/

- 111/582/CDV, IEC 62321-3-3 ED1: Determination of certain substances in electrotechnical products Part 3-3: Screening of polybrominated biphenyls, polybrominated diphenyl ethers and phthalates in polymers by pyrolysis (Py-GC-MS) or thermal desorption (TD-GC-MS) gas chromatography-mass spectrometry, /2020/10/1
- JTC1-SC41/167/CDV, ISO/IEC 21823-3 ED1: Internet of Things (IoT) Interoperability for IoT Systems Part 3: Semantic interoperability, /2020/10/1

Newly Published ISO & IEC Standards



Listed here are new and revised standards recently approved and promulgated by ISO - the International Organization for Standardization – and IEC – the International Electrotechnical Commission. Most are available at the ANSI Electronic Standards Store (ESS) at www.ansi.org. All paper copies are available from Standards resellers (http://webstore.ansi.org/faq.aspx#resellers)..

ISO Standards

AGRICULTURAL FOOD PRODUCTS (TC 34)

ISO 7540:2020, Spices and condiments - Ground sweet and hot paprika (Capsicum annuum L. and Capsicum frutescens L.) -Specifications, \$68.00

<u>ISO 7541:2020</u>, Spices and condiments - Spectrophotometric determination of the extractable colour in paprika, \$68.00

AIRCRAFT AND SPACE VEHICLES (TC 20)

ISO 24917:2020, Space systems - General test requirements for launch vehicles, \$185.00

ANAESTHETIC AND RESPIRATORY EQUIPMENT (TC 121)

ISO 80601-2-84:2020. Medical electrical equipment - Part 2-84: Particular requirements for the basic safety and essential performance of ventilators for the emergency medical services environment, \$232.00

EQUIPMENT FOR FIRE PROTECTION AND FIRE FIGHTING (TC 21)

ISO 6182-17:2020, Fire protection - Automatic sprinkler systems - Part 17: Requirements and test methods for pressure reducing valves, \$103.00

FLOOR COVERINGS (TC 219)

ISO 1763:2020, Textile floor coverings - Determination of number of tufts and/or loops per unit length and per unit area, \$45.00

GAS CYLINDERS (TC 58)

ISO 17871:2020, Gas cylinders - Quick-release cylinder valves -Specification and type testing, \$68.00

GRAPHICAL SYMBOLS (TC 145)

ISO 20712-3:2020, Water safety signs and beach safety flags - Part 3: Guidance for use, \$162.00

IMPLANTS FOR SURGERY (TC 150)

ISO 14879-1:2020, Implants for surgery - Total knee-joint prostheses - Part 1: Determination of endurance properties of knee tibial trays, \$68.00

IRON ORES (TC 102)

ISO 3087:2020, Iron ores - Determination of the moisture content of a lot, \$162.00

MEASUREMENT OF FLUID FLOW IN CLOSED CONDUITS (TC 30)

ISO 3966:2020, Measurement of fluid flow in closed conduits - Velocity area method using Pitot static tubes, \$209.00

NON-DESTRUCTIVE TESTING (TC 135)

ISO 22232-1:2020, Non-destructive testing - Characterization and verification of ultrasonic test equipment - Part 1: Instruments, \$185.00

NUCLEAR ENERGY (TC 85)

ISO 13304-1:2020, Radiological protection - Minimum criteria for electron paramagnetic resonance (EPR) spectroscopy for retrospective dosimetry of ionizing radiation - Part 1: General principles, \$138.00

<u>ISO 13304-2:2020</u>, Radiological protection - Minimum criteria for electron paramagnetic resonance (EPR) spectroscopy for retrospective dosimetry of ionizing radiation - Part 2: Ex vivo human tooth enamel dosimetry, \$138.00

PLASTICS (TC 61)

ISO 10350-2:2020, Plastics - Acquisition and presentation of comparable single-point data - Part 2: Long-fibre-reinforced plastics, \$68.00

ROAD VEHICLES (TC 22)

<u>ISO 1585:2020</u>, Road vehicles - Engine test code - Net power, \$162.00

RUBBER AND RUBBER PRODUCTS (TC 45)

ISO 2000:2020, Rubber, raw natural - Guidelines for the specification of technically specified rubber (TSR), \$45.00

ISO 4652:2020, Rubber compounding ingredients - Carbon black -Determination of specific surface area by nitrogen adsorption methods - Single-point procedures, \$103.00

SHIPS AND MARINE TECHNOLOGY (TC 8)

ISO 21562:2020, Ships and marine technology - Bunker fuel mass flow meters on receiving vessel - Requirements, \$103.00

TEXTILES (TC 38)

<u>ISO 2647:2020</u>, Wool - Determination of percentage of medullated fibres by the projection microscope, \$45.00

TRADITIONAL CHINESE MEDICINE (TC 249)

ISO 22258:2020, Traditional Chinese medicine - Determination of pesticide residues in natural products by gas chromatography, \$103.00

TRANSPORT INFORMATION AND CONTROL SYSTEMS (TC 204)

ISO 22738:2020, Intelligent transport systems - Localized communications - Optical camera communication, \$138.00

ISO Technical Reports

TRANSPORT INFORMATION AND CONTROL SYSTEMS (TC 204)

ISO/TR 21724-1:2020. Intelligent transport systems - Common Transport Service Account Systems - Part 1: Framework and use cases. \$162.00

ISO Technical Specifications

AGRICULTURAL FOOD PRODUCTS (TC 34)

ISO/TS 23942:2020. Determination of hydroxytyrosol and tyrosol content in extra virgin olive oils - Reverse phase high performance liquid chromatography (RP-HPLC), \$68.00

CYCLES (TC 149)

ISO/TS 4210-10:2020, Cycles - Safety requirements for bicycles - Part 10: Safety requirements for electrically power assisted cycles (EPACs), \$232.00

ISO/IEC JTC 1, Information Technology

<u>ISO/IEC 10373-6:2020.</u> Cards and security devices for personal identification - Test methods - Part 6: Contactless proximity objects, \$232.00

<u>ISO/IEC 14443-2:2020</u>, Cards and security devices for personal identification - Contactless proximity objects - Part 2: Radio frequency power and signal interface, \$185.00

IEC Standards

INDUSTRIAL-PROCESS MEASUREMENT AND CONTROL (TC 65)

<u>IEC 62443-4-1 Ed. 1.0 b:2018</u>, Security for industrial automation and control systems - Part 4-1: Secure product development lifecycle requirements, \$317.00

NUCLEAR INSTRUMENTATION (TC 45)

<u>IEC 61031 Ed. 2.0 en:2020</u>, Nuclear facilities - Instrumentation and control systems - Design, location and application criteria for installed area gamma radiation dose rate monitoring equipment for use during normal operation and anticipated operational occurrences, \$164.00

IEC Technical Reports

POWER SYSTEM CONTROL AND ASSOCIATED COMMUNICATIONS (TC 57)

<u>IEC/TR 61850-90-12 Ed. 2.0 en:2020</u>, Communication networks and systems for power utility automation - Part 90-12: Wide area network engineering guidelines, \$410.00

IEC Technical Specifications

NANOTECHNOLOGY STANDARDIZATION FOR ELECTRICAL AND ELECTRONIC PRODUCTS AND SYSTEMS (TC 113)

IEC/TS 62607-6-13 Ed. 1.0 en:2020, Nanomanufacturing - Key control characteristics - Part 6-13: Graphene powder - Oxygen functional group content: Boehm titration method, \$235.00

Registration of Organization Names in the United States

The Procedures for Registration of Organization Names in the United States of America (document ISSB 989) require that alphanumeric organization names be subject to a 90-day Public Review period prior to registration. For further information, please contact the Registration Coordinator at (212) 642-4975.

The following is a list of alphanumeric organization names that have been submitted to ANSI for registration. Alphanumeric names appearing for the first time are printed in bold type. Names with confidential contact information, as requested by the organization, list only public review dates.

PUBLIC REVIEW

Southern California Edison (SCE)
Public Review Ends: August 28, 2020

NOTE: Challenged alphanumeric names are underlined. The Procedures for Registration provide for a challenge process, which follows in brief. For complete details, see Section 6.4 of the Procedures.

A challenge is initiated when a letter from an interested entity is received by the Registration Coordinator. The letter shall identify the alphanumeric organization name being challenged and state the rationale supporting the challenge. A challenge fee shall accompany the letter. After receipt of the challenge, the alphanumeric organization name shall be marked as challenged in the Public Review list. The Registration Coordinator shall take no further action to register the challenged name until the challenge is resolved among the disputing parties.

Proposed Foreign Government Regulations

Call for Comment

U.S. manufacturers, exporters, regulatory agencies and standards developing organizations may be interested in proposed foreign technical regulations notified by Member countries of the World Trade Organization (WTO). In accordance with the WTO Agreement on Technical Barriers to Trade (TBT Agreement), Members are required to notify proposed technical regulations that may significantly affect trade to the WTO Secretariat in Geneva, Switzerland. In turn, the Secretariat issues and makes available these notifications. The purpose of the notification requirement is to provide global trading partners with an opportunity to review and comment on the regulations before they become final.

The USA Inquiry Point for the WTO TBT Agreement is located at the National Institute of Standards and Technology (NIST) in the Standards Coordination Office (SCO). The Inquiry Point distributes the notified proposed foreign technical regulations (notifications) and makes the associated full-texts available to U.S. stakeholders via its online service, Notify U.S. Interested U.S. parties can register with Notify U.S. to receive e-mail alerts when notifications are added from countries and industry sectors of interest to them.

To register for Notify U.S., please visit http://www.nist.gov/notifyus/.

The USA WTO TBT Inquiry Point is the official channel for distributing U.S. comments to the network of WTO TBT Enquiry Points around the world. U.S. business contacts interested in commenting on the notifications are asked to review the comment guidance available on Notify U.S. at https://tsapps.nist.gov/notifyus/data/guidance/guidance.cfm prior to submitting comments.

For further information about the USA TBT Inquiry Point, please

https://www.nist.gov/standardsgov/what-we-do/trade-regulatory-programs/usa-wto-tbt-inquiry-point

Contact the USA TBT Inquiry Point at:(301) 975-2918; Fax: (301) 926-1559; E-mail: <u>usatbtep@nist.gov</u> or <u>notifyus@nist.gov</u>.

Information Concerning

American National Standards

Call for Members

INCITS Executive Board – ANSI Accredited SDO and US TAG to ISO/IEC JTC 1, Information Technology

The InterNational Committee for Information Technology Standards (INCITS), an ANSI accredited SDO, is the forum of choice for information technology developers, producers and users for the creation and maintenance of formal de jure IT standards. INCITS' mission is to promote the effective use of Information and Communication Technology through standardization in a way that balances the interests of all stakeholders and increases the global competitiveness of the member organizations.

The INCITS Executive Board serves as the consensus body with oversight of its 40+ Technical Committees. Additionally, the INCITS Executive Board has the international leadership role as the US Technical Advisory Group (TAG) to ISO/IEC JTC 1, Information Technology.

Membership in the INCITS Executive Board is open to all directly and materially affected parties in accordance with INCITS membership rules. To find out more about participating on the INCITS Executive Board, contact Jennifer Garner at jgarner@itic.org or visit http://www.incits.org/participation/membership-info for more information.

Membership in all interest categories is always welcome; however, the INCITS Executive Board seeks to broaden its membership base in the following categories:

- Service Providers
- Users
- Standards Development Organizations and Consortia
- Academic Institutions

Society of Cable Telecommunications ANSI Accredited Standards Developer

SCTE, an ANSI-accredited SDO, is the primary organization for the creation and maintenance of standards for the cable telecommunications industry. SCTE's standards mission is to develop standards that meet the needs of cable system operators, content providers, network and customer premises equipment manufacturers, and all others who have an interest in the industry through a fair, balanced and transparent process.

SCTE is currently seeking to broaden the membership base of its consensus bodies and is interested in new members in all membership categories to participate in new work in fiberoptic networks, advanced advertising, 3D television, and other important topics. Of particular interest is membership from the content (program and advertising) provider and user communities.

Membership in the SCTE Standards Program is open to all directly a materially affected parties as defined in SCTE's membership rules and operating procedures. More information is available at www.scte.org or by e-mail from standards@scte.org.

ANSI Accredited Standards Developers

Approval of Accreditation as an ANSI ASD Custom Electronics Design and Installation Association (CEDIA)

ANSI's Executive Standards Council has approved the Custom Electronics Design and Installation Association (CEDIA) an ANSI member, as an ANSI Accredited Standards Developer (ASD) under its proposed operating procedures for documenting consensus on CEDIA-sponsored American National Standards, effective July 28, 2020. For additional information, please contact: Mr. Walt Zerbe, Sr. Director, Technology & Standards, CEDIA, 8475 Nightfall Lane, Fishers, IN 46037; phone: 800.669.5329; e-mail: wzerbe@cedia.org.

Approval of Reaccreditation

PMMI – The Association for Packaging and Processing Technologies

ANSI's Executive Standards Council has approved the reaccreditation of PMMI - The Association for Packaging and Processing Technologies, an ANSI Member and Accredited Standards Developer, under its recently revised operating procedures for documenting consensus on PMMI-sponsored American National Standards, effective July 29, 2020. For additional information, please contact: Mr. Fred Hayes, PMMI - The Association for Packaging and Processing Technologies, 12930 Worldgate Drive, Suite 200, Herndon, VA 20170-6037; phone: 269.781.6567; e-mail: fhayes@pmmi.org.

Robotic Industries Association (RIA)

ANSI's Executive Standards Council has approved the reaccreditation of the Robotic Industries Association (RIA), an ANSI Member and Accredited Standards Developer, under its recently revised operating procedures for documenting consensus on RIA-sponsored American National Standards, effective July 28, 2020. For additional information, please contact: Ms. Carole Franklin, Director of Standards Development, Robotic Industries Association, 900 Victors Way, Suite 140, Ann Arbor, MI 48108; phone: 734.994.6088; e-mail: cfranklin@robotics.org.

International Organization for Standardization (ISO)

Establishment of ISO Technical Committee

ISO/TC 330 - Surfaces with Biocidal and Antimicrobial Properties

A new ISO Technical Committee, ISO/TC 330 - Surfaces with biocidal and antimicrobial properties, has been formed. The Secretariat has been assigned to France (AFNOR).

ISO/TC 330 operates under the following scope:

Standardization of test methods used to assess the biocidal performance and efficacy of any surfaces with antimicrobial activities, including their compatibility with different families of disinfectants and cleaning agents. Such methods aim at evaluating the biocidal activity (i.e. that which irreversibly inactivates microorganism) and at differentiating it from the biostatic activity (i.e. the inhibition of the growth of microorganisms).

The field covers the assessment of surfaces displaying intrinsic biocidal properties and of surfaces processed by any means so as to deliver biocidal properties under normal environmental conditions for human beings The field targets only surfaces, regardless of their final use.

Areas of interest include medical and veterinary applications, aerospace, agriculture, food, hygiene and other industrial fields, institutional and domestic applications.

Excluded: Toxicological and ecotoxicological surface testing methods, disinfection processes, antimicrobial activities of textile and porous products (including footwear), photocatalysis and nanotechnologies. component and not a material, which can be directly used in electric vehicles, digital cameras, electric motorcycles, etc.

Organizations interested in serving as the U.S. TAG Administrator or participating on the U.S. TAG should contact ANSI's ISO Team (isot@ansi.org).

ISO/TC 331 - Biodiversity

A new ISO Technical Committee, ISO/TC 331 - Biodiversity, has been formed. The Secretariat has been assigned to France (AFNOR).

ISO/TC 331 operates under the following scope:

Standardization in the field of Biodiversity to develop requirements, principles, framework, guidance and supporting tools in a holistic and global approach for all relevant organizations, to enhance their contribution to Sustainable Development.

Excluded: standardization of test and measurement methods for ecological quality of water, air, soil and marine environment.

Organizations interested in serving as the U.S. TAG Administrator or participating on the U.S. TAG should contact ANSI's ISO Team (isot@ansi.org).

ISO/TC 332 - Security Equipment for Financial Institutions

A new ISO Technical Committee, ISO/TC 332 - Security equipment for financial institutions, has been formed. The Secretariat has been assigned to India (BIS).

ISO/TC 332 operates under the following scope:

Standardization in the field of safes, cash boxes, strong room doors and safe deposit locker cabinets, ventilation equipment for strong room used in banks, financial institutions and commercial organization etc.

The standards formulated by this technical committee deals with specification and test methods of physical security products used in banks, financial institutions, commercial organization and by jewelers.

Excluded are the fields covered by ISO/TC 68 (Financial services).

Organizations interested in serving as the U.S. TAG Administrator or participating on the U.S. TAG should contact ANSI's ISO Team (isot@ansi.org).

ISO/TC 333 - Lithium

A new ISO Technical Committee, ISO/TC 333 - Lithium, has been formed. The Secretariat has been assigned to China (SAC).

ISO/TC 333 operates under the following scope:

Standardization in the field of lithium mining, concentration, extraction, separation and conversion to useful lithium compounds/materials (including oxides, salts, metals, master alloys, lithium-ion battery materials, etc.) The work program includes terminology, technical conditions of delivery to overcome transport difficulties, unified testing and analysis methods to improve the general quality of lithium products.

Excluded: Battery

Note: Battery is a component and not a material, which can be directly used in electric vehicles, digital cameras, electric motorcycles, etc.

Organizations interested in serving as the U.S. TAG Administrator or participating on the U.S. TAG should contact ANSI's ISO Team (isot@ansi.org).

ISO Proposal for a New Field of ISO Technical Activity

Reference Materials

Comment Deadline: August 14, 2020

For a number of years, ISO has had a policy development committee named ISO REMCO which has developed a series of ISO Guides for Reference Materials. Recently, the ISO/TMB noted that most, if not all, ISO REMCO Guides should be issued as ISO standards rather than ISO Guides by the nature of their content and intended user community, Therefore, the agreement of ISO REMCO, the ISO/TMB is proposal this new ISO TC on Reference Materials, which is essentially the conversion of ISO REMCO into a TC, with the following scope statement:

Standardization in the competent production and use of reference materials, including the concepts, terms and definitions related to reference materials.

Anyone wishing to review the proposal can request a copy by contacting ANSI's ISO Team (isot@ansi.org), with a submission of comments to Steve Cornish (scornish@ansi.org) by close of business on Friday, August 14, 2020.

New Secretariats

ISO/TC 67/SC 4 – Drilling and production equipment

Comment Deadline: August 14, 2020

NACE International has notified ANSI of their intent to relinquish the responsibilities of the ISO/TC 67/SC 4 secretariat. As a result of the U.S. TAG consultation the American Petroleum Institute is willing to assume the secretariat responsibilities and this transfer is supported by the U.S. TAG.

ISO/TC 67/SC 4 operates under the following scope:

Development of standards in the field of Drilling and production equipment within the scope of ISO/TC 67:

Standardization of the materials, equipment and offshore structures used in the drilling, production, transport by pipelines and processing of liquid and gaseous hydrocarbons within the petroleum, petrochemical and natural gas industries.

Excluded:

Aspects of offshore structures subject to IMO requirements (ISO/TC 8).

Organizations wishing to comment on the delegation of the responsibilities should contact ANSI's ISO Team (isot@ansi.org).

Information Concerning

International Standards

Call for Members

Meeting Notice and Call for Members for the New INCITS Technical Committee on *Quantum Computing* (US TAG to JTC 1/WG 14 – Quantum Computing)

Organizational Meeting – August 21, 2020. The organizational meeting of the INCITS/Quantum Computing will be held electronically via Zoom on August 21, 2020 (12:00 PM to 4:00 PM (Eastern) / 9:00 AM to 1:00 PM (Pacific)). The agenda, related documents and instructions for joining the Zoom meeting will be distributed on August 7 to organizational representatives that have requested membership on the new committee. RSVPs for the meeting should be submitted to Bill Ash (bash@itic.org) as soon as possible.

Background on Establishment of INCITS/Quantum Computing – At the June 16-17, 2020 INCITS Executive Board meeting, a new Technical Committee, INCITS/Quantum Computing, was established to serve as the US TAG to JTC 1/WG 14 on Quantum Computing that was formed at the June 2020 ISO/IEC JTC 1 Plenary:

Terms of Reference:

- 1. Serve as a focus of and proponent for JTC 1's standardization program on Quantum Computing. Identify gaps and opportunities in Quantum Computing standardization.
- 2. Develop and maintain a list of existing Quantum Computing standards produced and standards development projects underway in ISO/TCs, IEC/TCs and JTC 1.
- 3. Develop deliverables in the area of Quantum Computing.
- 4. As a systems integration entity, maintain relationships with other ISO and IEC/TCs and other organizations that are involved in Quantum Computing standardization.

JTC 1/WG 14 will include in its reports to JTC 1, a list of Quantum Computing standardization activities.

JTC 1 assigns the approved work item resulting from the approval of NP 4879, Quantum computing – Terminology and vocabulary, to JTC 1/WG 14.

Convenor: Hong Yang (China)

The committee will operate under the ANSI-accredited procedures for the InterNational Committee for Information Technology Standards (INCITS); (see INCITS Organization, Policies and Procedures). Additional information can also be found at http://www.INCITS.org and http://www.incits.org/participation/membership-info.

US experts to JTC 1/WG 14 Quantum Computing must be members of the US TAG, INCITS/Quantum Computing. The first two-years of membership (FY 2020 and FY 2021) on INCITS/Quantum Computing will be free – participation is available at no cost. Regular service fees will be assessed starting FY 2022.

The complete meeting notice and membership information can be found at https://standards.incits.org/apps/group public/document.php?document id=120950&wg abbrev =eb.

Information Concerning

International Organization for Standardization (ISO) ISO Proposal for a New Field of ISO Technical Activity Laboratory Design

Comment Deadline: August 14, 2020

SAC, the ISO member body for China, has submitted to ISO a proposal for a new field of ISO technical activity on Laboratory Design, with the following scope statement:

Standardization in the field of laboratory design including site selection, design of internal layout of space and services with the objective to provide functional, safe, energy efficient and sustainable laboratories taking into account environmental impact, the practical division of experimental and support areas and layouts plus model selection of laboratory furniture. It includes standardization of apparatus and devices for personal safety aspects that are an integral part of the laboratory. Design of devices and apparatus for experiment purposes covered by ISO/TC 48 as well as design of measuring instruments are excluded from the scope.

Excluded:

- ISO/TC 48 (laboratory equipment);
- ISO/TC 212 (Clinical laboratory testing and in vitro diagnostic test systems);
- CASCO:
- IEC/TC 66 (Safety of measuring, control and laboratory equipment);
- ISO/TC 209 (Clean rooms).

Note:

Once the new TC is established, liaisons with other relevant ISO technical committees will be established, including:

- ISO/TC 48 (laboratory equipment);
- ISO/TC 212 (Clinical laboratory testing and in vitro diagnostic test systems);
- CASCO;
- ISO/TC 136 (Furniture);

- ISO TC 307 (Blockchain and distributed ledger technologies);
- ISO/TC 159 (Ergonomics);

as well as relevant IEC technical committees:

- IEC/TC 64 (Electrical installations and protection against electric shock);
- IEC/TC 81 (Lightning protection);
- IEC/TC 85 (Measuring equipment for electrical and electromagnetic quantities);
- IEC/TC 45 (Nuclear instrumentation);
- IEC/TC 62 (Electrical equipment in medical practice);
- IEC/TC 65 (Industrial-process measurement, control and automation);
- IEC/TC 76 (Optical radiation safety and laser equipment);
- IEC/TC 104 (Environmental conditions, classification and methods of test);
- and ISO/IEC JTC 1 (Information technology).

Anyone wishing to review the proposal can request a copy by contacting ANSI's ISO Team (<u>isot@ansi.org</u>), with a submission of comments to Steve Cornish (<u>scornish@ansi.org</u>) by close of business on Friday, August 14, 2020.



American National Standards (ANS) – Where to find Procedures, Guidance, Interpretations and More...

Please visit ANSI's website (<u>www.ansi.org</u>) for resources that will help you to understand, administer and participate in the American National Standards (ANS) process. Documents posted at these links are updated periodically as new documents and guidance are developed, whenever ANS-related procedures are revised, and routinely with respect to lists of proposed and approved ANS. The main ANS-related link is <u>www.ansi.org/asd</u> and here are some direct links as well as highlights of information that is available:

- ANSI Essential Requirements: Due process requirements for American National Standards (always current edition): www.ansi.org/essentialrequirements
- ANSI Standards Action (weekly public review announcements of proposed ANS and standards developer accreditation applications, listing of recently approved ANS, and proposed revisions to ANS-related procedures): www.ansi.org/standardsaction
- Accreditation information for potential developers of American National Standards (ANS): www.ansi.org/sdoaccreditation
- ANS Procedures, ExSC Interpretations and Guidance (including a slide deck on how to participate in the ANS process and the BSR-9 form): www.ansi.org/asd
- Lists of ANSI-Accredited Standards Developers (ASDs), Proposed ANS and Approved ANS: www.ansi.org/asd
- American National Standards Key Steps: <u>www.ansi.org/anskeysteps</u>
- American National Standards Value: <u>www.ansi.org/ansvalue</u>
- ANS Web Forms for ANSI-Accredited Standards Developers PINS, BSR8 | 108, BSR11, Technical Report: www.ansi.org/PSAWebForms
- Information about standards Incorporated by Reference (IBR): www.ansi.org/ibr
- ANSI Education and Training: <u>www.standardslearn.org</u>

If you have a question about the ANS process and cannot find the answer quickly, please send an email to psa@ansi.org.

Please also visit Standards Boost Business at <u>www.standardsboostbusiness.org</u> for resources about why standards matter, testimonials, case studies, FAQs and more.

If you are interested in purchasing an American National Standard, please visit https://webstore.ansi.org/



BSR/ASHRAE Addendum f to ANSI/ASHRAE Standard 55-2017

Public Review Draft

Proposed Addendum f to Standard 55-2017, Thermal Environmental Conditions for Human Occupancy

First Public Review (July 2020) (Draft shows Proposed Changes to Current Standard)

This draft has been recommended for public review by the responsible project committee. To submit a comment on this proposed standard, go to the ASHRAE website at www.ashrae.org/standards-research--technology/public-review-drafts and access the online comment database. The draft is subject to modification until it is approved for publication by the Board of Directors and ANSI. Until this time, the current edition of the standard (as modified by any published addenda on the ASHRAE website) remains in effect. The current edition of any standard may be purchased from the ASHRAE Online Store at www.ashrae.org/bookstore or by calling 404-636-8400 or 1-800-727-4723 (for orders in the U.S. or Canada).

This standard is under continuous maintenance. To propose a change to the current standard, use the change submittal form available on the ASHRAE website, www.ashrae.org.

The appearance of any technical data or editorial material in this public review document does not constitute endorsement, warranty, or guaranty by ASHARE of any product, service, process, procedure, or design, and ASHRAE expressly disclaims such.

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ASHRAE, 1791 Tullie Circle, NE, Atlanta GA 30329-2305

BSR/ASHRAE Addendum f to ANSI/ASHRAE Standard 55-2017, *Thermal Environmental Conditions for Human Occupancy*First Public Review Draft

(This foreword is not part of this standard. It is merely informative and does not contain requirements necessary for conformance to the standard. It has not been processed according to the ANSI requirements for a standard and may contain material that has not been subject to public review or a consensus process. Unresolved objectors on informative material are not offered the right to appeal at ASHRAE or ANSI.)

FOREWORD

This proposed addendum removes the prohibition against applying the adaptive model described in Section 5.4 for Occupant-Controlled Naturally Conditioned Spaces in spaces that have an air conditioning system installed. It preserves the prohibition against running the air conditioning to achieve conditions in the space that satisfy the adaptive model. This proposed addendum also editorially modifies Sections 7.2.2.2 and L1.1 to achieve consistent terminology. These changes are being made given supporting data from the new ASHRAE Comfort Database II. See supporting research in "Parkinson, Thomas & de Dear, Richard & Brager, Gail. (2020). Nudging the adaptive thermal comfort model. Energy and Buildings. 206. 10.1016/j.enbuild.2019.109559".

[Note to Reviewers: This addendum makes proposed changes to the current standard. These changes are indicated in the text by <u>underlining</u> (for additions) and <u>strikethrough</u> (for deletions) except where the reviewer instructions specifically describe some other means of showing the changes. Only these changes to the current standard are open for review and comment at this time. Additional material is provided for context only and is not open for comment except as it relates to the proposed changes.]

Addendum f to 55-2017

Modify Section 5.4 as follows:

- **5.4 Determining Acceptable Thermal Conditions in Occupant-Controlled Naturally Conditioned Spaces** (Adaptive Model)
- **5.4.1 Applicability.** This method defines acceptable thermal environments only for occupant-controlled naturally conditioned spaces that meet all of the following criteria:
- a. There is no mechanical cooling system (e.g., refrigerated air conditioning, radiant cooling, or desiccant cooling) installed. No or heating system is in operation.
- b. Representative occupants have metabolic rates ranging from 1.0 to 4.31.5 met.
- c. Representative occupants are free to adapt their clothing to the indoor and/or outdoor thermal conditions within a range at least as wide as 0.5 to 1.0 clo.
- d. The prevailing mean outdoor temperature is greater than 10°C (50°F) and less than 33.5°C (92.3°F).

Modify Section 7.2.2.2 as follows. The remainder of Section 7.2.2.2 is unchanged.

7.2.2.2 Occupant-Controlled Naturally Conditioned Spaces. Section 5.4 prescribes the use of the adaptive model for determining the comfort zone boundaries. [...]

Modify Informative Appendix L Section L1.1b as follows. The remainder of Section L1.1 is unchanged.

L1.1 Overview of Comfort Prediction Using Physical Measurements. [...]

b. In the adaptive <u>model</u> <u>method</u>, used for naturally ventilated spaces, environmental measurements are linked to satisfaction through an empirical model in which the prevailing mean air outdoor temperature determines the

BSR/ASHRAE Addendum f to ANSI/ASHRAE Standard 55-2017, *Thermal Environmental Conditions for Human Occupancy*First Public Review Draft

position of percent satisfied contours bordering the comfort zone. Section 5.4 defines prevailing mean outdoor air temperature. Local discomfort limits are not used in the adaptive <u>model</u> <u>method</u>.



BSR/ASHRAE Addendum g to ANSI/ASHRAE Standard 154-2016

Public Review Draft Proposed Addendum *g* to Standard 154-2016, Ventilation for Commercial Cooking Operations

First Public Review (July 2020) (Draft shows Proposed Changes to Current Standard)

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BSR/ASHRAE Addendum g to ANSI/ASHRAE Standard 154-2016, Ventilation for Commercial Cooking Operations First Public Review

(This foreword is not part of this standard. It is merely informative and does not contain requirements necessary for conformance to the standard. It has not been processed according to the ANSI requirements for a standard and may contain material that has not been subject to public review or a consensus process. Unresolved objectors on informative material are not offered the right to appeal at ASHRAE or ANSI.)

FOREWORD

Balancing dampers for kitchen hoods is approved for publication. The definition of the device is required.

[Note to Reviewers: This addendum makes proposed changes to the current standard. These changes are indicated in the text by <u>underlining</u> (for additions) and <u>strikethrough</u> (for deletions) except where the reviewer instructions specifically describe some other means of showing the changes. Only these changes to the current standard are open for review and comment at this time. Additional material is provided for context only and is not open for comment except as it relates to the proposed changes.]

3. DEFINITIONS

. . .

baffle filter: see grease removal device.

balancing damper: a mechanical device located in a duct that is intended to regulate airflow.

capture area: the area within an exhaust hood that contains cooking effluent until it is exhausted.



BSR/ASHRAE Addendum *h* to ANSI/ASHRAE Standard 154-2016

Public Review Draft Proposed Addendum *h* to Standard 154-2016, Ventilation for Commercial Cooking Operations

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FOREWORD

This addendum brings consistency and coherence with IMC 2018 language. It is an energy conservation measure supported by ASHRAE 90.1 for kitchen Exhaust Systems section concerning demand ventilation systems.

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5. EXHAUST SYSTEMS

•••

5.3 Airflow Performance

5.3.1 ...

5.3.2 Lower exhaust airflow than that required for full-load cooking conditions is permitted during <u>partial load cooking and</u> no-load cooking conditions, where engineered controls or listed multispeed or variable-speed controls automatically operate the exhaust system to maintain capture and removal of cooking effluents.



BSR/ASHRAE Addendum *i* to ANSI/ASHRAE Standard 154-2016

Public Review Draft Proposed Addendum *i* to Standard 154-2016, Ventilation for Commercial Cooking Operations

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FOREWORD

Examples of fan types in the parenthesis is not a requirement for the purpose of this section, where such examples and descriptions are detailed in the new Appendix E. The exception is removed because current codes require fan listing for the application, and this requirement is added to the script of the section.

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5. EXHAUST SYSTEMS

•••

5.4 Fans

5.4.1 ...

5.4.2 Exhaust fans (up-blast, in-line, utility-set or high-plume fans) serving Type I hoods shall be <u>listed for the application and</u> capable of handling hot, grease-laden air and flare-up conditions. Fans shall be designed to contain and properly drain grease removed from the airstream. The fan housing or scroll that contains the grease shall be fully welded so that it is liquid tight. The fan impeller shall be <u>of self-cleaning design</u> designed to be easily cleanable and minimize build-up of grease and creosote.

Exception: Fans that are listed to UL 705, Standard for Power Ventilators,15 and UL 762, Outline of Investigation for Power Roof Ventilators for Restaurant Exhaust Applications.16



BSR/ASHRAE Addendum j to ANSI/ASHRAE Standard 154-2016

Public Review Draft Proposed Addendum *j* to Standard 154-2016, Ventilation for Commercial Cooking Operations

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FOREWORD

Grease ducts for kitchen exhaust must be liquid-tight per building codes (IMC, NFPA 96, UMC) and must be tested to meet this requirement. It is the position of this committee and IKECA that the Water Test should be the method of execution to be conclusive as experience shows the alternate Light Test was not as effective to determine leak locations and carries high level of uncertainty.

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5. EXHAUST SYSTEMS

5.1 Duct Systems...

. . .

5.2 Duct Leakage Testing

- **5.2.1** Prior to the use or concealment of any portion of a grease duct system, a leakage test shall be performed to determine that all welded joints and seams are liquid tight. The leakage test shall consist of a light test, water pressure test, or an approved equivalent test. Ducts shall be considered to be concealed where installed in shafts or covered by coating or wraps that prevent the ductwork from being visually inspected on all sides. The permit holder shall be responsible to provide for providing the necessary equipment and for performing the test perform the grease duct leakage test. A water spray test shall be performed to determine that all welded joints are liquid tight.
- **5.2.1.1 Light Test.** The light test shall be performed by passing a lamp having a power rating of not less than 100 W through the entire section of ductwork to be tested. The lamp shall be open so as to emit light equally in all directions per–pendicular to the duct walls. No light from the duct interior shall be visible through any exterior surface.
- 5.2.1.1 5.2.1.2 Water Test. The water test shall be performed by use of a pressure washer operating at a minimum of 1500 psi (10.34 kPa), simulating cleaning operations. The water shall be applied directly to all areas to be tested. No water applied to the duct interior shall be visible on any exterior surface in any volume during the test. A water test shall be performed by simulating a grease duct cleaning operation by use of a pressure washer that is designed for grease duct cleaning and that operates at a pressure of not less than 1200 psi. The water shall be applied directly to all areas to be tested. Water applied to the duct interior surfaces shall not be visible on any exterior surfaces of the duct during the test.



BSR/ASHRAE/IES Addendum a to ANSI/ASHRAE/IES Standard 100-2018

First Public Review Draft

Proposed Addendum a to Standard 100-2018, Energy Efficiency in Existing Buildings

First Public Review (July 2020)
(Draft shows Proposed Changes to Current Standard)

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FOREWORD

Section 6.3 of Standard 100-2018 sets out the overall requirement for the implementation of the O&M program. A minor revision to this section clarifies that Normative Annex L focuses on the process and procedures for establishing, as well as implementing, the O&M program.

Normative Annex L in Standard 100-2018 is based on Section 4, "Implementation," of ASHRAE/ACCA Standard 180-2012, Standard Practice for the Inspection and Maintenance of Commercial Building HVAC Systems. This section in Standard 180 presents an excellent outline of what constitutes a good maintenance program that would be applicable to all building systems. SSPC 100 decided to adopt Standard 180, Section 4, as the requirement for its O&M program requirements. Where Standard 180 refers to "HVAC systems," Normative Annex L in Standard 100 refers to "all building systems." Other than these changes, Normative Annex L is identical to Section 4 in Section 180-2012.

Since Standard 100-2018 was approved for publication, a revised edition of Standard 180 has been published. In the revised Standard 180-2018, Section 4, "Implementation," has been revised fairly extensively. This proposed addendum is to replace the existing Normative Annex L in Standard 100-2018 with a new one that is based on Section 4 of Standard 100-2018. This annex thus confirms SSPC 100's decision to base Standard 100's operations and maintenance requirements in Section 4 of Standard 180.

Note: This addendum makes proposed changes to the current standard. These changes are indicated in the text by <u>underlining</u> (for additions) and <u>strikethrough</u> (for deletions) except where the reviewer instructions specifically describe some other means of showing the changes. Only these changes to the current standard are open for review and comment at this time. Additional material is provided for context only and is not open for comment except as it relates to the proposed changes.

Addendum a to Standard 100-2018

Delete existing Normal Annex L. Replace with new Normative Annex L below.

NORMATIVE ANNEX L—OPERATIONS AND MAINTENANCE IMPLEMENTATION

Informative Note: This annex is based on Section 4, "Implementation," of ANSI/ASHRAE/ACCA Standard 180-2018, Standard Practice for the Inspection and Maintenance of Commercial Building HVAC Systems, with application to the operations and maintenance of all building systems.

L1. Introduction. This standard is intended to serve all segments of *building* ownership and all methods of delivering inspection and maintenance work. This standard applies to facilities with no maintenance program as well as facilities with state-of-the-art maintenance programs. Requirements are described in terms consistent with a minimum standard. Implementation methods chosen to achieve compliance with this standard are left to the responsible party and/or an authorized implementation partner. All parties may exceed these standard requirements as they see fit.

This standard is implemented by defining the party responsible for compliance and then defining a minimum maintenance program and the elements of the program. These program elements are described and defined to allow compliance to be achieved across the widest spectrum of owners and maintenance delivery systems as reasonably possible.

L2. Responsible Party. The building owner shall be responsible for meeting the requirements of this standard. The owner may designate other parties that shall be authorized and contractually obligated to fulfill the owner's responsibility.

- L3. Maintenance Program. There shall be a maintenance program that preserves the condition and capability of all building systems and equipment to enable each to provide the intended performance (e.g., thermal and visual comfort, energy efficiency, and indoor environmental quality) required for the facility. At a minimum, the maintenance program shall contain the elements in L3.1 through L6.2.
- L3.1. Inventory of Items to be Inspected and Maintained. All building systems and equipment that impact building envelope performance, thermal and visual comfort, energy efficiency, indoor environmental quality, and other services shall be listed in an equipment and component inventory of items to be inspected and maintained. This list shall include manufacturers' information, location, capacity, maintenance program identifier, and other data relevant to the equipment or component and agreed upon by the responsible party and implementing party.
- Maintenance Plan. A plan of inspection and maintenance work shall be established. The maintenance plan shall document the work to be accomplished at scheduled intervals on the inventory of work to be maintained. The maintenance plan shall be developed specifically for the size, design, scope, criticality, and complexity of the systems and equipment serving the facility. The plan shall describe each required task, the frequency of each task, and task schedule; identify the party responsible for performing the task; and specify the authorizing party, task completion documentation procedure, plan monitoring procedures, and procedures for evaluation and feedback.
 - L3.2.1 Minimum Required Inspection and Maintenance Tasks. The minimum required inspection and maintenance tasks shall be determined from codes, regulations, and manufacturers' recommendations. In any of the foregoing, all of the tasks that apply to the equipment or components in the maintenance program shall be included in the list of required inspection and maintenance tasks to comply with this standard.
 - L3.2.2 Inspection and Maintenance Task Frequencies. The baseline frequencies of inspections and maintenance tasks for equipment and systems shall be determined from the sources listed in L3.2.1. These frequencies are the minimum required for compliance.

Refer to L.6 for requirements for revising inspection and maintenance task frequencies.

<u>Informative Note:</u> Inspection serves to monitor and document the condition of equipment and components over time regarding appearance, functionality, and performance. Maintenance serves to preserve equipment and component condition and performance as required by the facility.

L3.2.3 Condition Indicators. Condition indicators for systems and equipment shall be developed. These indicators are measurements or observations of physical condition and delivery of thermal and visual comfort, indoor environmental quality, and energy efficiency that are learned during the performance of the related inspection tasks and compared to the condition standard. The comparisons serve to determine the level of degradation and subsequent responsive action. The responsible party and the maintenance program implementer shall mutually agree on the condition indicators and standards used in the maintenance program.

Informative Note: The intent of this standard is to (a) monitor changes in the condition indicators over time as a measure of the efficacy of the maintenance program in meeting performance objectives and (b) provide advance indication of pending equipment or component failures. Unacceptable condition indicators could lead to equipment failure or performance degradation. When condition indicators reach unacceptable levels, additional preservative or restorative action is required.

L3.2.4 Maintenance Program Objectives. Program objectives shall be established to define desired outcomes for the maintenance program for all building systems and equipment that impact building envelope performance, and that deliver required thermal and visual comfort, energy efficiency, and indoor environmental quality, and other services. Program objectives shall be measurable quantities that can be trended over time, and shall, when achieved define maintenance program success. Program objectives shall be based on responsible party requirements and operating procedures. The responsible party and the implementing party shall mutually agree on the program objectives. The program objective shall be documented. Status of program objectives shall be reviewed periodically.

Informative Note: The following sources may assist in establishing specific program objectives based on the basis of design and operational criteria specific to a particular system or component:

- a. Design documents for the building and its systems, with the provision that those documents still reflect the current loads, space utilization, and other system requirements.
- b. A duly licensed professional authorized to perform design work for the relevant system or component.
- c. Manufacturers' technical material or generally accepted industry criteria.
- d. Guidance from ASHRAE Standards 55, 62.1, and 90.1.
- e. Authorities having jurisdiction.
- f. Licensed contractor with expertise in the relevant system or component.
- g. Owner's program requirements.
- **L4. Maintenance Plan Authorization and Execution.** The maintenance plan shall be approved by the responsible party with concurrence by the implementing party. Approval shall authorize performing the work included in the plan.
 - **L4.1.** Inspection and maintenance tasks shall be performed on the established frequency or upon documented observance of an unacceptable condition. Whether or not authorized by written or verbal instructions, execution of the task shall be documented and archived for future reference.

Informative Note:

- 1. The maintenance plan shall include provisions for responding to unplanned inspection and maintenance events.
- 2. Response to discovery of unacceptable conditions found between task intervals shall require authorization to perform the required work with proper documentation. Good practice, once unacceptable conditions are found, is to take action to return equipment to its required condition or performance capability. The responsible party and the implementing party must agree on the resource requirements for the work.
- 3. Unplanned events where additional work beyond the scope of this standard is required, such as repair or replacement, may require additional approval, funding, or authorization action by the responsible party and the implementing party for the work to proceed.
- L5. Revision of the Maintenance Program and Maintenance Plan. The maintenance plan shall be capable of continuous improvement. Improvement in this context shall be manifest when changes in equipment condition or status, changes to the facility, or acquisition of new maintenance technology warrant review and revision of the maintenance plan. The intent of the standard is to enable tasks and/or frequencies to be changed in order to deliver proper preservative action in response to actual conditions.

Informative Note: The following list contains examples of changes to the facility, its components or operating systems, and equipment that require review of the maintenance plan:

- 1. Modifications to the *building* that impact system capacities or configuration.
- 2. Changes to *building* function or *building* use that impact the design intent or configuration of components or systems.
- 3. Changes to *building* systems or components.
- 4. One or more systems found incapable of achieving their design intent or owner requirements.
- 5. Documented, agreed upon recommendations from the responsible party or maintenance provider.
- 6. Miscellaneous changes:
 - a. Changes to equipment condition,
 - b. Changes to equipment status,
 - c. Changes to the facility,
 - d. Acquisition of new maintenance technology,
 - e. Revision to task frequencies in response to actual conditions shall result in improved condition or reduced inspection and maintenance work.
- L5.1. Degradation of Condition and Performance. Degradation of equipment condition or performance that is observed while performing scheduled inspection and maintenance tasks or on other occasions shall be

documented.

- **L5.2. Response to Changes.** Upon initial discovery or observation of the degraded state, the situation shall be resolved through appropriate corrective or preservative action. If preservative action cannot resolve the degraded status, then further action outside the scope of this standard may be required.
- L5.3. If unacceptable condition indicators or unacceptable performance are found on a system or component during two successive inspections, the maintenance plan and condition history of the system or component shall be reviewed to determine if the inspection frequency or the maintenance task frequency should be increased. Further, maintenance tasks should also be reviewed for improvement opportunities. Results of the review, and revisions to the maintenance plan, shall be documented and implemented.
- L5.4. If acceptable condition indicators or acceptable performance are observed during three successive inspections, the *maintenance* plan shall be reviewed for opportunities to reduce task frequencies or work procedures without comprising condition or performance. Revisions to task frequencies and work procedures shall be documented.
- L5.5. Climate-related or facility operational requirements may impact execution of the maintenance plan. These circumstances shall be reviewed along with the maintenance plan for opportunities to revise task frequencies or work procedures. Revisions to task frequencies and work procedures shall be documented.
 - Informative Note: Some of these circumstances may interrupt the delivery of inspection and maintenance care. These deferrals of the maintenance plan provide an opportunity to review existing inspection and maintenance tasks and frequencies and make appropriate adjustments considering the impact of the deferral. Each adjusted frequency shall be documented and include the reason for the adjustment.
- **L5.6.** Equipment Warranty. This standard's requirements shall not supersede equipment manufacturers' warranty terms and conditions and other guidance that may require different tasks or task frequencies.
- **L6. Program Review.** The responsible party and the implementing party shall periodically review the maintenance program. There shall be at least two formal review meetings between the responsible party and the implementing party, one at the beginning of the performance period and one at the end of the performance period.
- L6.1. Beginning Review. The responsible party and the implementing party shall define scope, expectations, and desired outcomes for the maintenance program. Initial review shall consist of developing program objectives, condition standards, and measures to be used to evaluate program performance that are mutually acceptable to the responsible party and the implementing party. These factors shall be established before the work commences. Creating performance objectives and condition standards ahead of implementation, both authorizing party and implementing party align expectations based on knowledge of the goals and evaluation measures established for the program and maintenance plan.
- L6.2. End Review. The end review shall consist of comparing maintenance program results with the program results and condition standards. The responsible party and the implementing party shall review the measurements and observations collected during the evaluation period. The actual results shall be compared to the program requirements, desired outcomes, and performance of *building* systems and components. The comparison shall serve to evaluate the maintenance program performance. The information shall be used to develop a plan for improving the maintenance program. Program improvement actions shall be mutually agreeable between the responsible party and the implementing party.

NENA Standards for 9-1-1 Professional Education

ANS Candidate NENA-STA-011.1-202X

Only **highlighted text** open for Public Review 2 comment. For reference only, entire draft is available **here**.

1 Executive Overview

Choosing a career path as a telecommunicator is a newer ambition because working in the 9-1-1 industry is a relatively new concept even compared with other positions within the public safety community. In just the last 30-years those in public safety have realized telecommunicators need interpersonal, technical, and stress-management skills to handle an extremely complicated and challenging job.

In recent years 9-1-1 industry experts have discussed the importance of the role of professional education for the position of telecommunicator. Across North America programs have emerged in high schools, vocational schools, and colleges in order to encourage suitable candidates to enter the 9-1-1 profession, and to expose them to what they can expect as a telecommunicator.

Existing programs use a variety of sources for material. Research shows that some use NENA, NFPA, or other standards to create a curriculum while others strongly base curriculum on policies, procedures, and protocols. A fair amount of 9-1-1 courses rely heavily on curriculum established by associations and/or vendors such as APCO or IAED/Priority Dispatch Inc.

NENA has identified a need to create a standard for 9-1-1 Professional Education. This standard will guide institutions that develop 9-1-1 Professional Education programs and ensure consistency by providing the minimum essential elements of a professional telecommunicator education program. This standard is not intended to guide 9-1-1 PSAPS/Agencies on their internal training programs, but for the institutions that are preparing candidates for the industry. The standard, as recommended in the appendices, recommends forty (40) hours of instruction covering roles and responsibilities of the Telecommunicator, and encourages an additional forty (40) hours in other related course work.

NENA assembled a committee of 9-1-1 professionals from diverse geographic areas to create this 9-1-1 Professional Education standard. This committee considered many sources of information such as NENA and NFPA standards, NCIC policies, NIMS practices, and existing telecommunicator certification programs.

Multiple career paths exist in the 9-1-1 industry. Various roles include telecommunicators, supervisors, managers, administrators, and technicians in the realm of operations, administration, radio systems, telephony systems, CAD, and GIS. The committee decided to focus the standard for the telecommunicator position and develop it for use as a template for other positions in the industry.

The committee believes a strong 9-1-1 Professional Education standard will benefit institutions offering 9-1-1 telecommunicator programs and the 9-1-1 industry as a whole. A 9-1-1 professional standard will expose students to the type of work performed by a telecommunicator and create a foundation of skills and knowledge that will better serve them and 9-1-1 centers. In a world that is just beginning to recognize and understand the role of a 9-1-1 telecommunicator, this standard legitimizes and validates the career path and assists in the development of 9-1-1 telecommunicators.

The 9-1-1 professionals that formed this committee and completed work for this NENA standard are pleased to provide this document for reference for the challenging task of building curriculum for a Telecommunicator education program. For the most comprehensive approach to creating a program, it is recommended that other professional standards are reviewed including APCO's ANS 3.103.2.2015 **Error! Reference source not found.**, *Minimum Training Standards for Public Safety Telecommunicators*, and NFPA 1061 [6], *Standard for Public Safety Telecommunications Personnel Professional Qualifications*.

2.2 Roles in a PSAP

Roles and Responsibilities of the Telecommunicator:

Telecommunicators (also known as emergency communications officers, telecommunications officers, or 9-1-1 dispatchers) receive calls from individuals who need assistance from firefighters, police officers, and emergency medical services, or any other public safety request. To provide the requisite knowledge, skills and abilities, each basic telecommunicator training program SHALL contain sufficient information to provide a clear understanding of the following essential elements contained in this section.

3 Recommended Reading and References

[6] National Fire Protection Association. Standard for Public Safety Telecommunications Personnel Professional Qualifications. NFPA 1061, approved November 30, 2017.

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Revision to NSF/ANSI 42-2019 Issue 106 Revision 1 (July 2020)

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NSF/ANSI Standards for Drinking Water Treatment Units

NSF/ANSI 42: Drinking Water Treatment Units – Aesthetic Effects

NSF/ANSI 53: Drinking Water Treatment Units — Health Effects

NSF/ANSI 244: Supplemental Microbiological Water Treatment Systems – Filtration

NSF/ANSI 401: Drinking Water Treatment Units – Emerging Compounds / Incidental Contaminants

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5.4 Structural integrity test methods.

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5.4.4 Cycle test.

Components downstream of the system on/off valve that are not subject to pressure under the off mode, and that either contain no media subject to plugging or are not designed to contain media, shall be exempt from the cyclic pressure test but shall be watertight in normal use. Components that are downstream of the system on/off valve but upstream of media subject to clogging shall meet the requirements of this section.

The following procedure shall be used for the cyclic testing:

- a) A water temperature of 20 ± 3 °C (68 ± 5 °F) shall be used throughout the test. The test water shall be adjusted to a temperature at which condensation will not form on the surface of the test unit.
- b) The inlet of the test system shall be connected to the test apparatus as shown in Figure 1. The system shall be in conformance with its normal state of use, with the option of plugging drain lines.
- c) The test system shall be filled with water and flushed to purge air from the system.
- d) The counter shall be set to zero, or its initial reading shall be recorded and pressure cycling initiated. The pressure rise shall be \geq 1 s and the pressure in the test unit shall return to < 14 kPa (2 psig) before the initiation of another cycle.

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e) The pressure shall be cycled as specified in Table 5.1. The system shall be inspected periodically through the end of the test period to check whether the system is watertight.

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Table 5.1 Structural integrity testing requirements

	Hydrostatic pressure test ¹	Cyclic pressure test ¹
Complete systems		
complete systems with pressure vessels having a diameter < 203 mm (8 in)	3 × maximum working pressure or 2,070 kPa (300 psig)	100,000 cycles at 0 to 1,040 kPa (0 to 150 psig) or maximum working pressure
complete systems with pressure vessels having a diameter ≥ 203 mm (8 in)	2.4 × maximum working pressure or 2,070 kPa (300 psig)	100,000 cycles at 0 to 1,040 kPa (0 to 150 psig) or maximum working pressure
complete systems designed for open discharge ²	1.5 x maximum working pressure or 1,040 kPa (150 psig)	10,000 cycles at 0 to 345 kPa (0 to 50 psig)
complete portable systems pressurized by user ³	1.5 × maximum working pressure	_
Components		
metallic pressure vessels having a diameter < 203 mm (8 in) ⁴	3 × maximum working pressure or 2,070 kPa (300 psig)	100,000 cycles at 0 to 1,040 kPa (0 to 150 psig) or maximum working pressure
metallic pressure vessels having a diameter ≥ 203 mm (8 in) ⁴	2.4 × maximum working pressure or 2,070 kPa (300 psig)	100,000 cycles at 0 to 1,040 kPa (0 to 150 psig) or maximum working pressure
nonmetallic pressure vessels having a diameter < 203 mm (8 in)	3 × maximum working pressure or 2,070 kPa (300 psig)	100,000 cycles at 0 to 1,040 kPa (0 to 150 psig) or maximum working pressure
nonmetallic pressure vessels having a diameter ≥ 203 mm (8 in)	2.4 × maximum working pressure or 2,070 kPa (300 psig)	100,000 cycles at 0 to 1,040 kPa (0 to 150 psig) or maximum working pressure
disposable pressure vessels and components	3 × maximum working pressure or 2,070 kPa (300 psig)	10,000 cycles at 0 to 1,040 kPa (0 to 150 psig) or maximum working pressure
valves and controls ⁵	3 × maximum working pressure or 2,070 kPa (300 psig)	100,000 cycles at 0 to 1,040 kPa (0 to 150 psig) or maximum working pressure

¹ When a choice is given in this table, testing shall be done at the greater pressure.

² Refer to Sections 5.4.2 and 5.4.4 for Components downstream of the system on/off valve that are not subject to pressure under the off mode, and that either contain no media subject to plugging or are not designed to contain media shall be exempt from the hydrostatic pressure test, but shall be watertight in normal use. Components that are downstream of the system on/off valve but upstream of media subject to clogging shall meet the requirements of this section.

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Table 5.1 Structural integrity testing requirements

	Hydrostatic pressure test ¹	Cyclic pressure test ¹	
³ Portable systems designed to utilize only atmospheric pressure or gravity flow shall be exempt from the hydrostatic pressure test, but shall be watertight in normal use.			
⁴ Metallic pressure vessels require measurement of circumference and head deflection. The pressure vessel circumference shall not exhibit a permanent increase of more than 0.2% when measured at the midsection and at 30 cm (12 in) intervals. The top and bottom head deflection of the pressure vessel shall not exhibit a permanent deflection exceeding 0.5% of the vessel diameter.			
⁵ Subject to line pressure and tested as	s separate components.		

Rationale: Added exemption for cyclic pressure testing for components downstream of the system on/off valve that are not subject to pressure under the off mode, and that either contain no media subject to plugging or are not designed to contain media per 2020 DWTU JC meeting discussion (May 13, 2020).

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NSF/ANSI Standard for Drinking Water Treatment Units –

Ultraviolet Microbiological Water Treatment Systems

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7.2.2.5.1 Systems with UV sensor and alarm set point

Sufficient PHBA shall be added to reduce UV light transmission to the alarm set point in of the device. For Class A devices, Ano less than the quantity of PHBA required to give a mean UV absorption of 0.155 per cm 0.3/cm (70% UVT) at 254 nm shall be used.

NOTE — Absorption = -log(%T/100) where %T is expressed as a percentage (70%). Refer to *Standard Methods for the Examination of Water and Wastewater*, Method 5910 UV Absorbing Organic Constituents.

7.2.2.5.2 Measurement of normal output for Class B systems without UV sensor and alarm set point

The following procedure shall be used to measure the normal output:

- a) Two bulb and ballast components identical to the system's bulb and ballast component shall be installed into a container coated with material that does not reflect UV radiation. The container shall be large enough to allow for measurement of the UV intensity at 1.0 m (3.3 ft).
- b) A regulated voltage source shall be set at the manufacturer's minimum recommended voltage.
- c) The lamp shall be operated for 100 h and record the intensity at 1.0 m (3.3 ft).
- d) The voltage to the lamps shall be reduced until the irradiance reaches 70% of normal output measured at 100 h. The voltage and intensity shall be recorded.
- e) The lower of the two voltage reductions shall be used to adjust the system to 70% of its normal output.

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7.3.1.5.2 Systems with UV sensor and alarm set point

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Sufficient UV absorbant shall be added to reduce UV light transmission to the alarm set point in of the device. For Class A devices, Ano less than the quantity of UV absorbant required to give a mean UV absorption of 0.30 0.155 per cm (70% UVT) at 254 nm shall be used.

NOTE — Absorption = -log(%T/100) where %T is expressed as a percentage (70%). Refer to *Standard Methods for the Examination of Water and Wastewater*, Method 5910 UV Absorbing Organic Constituents.

7.3.1.5.3 Configuring Class B systems without UV sensor and alarm set point for evaluation

Two methods are available to prepare a Class B system for evaluation. These methods both effectively simulate the UV source irradiance at end of life (70% of initial output at 100 hours). The procedure under Section 7.3.1.5.3.1 shall be the default procedure. Section 7.3.1.5.3.2 shall be utilized if the system is conducive to this procedure and is requested by the manufacturer.

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Rationale: Revised per 2020 DWTU JC meeting discussion (May 13, 2020). The maximum allowable UVT of 70% only applies to Class A systems. Class B systems are for supplemental treatment of a microbiologically safe water source for the reduction of nuisance bacteria only. Therefore, it should not be required to test a Class B sensor / alarm UV system with a UVT of 70% or less. If the system alarms at a higher UVT, the system should be tested at that higher UVT.

BSR/UL 331, Standard for Safety for Strainers for Flammable Fluids and Anhydrous **Ammonia**

- 1. Revisions to 10-Day Moist Ammonia-Air Stress Cracking Test
- 2. Clarifications to the Deformation Test

- PERFORMANCE

 18 10-Day Moist Ammonia-Air Stress Cracking Test

 18.1 After being subjected to the conditions described in 18.2 18.3, a pressure-confining brass part containing more than 15 percent zinc shall:
 - a) Show no evidence of cracking, delamination, or degradation; or
 - b) Perform as intended when tested as described in 18.4.

After being subjected to the conditions described in 18.2 - 18.4, a brass part containing more than 15 percent zinc shall show no evidence of cracking when examined using 25X magnification.

18.2 One test sample of each size is to be subjected to the physical stresses normally imposed on or within a part as the result of assembly with other components. Samples with female tapered pipe threads, intended to be used for installing the product in the field are to have the threads engaged and tightened to the torque specified in Table 13.2. Samples with female threads other than tapered pipe threads shall be torqued as specified by the manufacturer. Polytetrafluoethylene (PTFE) tape or pipe compound are not to be used on any threads. Samples with male threads are evaluated as received. Each test sample is to be subjected to the physical stresses normally imposed on or within a part as the result of assembly with other components. Such stresses are to be applied to the sample prior to and maintained during the test. Samples with threads, intended to be used for installing the product in the field, are to have the threads engaged and tightened to the torque specified in Table 13.2 Teflon tape or pipe compound are not to be used on the threads.

18.3 The samples are then to be tested in accordance with Apparatus, Reagents and Materials, Test Media, Test Sample Preparation, (9.3 – 9.4), and Test Procedure (10.1 – 10.4) of the Standard Test Method for Ammonia Vapor Test for Determining Susceptibility to Stress Corrosion Cracking in Copper Alloys, ASTM B858-06, except the pH level of the test solution shall be High 10.5 ±0.1 and the exposure temperature shall be 25 ±1°C. Three samples are to be degreased and then continuously exposed in a set position for ten days to a moist ammonia-air mixture maintained in a glass chamber approximately 12 by 12 by 12 inches (305 by 305 by 305 mm) having a glass cover.

18.4 After the exposure period, the samples are to be examined for cracks, delamination, and degradation using a microscope having a magnification of 25X. Pressure-confining parts exhibiting degradation as indicated in 18.1 as a result of the test exposure described in 18.2 and 18.3 shall withstand, without rupture, a hydrostatic test pressure of five times the rated pressure of the valve, for one minute. Approximately 600 ml (20.3 ounces) of aqueous ammonia having a specific gravity of 0.94 is to be maintained at the bottom of the glass chamber below the samples. The samples are to be positioned 1-1/2 inches (38.1 mm) above the aqueous ammonia solution and supported by an inert tray. The moist ammonia-air mixture in the chamber is to be maintained at atmospheric pressure and at a temperature of 34 ±2°C (93.2 ±3.6°F).

PERFORMANCE

13 Deformation and External-Leakage Test

- 13.2 Representative strainer assemblies are to be rigidly supported. Any bolts, pipe plugs, or threaded parts detached for care and servicing of the strainer are to be tightened with a torque wrench to the value specified in Table 13.1 or 13.2. Samples with threads other than those specified in Table 13.1 or 13.2 shall be torqued as specified by the manufacturer.
- 13.5 The strainer parts used for care and servicing of the strainer are then to be alternately removed and replaced 25 times, tightening each time with a torque wrench to the value specified in Table 13.1 or 13.2. Samples with threads other than those specified in Table 13.1 or 13.2 shall be torqued as specified by the manufacturer. The pressure test described in 13.4 is then to be repeated.
- 13.6 Any bolts or threaded parts used for care and servicing of the strainer are then to be tightened with a torque wrench to twice the value specified in Table 13.1 or 13.2. Samples with threads other than those specified in Table 13.1 or 13.2 shall be torqued to twice the value as specified by the manufacturer. The pressure test described in 13.4 is then to be repeated.

BSR/UL 331A, Standard for Safety for Strainers for Gasoline and Gasoline/Ethanol Blends with Nominal Ethanol Concentrations up to 85 Percent (E0 - E85)

- 1. Revisions to 10-Day Moist Ammonia-Air Stress Cracking Test
- 2. Clarifications to the Deformation Test
- 3. Revisions to add CE40a test fluid requirements

- PERFORMANCE

 15 10-Day Moist Ammonia-Air Stress Cracking Test

 15.1 After being subjected to the conditions described in 15.2 15.3, a pressure-contining brass part containing more than 15 percent zinc shall:
 - a) Show no evidence of cracking, delamination, or degradation; or
 - b) Perform as intended when tested as described in 15.4.

After being subjected to the conditions described in 15.2 - 15.4, a brass part containing more than 15 percent zinc shall show no evidence of cracking when examined using 25X magnification.

15.2 One test sample of each size is to be subjected to the physical stresses normally imposed on or within a part as the result of assembly with other components. Samples with female tapered pipe threads, intended to be used for installing the product in the field are to have the threads engaged and tightened to the torque specified in Table 12.2 . Samples with female threads other than tapered pipe threads shall be torqued as specified by the manufacturer. Polytetrafluoethylene (PTFE) tape or pipe compound are not to be used on any threads. Samples with male threads are evaluated as received. Each test sample is to be subjected to the physical stresses normally imposed on or within a part as the result of assembly with other components. Such stresses are to be applied to the sample prior to and maintained during the test. Samples with threads, intended to be used for installing the product in the field, are to have the threads engaged and tightened to the torque specified in Table 12.2 Teflon tape or pipe compound are not to be used on the threads.

15.3 The samples are then to be tested in accordance with Apparatus, Reagents and Materials, Test Media, Test Sample Preparation, (9.3 – 9.4), and Test Procedure (10.1 – 10.4) of the Standard Test Method for Ammonia Vapor Test for Determining Susceptibility to Stress Corrosion Cracking in Copper Alloys, ASTM B858-06, except the pH level of the test solution shall be High 10.5 ±0.1 and the exposure temperature shall be 25 ±1°C. Three samples are to be degreased and then continuously exposed in a set position for ten days to a moist ammonia-air mixture maintained in a glass chamber approximately 12 by 12 by 12 inches (305 by 305 by 305 mm) having a glass cover.

15.4 After the exposure period, the samples are to be examined for cracks, delamination, and degradation using a microscope having a magnification of 25X. Pressure-confining parts exhibiting degradation as indicated in 15.1 as a result of the test exposure described in 15.2 and 15.3 shall withstand, without rupture, Formatted: Default Paragraph Font, (Asian) Chinese (China), (Other) English (United States), Strikethrough

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a hydrostatic test pressure of five times the rated pressure of the valve, for one minute. Approximately 600 ml (20.3 ounces) of aqueous ammonia having a specific gravity of 0.94 is to be maintained at the bottom of the glass chamber below the samples. The samples are to be positioned 1-1/2 inches (38.1 mm) above the agueous ammonia solution and supported by an inert tray. The moist ammonia-air mixture in the chamber is to be maintained at atmospheric pressure and at a temperature of 34 ±2°C (93.2 ±3.6°F).

PERFORMANCE

12 Deformation and External-Leakage Test

- 12.2 Representative strainer assemblies are to be rigidly supported. Any bolts, pipe plugs, or threaded parts detached for care and servicing of the strainer are to be tightened with a torque wrench to the value specified in Table 12.1 or 12.2. Samples with threads other than those specified in Table 12.1 or 12.2 shall be torqued as specified by the manufacturer.
- 12.5 The strainer parts used for care and servicing of the strainer are then to be alternately removed and replaced 25 times, tightening each time with a torque wrench to the value specified in Table 12.1 or 12.2. Samples with threads other than those specified in Table 12.1 or 12.2 shall be torqued as specified by the manufacturer. The pressure test described in 12.4 is then to be repeated.
- 12.6 Any bolts or threaded parts used for care and servicing of the strainer are then to be tightened with a torque wrench to twice the value specified in Table <u>12.1</u> or<mark>√2.2</mark>. <u>Samples with threads other than those</u> specified in Table 12.1 or 12.2 shall be torqued to twice the value as specified by the manufacturer. The pressure test described in 13.4 is then to be repeated.

CONSTRUCTION

- 6 Materials
- 6.1 Metallic materials
- 6.1.1 General
- Not authorized for 6.1.1.1 A metallic part, in contact with the fuels anticipated by these requirements, shall be resistant to the action of the fuel if degradation of the material will result in leakage of the fuel or if it will impair the function of the device. For non-removable strainer assemblies for all fuel ratings covered by this standard, see Corrosion due to fluid, 6.1.2.1. For non-removable strainer assemblies rated for gasoline/ethanol blends with nominal ethanol concentrations greater than 25-40 percent, see Metallic materials - system level, 6.1.3. For removable strainer assemblies, the requirements in 6.1.2.1 and 6.1.3 do not apply.

6.1.3 Metallic materials - system level

6.1.3.1 Combinations of metallic materials in non-removable strainer assemblies rated for use with gasoline/ethanol blends with nominal ethanol concentrations greater than 25 40 percent shall be chosen to reduce degradation due to galvanic corrosion in accordance with 6.1.3.2 - 6.1.3.4.

PERFORMANCE

10 General

10.3 All tests shall be performed using the test fluids specified for that test. No substitution of test fluids is allowed. When the test indicates that CE25a, CE40a or CE85a are to be used, the test fluid shall be prepared as described in Supplement SA.

11 Long Term Exposure Test

11.1 General

11.1.1 The test outlined in 11.2 - 11.4 is to be performed on samples in accordance with 10.2 and 11.2. If the product is rated for use with gasoline or gasoline/ethanol blends with a nominal ethanol concentration of up to 25 percent (E0 - E25), then the test shall be performed using the CE25a test fluid. If the product is rated for use with gasoline or a gasoline/ethanol blends with a nominal ethanol concentration of up to 40 percent (E0 - E40), then the test shall be performed using both the CE25a and CE40a test fluids. If the product is rated for use with a gasoline/ethanol blend with a nominal ethanol concentration above 25 percent, then the test shall be performed using both the CE25a and CE85a test fluids. See Supplement SA.

11.2 Samples

11.2.4 Material combinations of the product and closure interface will be as specified by the manufacturer. All closures for non-removable strainer assemblies rated for gasoline/ethanol blends with nominal ethanol concentrations up to 25 40 percent shall be fabricated of suitable materials. All closures for non-removable strainer assemblies rated for gasoline/ethanol blends with nominal ethanol concentrations above 25 40 percent shall be fabricated of the materials representing permitted material to which the device may be connected; such as aluminum closures representing an aluminum manifold. Table 6.1 shall be used to determine the worst case material interactions. Materials that are specified by the manufacturer, but not included in Table 6.1 shall be tested as necessary to represent worst case conditions.

MARKING

17 General

17.1 A strainer shall be marked with the following information:

- a) The manufacturer's or private labeler's name or identifying symbol.
- b) A distinctive catalog designation to specifically identify the strainer.
- c) Strainer assemblies shall be marked to indicate the fuel rating for which they are intended. The marking shall be "Gasoline" for strainers rated for gasoline only; shall be "E25" for strainers rated for gasoline and gasoline/ethanol blends with nominal ethanol concentrations up to 25 percent (E0 -

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E25); <u>), "E40" for pumps rated for gasoline and gasoline/ethanol blends with nominal ethanol concentrations up to 40 percent ethanol (E0 - E40)</u> or shall be "E85" for strainers rated gasoline and gasoline/ethanol blends with nominal ethanol concentrations up to 85 percent (E0 - E85). This marking shall be prominently displayed. See 17.3.

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SUPPLEMENT SA - Test Fluids

SA.1 Details

There are two-three test fluids that are applicable for tests in this standard. The fluids are designated by a format that fits the form of CEXXa; where "C" indicates ASTM Reference Fuel C (50% isooctane, 50% Toluene); "E" indicates synthetic ethanol (designated CDA20); "XX" indicates percentage amount of the ethanol that is added to the solution; and "a" indicates aggressive elements that are added to the synthetic ethanol. The aggressive elements are used to represent contaminants that can be found in actual use and are used to help represent the worst case test fluid. The aggressive elements are mixed in accordance with the Recommended Practice for Gasoline, Alcohol, and Diesel Fuel Surrogates for Material Testing, SAE J1681.

The aggressive elements include deionized water, sodium chloride, sulfuric acid, and glacial acetic acid. Table <u>SA.1</u> outlines the amounts of each of these elements in one liter of aggressive ethanol.

Table SA.1

Aggressive ethanol test fluid

Component	Units	1 Liter of CE85a	1 Liter of CE40a	1 Liter of CE25a	•
ASTM Reference Fuel C	Liter	0.150	0.600	0.750	•
Synthetic Ethanol	Liter	0.843	0.397	0.248	4
Deionized Water	Liter	0.007	0.003	0.002	4
Sodium Chloride	Gram	0.003	0.002	0.001	4
Sulfuric Acid	Milliliter	0.010	0.005	0.003	4
Glacial Acetic Acid	Milliliter	0.050	0.020	0.010	4

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CE25a consists of a 75 percent ASTM Reference Fuel C and 25 percent aggressive ethanol mixture. CE40a consists of a 60% ASTM Reference Fuel C and 40% aggressive ethanol mixture. CE85a consists of a 15 percent ASTM Reference Fuel C and 85 percent aggressive ethanol mixture. These two fluids may be used to condition samples as noted in each specific test that indicates that these fluids are to be used. The test fluids are to be prepared just prior to use to minimize effects on the test fluid. The aggressive ethanol is corrosive and changes can occur to the solution from interactions with the storage and transfer containers. Exposure to air and or moisture may also affect the test fluid.

Products intended to be rated for use with gasoline or gasoline/ethanol blends with nominal ethanol concentrations up to 25 percent (E0 - E25) shall be evaluated using the CE25a test fluid as the only applicable test fluid. If the product is rated for use with gasoline or a gasoline/ethanol blends with a nominal ethanol concentration of up to 40 percent (E0 - E40), then the test shall be performed using the CE40a test fluid. Products intended to be rated at gasoline/ethanol blends with nominal ethanol concentration greater than 25 percent shall be evaluated using both the CE25a test fluid and the CE85a test fluid.

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BSR/UL 331B, Standard for Safety for Strainers for Diesel Fuel, Biodiesel Fuel, Diesel/Biodiesel Blends with Nominal Biodiesel Concentrations up to 20 Percent (B20), Kerosene, and Fuel Oil

- 1. Revisions to 10-Day Moist Ammonia-Air Stress Cracking Test
- 2. Clarifications to the Deformation Test

- PERFORMANCE

 15 10-Day Moist Ammonia-Air Stress Cracking Test

 15.1 After being subjected to the conditions described in 15.2 15.3, a pressure-contining brass part containing more than 15 percent zinc shall:
 - a) Show no evidence of cracking, delamination, or degradation; or
 - b) Perform as intended when tested as described in 15.4.

After being subjected to the conditions described in 15.2 - 15.4, a brass part containing more than 15 percent zinc shall show no evidence of cracking when examined using 25X magnification.

15.2 One test sample of each size is to be subjected to the physical stresses normally imposed on or within a part as the result of assembly with other components. Samples with female tapered pipe threads, intended to be used for installing the product in the field are to have the threads engaged and tightened to the torque specified in Table 12.2 . Samples with female threads other than tapered pipe threads shall be torqued as specified by the manufacturer. Polytetrafluoethylene (PTFE) tape or pipe compound are not to be used on any threads. Samples with male threads are evaluated as received. Each test sample is to be subjected to the physical stresses normally imposed on or within a part as the result of assembly with other components. Such stresses are to be applied to the sample prior to and maintained during the test. Samples with threads, intended to be used for installing the product in the field, are to have the threads engaged and tightened to the torque specified in Table 12.2 Teflon tape or pipe compound are not to be used on the threads.

15.3 The samples are then to be tested in accordance with Apparatus, Reagents and Materials, Test Media, Test Sample Preparation, (9.3 – 9.4), and Test Procedure (10.1 – 10.4) of the Standard Test Method for Ammonia Vapor Test for Determining Susceptibility to Stress Corrosion Cracking in Copper Alloys, ASTM B858-06, except the pH level of the test solution shall be High 10.5 ±0.1 and the exposure temperature shall be 25 ±1°C. Three samples are to be degreased and then continuously exposed in a set position for ten days to a moist ammonia-air mixture maintained in a glass chamber approximately 12 by 12 by 12 inches (305 by 305 by 305 mm) having a glass cover.

15.4 After the exposure period, the samples are to be examined for cracks, delamination, and degradation using a microscope having a magnification of 25X. Pressure-confining parts exhibiting degradation as indicated in 15.1 as a result of the test exposure described in 15.2 and 15.3 shall withstand, without rupture, Formatted: Default Paragraph Font, Underline, Font color: Blue, (Asian) Chinese (China), Strikethrough

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a hydrostatic test pressure of five times the rated pressure of the valve, for one minute. Approximately 600 ml (20.3 ounces) of aqueous ammonia having a specific gravity of 0.94 is to be maintained at the bottom of the glass chamber below the samples. The samples are to be positioned 1-1/2 inches (38.1 mm) above the aqueous ammonia solution and supported by an inert tray. The moist ammonia-air mixture in the chamber is to be maintained at atmospheric pressure and at a temperature of $34 \pm 2^{\circ}\text{C}$ (93.2 $\pm 3.6^{\circ}\text{F}$).

PERFORMANCE

12 Deformation and External-Leakage Test

- 12.2 Representative strainer assemblies are to be rigidly supported. Any bolts, pipe plugs, or threaded parts detached for care and servicing of the strainer are to be tightened with a torque wrench to the value specified in Table 12.1 or 12.2. Samples with threads other than those specified in Table 12.1 or 12.2 shall be torqued as specified by the manufacturer.
- 12.5 The strainer parts used for care and servicing of the strainer are then to be alternately removed and replaced 25 times, tightening each time with a torque wrench to the value specified in Table 12.1 or 12.2. Samples with threads other than those specified in Table 12.1 or 12.2 shall be torqued as specified by the manufacturer. The pressure test described in 12.4 is then to be repeated.
- 12.6 Any bolts or threaded parts used for care and servicing of the strainer are then to be tightened with a torque wrench to twice the value specified in Table 12.1 or 12.2. Samples with threads other than those specified in Table 12.1 or 12.2 shall be torqued to twice the value as specified by the manufacturer. The pressure test described in 13.4 is then to be repeated.

BSR/UL 458, Standard for Safety for Power Converters/Inverters and Power Converter/Inverter Systems for Land Vehicles and Marine Crafts

1. Revision to polarity color coding

- 58.2 Polarity identification shall be provided for output connections. The polarity is to be identified by:
 - a) The words "battery positive," "converter positive," and "negative;"
 - b) The words "battery" and "converter" followed by the signs "+" for positive and "- " for negative;
 - c) Color coding of red for battery positive, <u>black for battery negative</u>, blue for converter positive, and white for negative; or
 - d) The abbreviations "Pos" and "Neg" with the symbols "+" and "-."

2. Revision to scope

- 1.1 These requirements cover fixed and stationary power converters, power-converter systems, and accessories having a rated nominal input of 120, 120/240, or 240 V, alternating current and a nominal output of 24 V 60 V or less, direct current. Additionally, a power converter may have a rated nominal input of 12 60 V, direct current. These converters are intended for use within land vehicles where not directly exposed to outdoor conditions, and are intended to be employed in accordance with the National Electrical Code, NFPA 70.
- 1.2 These requirements also cover fixed, stationary and portable power inverters and power-inverter systems having a dc input and a 120 or 240 V ac <u>single phase</u> output <u>or up to 600Y/346V three-phase output</u>. These inverters are intended for use within land vehicles where not directly exposed to outdoor conditions, and are intended to be employed in accordance with the National Electrical Code, NFPA 70.
- 1.4 Power converters <u>supplied by AC circuits</u> covered by Part I of this standard are intended for connection to established 15- and 20-A branch circuits within a recreational vehicle.
- 1.5 Power-inverters <u>and converters supplied by DC circuits</u> covered by Part I of this standard are intended for connection to a <u>nominal 12 to 60</u> <u>- or 24-</u>V dc battery supply.

Table 32.1 Values of test voltages

Rated voltage, <u>V</u>	Test voltage, <u>V</u>
<u>10.5 – 15.5</u>	<u>12.6</u>
<u>21 – 31</u>	<u>25.2</u>
42 – 60	<u>50.4</u>
110 - 115	120
Between 116 - 219	Rated voltage
220 - 230	240

Table 35.1
Output voltage of secondary circuits

Unit output rating, V	Minimum voltage at full rated output load, V	Maximum voltage at 5% of rated output load, V		
12	10.5	15.5		
24	21.0	31.0		
<u>48 - 60</u>	<u>42.0</u>	<u>60.0</u>		

48.2.5 Power-inverters with three-phase AC outputs shall be subjected to three different short-circuit tests. The tests shall consist of a Line to Neutral test, a Line to Line test, and a Line to Line test.

3. Revision to production line test conditions

Table 54.1
Production-line test conditions

	Condition A		Condition B	
Unit rating <u>, Vac</u>	Potential, V	Time, s	Potential, V	Time, s
Less than 100 230 V or less	1000	60	1200	1
<u> 100 – 130</u>	<u>1250</u>	<u>60</u>	<u>1500</u>	<u>1</u>
<u> 131 – 250</u>	<u>1500</u>	<u>60</u>	1800	<u>1</u>
<u> 251 – 350</u>	<u>2200</u>	<u>60</u>	2700	<u>1</u>

4. Revision to address charging lithium batteries

1.3 These requirements also cover converters/inverters that are additionally intended to charge batteries.

Batteries intended for use with these systems are lead acid batteries or lithium based batteries, and the batteries are intended to comply with applicable battery standards and be provided with protective measures for discharging and charging. These products are not intended to provide protection to these batteries unless specifically included and evaluated as part of a system.

14A Batteries

- 14A.1 Lead acid batteries provided as part of the system shall comply with the Standard for Standby Batteries, UL 1989.
- 14A.2 Lithium based batteries that are provided as part of the system shall comply with the Standard for Batteries for Use in Stationary, Vehicle Auxiliary Power and Light Electric Rail (LER) Applications, UL 1973.
- 14A.3 If the battery is not provided as part of the system, the inverter/converter charging function shall be designed and evaluated such that is capable of safely charging a battery that complies with 14A.1 or 14A.2.
- 58.26 For a product with a charging function intended for charging lithium batteries where the product and the storage battery combination is not identified, the product shall be marked with the following or equivalent statement: "CAUTION To Reduce the Risk of Fire, Use only battery packs that include the battery management system and all necessary protection for the battery pack integral to the pack."
- 59.5 For converter/inverters that are intended to charge lithium based batteries, the instruction manual shall state the following or the equivalent: "The converter/inverter is intended to recharge batteries. The battery that is connected to this product is only suitable if it complies with the given battery standard for that battery type and is provided with a battery management system that will monitor and control the electrical and thermal health of the battery during charging. When installing this converter/inverter, the battery is to be verified as in compliance with the applicable battery standard."

BSR/UL 827, Standard for Safety for Central-Station Alarm Services

5 Glossary

5.2 Definitions common to burglar and fire alarm systems

Sion From UL. 5.2.46A REGIONAL/NATIONAL BUSINESS DISRUPTION -- A national, state, or regional declaration, which creates a business disruption event that inhibits the operation of a Central-Station.

51 Operation During a Regional/National Disruption

- 51.1 When the following conditions are met, a distributed, off-site Central-Station monitoring operation shall be permitted during a regional/national disruption event:
 - a. The declaration of situation that creates a regional/national disruption event must be issued publicly by a national, state or regional official in which the Central-Station operates.
 - b. The declaration precludes the operation of a Redundant Site as described in Section 17.6.4 or Temporary Operating Center as defined by Section
 - c. The Central-Station must document its intent to enact this provision in writing stating the facts as to why the operation cannot be maintained at the existing site(s).
 - d. The Central-Station shall resume normal operations within 14 days after any such declaration and/or any associated health and/or safety quidelines expires.
- 51.2 The Central-Station shall resume normal operations as soon as possible but in no case more than 30 days after any such declaration and/or any associated health and/or safety guidelines covering the area in which the Central-Station is located expires.

51.2 51.3 Operation within the central-station

- 51.2.1 51.3.1 Efforts shall be made and documented to maintain an operationally minimum/safe number of employees within the Central-Station.
- 51.2.2 51.3.2 Unless otherwise prohibited by governmental health or safety directives, the Central-Station shall not be unstaffed at any time.
- 51.22.1 51.3.2.1 Staffing shall be by Central-Station employees trained to perform onpremises tasks in the manner and timeframes required by this Standard.

51.3 51.4 Operators Working Remotely (From Home)

51.3.1 51.4.1 Bandwidth and Connectivity

51.3.1.1 51.4.1.1 The data and voice communication technology connections required for remote operators to perform their job functions shall be made to the Central-Station network through a secure, remote access technology (such as e.g. virtual private

- network (VPN), virtual desktop infrastructure (VDI) and remote desktop protocol (RPD) and the like) that uses a minimum of 256 bit AES encryption to connect directly from the remote workstation to the network at the monitoring station or automation system host.
- 51.3.1.2 51.4.1.2 The remote access technology (VPN) specified in 51.4.1.1 shall be deployed in a manner such that the remote employee is required to use some form of multi-factor authentication (MFA) in order to gain access to the Central-Station's network and or automation systems.
- 51.3.1.3 <u>51.4.1.3</u> Communication between a remote operator workstation and the central-station shall comply with <u>one of the following:50.3.1.3.1 or 50.3.1.3.2, and 51.3.1.3.3</u>.
 - 51.3.1.3.1 a. There shall be primary and backup communication connections between the remote operator workstation and the central-station Central-Station; or,
 - 51.3.1.3.2 <u>b.</u> A Central-Station shall employ an automation system, and have sufficient operators on-duty and logged into the automation system, There shall be sufficient operators on-duty and logged into the automation system, so that loss of communication between a remote operator workstation and the Central-Station will not result in the loss of any signals or failure to process signals in the manner and timeframes required by this Standard.

51.3.2 51.4.2 Remote Operator Workstation

- 51.3.2.1 51.4.2.1 Remote operator workstation equipment shall be owned, configured, and controlled by the Central-Station and shall comply with the requirements of the Standard applicable to the type of equipment and shall be configured and controlled by the Central-Station in compliance with 51.4.2.1.1 through to 51.4.2.1.3, or 51.4.2.1.4 through to 51.3.2.1.5.
- 51.4.2.1.1 The workstation equipment shall be owned by the Central-Station and shall be configured and maintained by enrollment in the Central-Station's processes.
- 51.3.2.2 51.4.2.9.2 Remote operator workstations shall not be utilized for personal use.
- 51.3.2.2.1 Remote operators shall not use privately owned equipment (bring your own device BYOD) to connect to or operate within the Central-Station's Automation Software.
- \$1.3.2.3 51.4.2.1.3 If the automation system operation stores data on the remote operator workstation, then the workstation shall be protected with whole disk encryption, with provision for a system administrator level master password to minimize risk of complete lockout.
- 51.3.2.1.4 Where the workstation equipment is not owned by the Central-Station during the connection to the Central-Station Automation System, the following conditions shall be met:

- a. The non-owned equipment shall have antivirus/antimalware installed, enabled and functioning;
- b. A firewall shall be enabled and configured;
- c. Windows or other operating system security patches and updates shall be applied;
- d. The user shall be prevented from Copy, Cut, Paste and screenshot
- e. The user shall be prevented access to local resources such as hard disk drives, removable storage of any kind, USB devices and printers from the virtual deskton
- 51.4.2.1.5 Software to achieve the above requirements shall be provided by the authorized provider.

51.3.3 51.4.3 Workplace Environment

51.3.3.1 51.4.3.1 Remote operators shall maintain a work area that:

- a. Prevents unauthorized viewing of monitoring screen;
- b. Prevents unauthorized eavesdropping of voice communications; and.
- c. Provides a distraction-free environment.
- 51.3.3.2 <u>51.4.3.2</u> Remote operators shall perform job duties from a location approved and documented by central-station management.
- 51.3.3.3 51.4.3.3 The Central-Station shall employ a means by which the Central-Station managers have continuous communication can communicate with and supervision supervise (audio, visual or otherwise) of the remote employees as required to fulfill monitoring responsibilities.
- 51.3.3.4 51.4.3.4 The Central-Station shall document the security architecture of the implemented remote operator solution.
- 51.3.3.4.1 51.4.34.1 The security architecture documentation shall be made part of the central-station's business continuity plans described in Table 17.6 item v. Sections 19.2. 28.2 and/or 43.2.

BSR/UL 1699, Standard for Safety for Arc-Fault Circuit-Interrupters

1. LCDI Shield Monitor Interrupter (SM/I)

SB6 Test Circuit

SB6.1 An LCDI shall be provided with a supervisory circuit that will allow for periodic, convenient testing of the ability of the device to trip by way of leakage current introduced at the end length of the LCDI shielded cord to verify shield integrity. The current employed by the supervisory circuit shall be sufficient to cause tripping at 85 percent of rated voltage, provided that at rated voltage the current shall not exceed 9 mA. Compliance shall be determined by conducting the LCDI Supervisory Circuit Test , prior permise of Section SB9.

NFW

SB6A LCDI Shield Monitor Interrupter (SM/I)

SB6A.1 An LCDI employing a shielded power supply cord or shielded cord set shall monitor shield continuity. In the event the shield continuity does not exist when an attempt is made to start using the equipment, the device shall not energize current to its load terminals and shall interrupt the circuit under conditions where the shield is lost during operation. See LCDI Shield Monitor Interrupter (SM/I) Test, Section SB9A.

NFW

SB9A LCDI Shield Monitor Interrupter (SM/I) Test

SB9A.1 To demonstrate that an LCD meets the requirements of SB6A.1, the tests described in SB9A.2 and SBA.3 are to be conducted. At the conclusion of the tests. each representative LCDI shalk

- a) Interrupt the circuit within a period of 0.5 seconds;
- b) Not permit power to be applied to the circuit each time the reset is operated when resetts attempted; and
- c) Provide a positive visual and/or audible indication.

SB9A2A representative LCDI shall be correctly connected to the rated line voltage and allowed to stabilize. A closed switch is placed in series with the shield. The reset button shall be operated to allow the LCDI to be in the "ON" state. The switch is then opened to simulate an open shield condition during normal operation.

SB9A.3 The test in SB9A.2 is repeated except the test button on a representative LCDI shall be operated to allow the LCDI to be in the "OFF" state. With the switch in the open state in series with the shield to simulate a damaged shield, the reset button on the LCDI is then pressed.

SB9A.4 For LCDI power supply cords employing a shield over each individual current carrying conductor, the two tests in SB9A.2 and SB9A.3 shall be conducted on each shield. Each shield shall meet the requirements of SB9A.1.

2. Clarification of Definitions

- 2.4 ARC-FAULT CIRCUIT-INTERRUPTER (AFCI) A device intended to mitigate the effects of <u>wire</u> arcing faults by functioning to deenergize the circuit when an arc-fault is detected.
- 2.5 BRANCH/FEEDER ARC-FAULT CIRCUIT-INTERRUPTER A device intended to be installed at the origin of a branch circuit or feeder, such as at a within or near the service panelboard. It is intended to provide protection of the branch circuit wiring, feeder wiring, or both, against unwanted effects of arcing. This device also provides limited protection to branch circuit extension wiring. It may be integrated as part of another device, such as a circuit-breaker type device or a device in its own enclosure mounted at or near a service panelboard.
- 2.7 COMBINATION ARC-FAULT CIRCUIT-INTERRUPTER <u>A device intended to be installed at the origin of a branch circuit or feeder, within or near the service panelboard.</u>

 An AFCI which It complies with the requirements for both branch/feeder and outlet eircuit-AFCIs. It is intended to protect downstream branch circuit wiring and cord sets and power-supply cords. <u>It may be integrated as part of another device, such as a circuit-breaker type device or a device in its own enclosure mounted at or near a service panelboard.</u>

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BSR/UL 2416, Standard for Safety for Audio/Video, Information and Communication Technology Equipment Cabinet, Enclosure and Rack Systems

1. Additional option for enclosure venting of battery compartments

13.5.2 Enclosure venting

13.5.2.1 The enclosure or compartment housing a vented battery or a valve regulated battery, where gassing is possible during heavy discharge, overcharging, or similar type of normal or abnormal usages, shall be vented. The means of enclosure venting shall provide airflow throughout the compartment in order to reduce the buildup of pressure or accumulation of an explosive gas mixture, such as hydrogen-air, involving a risk of injury to persons. A gas mixture is lighter than air (such as hydrogen-air), may necessitate locating ventilation openings in the uppermost portions of the battery enclosure or compartment where such a gas mixture may accumulate.

Note: Examples of battery technologies that may vent hydrogen under either normal or abnormal conditions include lead acid batteries and large Nicoad batteries.

13.5.2.1A As an alternative to 13.5.2.1, requirements for enclosure venting shall comply with the Risk of Explosion from Lead Acid and NiCd Batteries requirements in Clause M.7, and the Protection Against Internal Ignition from External Spark Sources of Batteries with Aqueous Electrolyte requirements in Clause M.8 of the Standard for Audio/Video, Information and Communication Technology Equipment - Part 1: Safety Requirements, UL 62368-1.

2. Clarification on Battery Supply Performance

13.7 Battery supply performance

- 13.7.1 Except as described in the Exception to 13.2.1, 13.7.2 and 13.7.3, batteries and battery supplies shall comply with 13.7.4 13.7.13 as applicable.
- 13.7.2 A discreet discrete battery supply (i.e. not part of other equipment) shall comply with the performance requirements of the Standard for Uninterruptible Power Supply Equipment, UL 1778 (2nd edition), or the Standard for Uninterruptible Power Systems, UL 1778 (4th5th edition).
- 137.3 A battery supply that is integral with certified ITE requires no further evaluation.
- 13.7.3 A battery supply that is integral to equipment that complies with the requirements in the Standard for Information Technology Equipment Safety Part 1: General Requirements, UL 60950-1, or the Standard for Audio/Video, Information and Communication Technology Equipment Part 1: Safety Requirements, UL 62368-1, is considered to comply with 13.7.4 13.7.13.

BSR/UL 6142, Standard for Safety for Small Wind Turbine Systems

- 1. Removal of References to the Standard for Power Conversion Equipment, UL 508C, and Replacement with Reference to the Standard for Adjustable Speed Electrical Power Drive Systems Part 5-1: Safety Requirements Electrical, Thermal, and Energy UL 61800-5-1.
- 4.9.2 To prevent damage by loose materials, electrical components shall be housed in electrical cabinets within the hub. The electrical cabinets shall be provided with doors secured by latches which require a tool to lock and unlock the doors. The enclosures shall comply with the applicable enclosure requirements of the Standard for Industrial Control Equipment, UL 508, the Standard for Power Conversion Equipment, UL 508C, Adjustable Speed Electrical Power Drive Systems Part 5-1: Safety Requirements Electrical, Thermal, and Energy, UL 61800-5-1, or the Standard for Inverters, Converters, Controllers and Interconnection System Equipment for Use With Distributed Energy Resources, UL 1741.
- 4.10.1 The Converter/Inverter assembly of a WT shall comply with the Standard for Inverters, Converters, Controllers and Interconnection System Equipment for use With Distributed Energy Resources, UL 1741.

Exception: A wind turbine inverter or converter may be evaluated to the construction requirements of the Standard for Power Conversion Equipment, UL 508C, Adjustable Speed Electrical Power Drive Systems – Part 5-1: Safety Requirements – Electrical, Thermal, and Energy, UL 61800-5-1, if it additionally complies with the performance requirements in UL 1741.

9.2.3 Utility interactive WTs shall be evaluated for compliance with the manufacturer's specifications and shall not result in electric shock, fire, or energy hazards as defined by the Standard for Inverters, Converters, Controllers and Interconnection System Equipment for Use With Distributed Energy Resources - Ut. 1741, or the Standard for Power Conversion Equipment, UL 508C Adjustable Speed Electrical Power Drive Systems – Part 5-1: Safety Requirements – Electrical, Thermal, and Energy, UL 61800-5-1.

Standards for Components

Standards and Outlines of Investigations under which components of the products covered by this standard are evaluated include the following:

Title of Standard - UL Standard Designation

Power Conversion Equipment - UL 508C

<u>Adjustable Speed Electrical Power Drive Systems – Part 5-1: Safety Requirements – Electrical, Thermal, and Energy, UL 61800-5-1</u>