NFPA® 261

Standard Method of Test for Determining Resistance of Mock-Up Upholstered Furniture Material Assemblies to Ignition by Smoldering Cigarettes

2013 Edition

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This edition of NFPA 261, *Standard Method of Test for Determining Resistance of Mock-Up Upholstered Furniture Material Assemblies to Ignition by Smoldering Cigarettes,* was prepared by the Technical Committee on Fire Tests. It was issued by the Standards Council on November 27, 2012, with an effective date of December 17, 2012, and supersedes all previous editions.

This edition of NFPA 261 was approved as an American National Standard on December 17, 2012.

Origin and Development of NFPA 261

Regulation of the manufacture of furniture has been a subject of research and debate since 1967, when the Flammable Fabrics Act was amended by Congress to include products in addition to wearing apparel and home textiles that might constitute an unreasonable flammability risk. The National Bureau of Standards (NBS) began funding laboratory research on the subject in 1968. With its formation in 1973, the U.S. Consumer Product Safety Commission (CPSC) became the government agency responsible for administration of the Flammable Fabrics Act, including the adoption of any program or standard regulating upholstered furniture. The NBS retained responsibility for designing test methods related to flammable fabrics.

In 1976, the NBS submitted a draft to the CPSC for a proposed cigarette-ignition resistance standard for upholstered furniture. Shortly thereafter, however, a reorganization of the CPSC into separate program areas took place. That reorganization was followed by nearly a year's worth of work on the commission's children's sleepwear standards, due to findings that a chemical added to sleepwear to make it flame retardant might be carcinogenic. In November 1978, the CPSC staff, after modifying the original standard on upholstered furniture proposed by the NBS, recommended to the CPSC commissioners that they publish the standard.

This standard was developed by the Technical Committee on Fire Tests subsequent to the CPSC actions of 1978–1979 and drew heavily on the NBS research and proposed test methodology. The first edition, published in 1983, was identified as NFPA 260B. The 1989 edition was a reconfirmation of the first edition and was renumbered as NFPA 261.

The 1994 and 1998 editions represented reconfirmation of the standard with minor editorial clarifications and stylistic revisions.

For the 2003 edition, the chapter layout of NFPA 261 was reorganized to conform with the *Manual of Style for NFPA Technical Committee Documents.*

The 2009 edition contained mainly editorial revisions.

The 2013 edition has been revised to reference the SRM 1196 cigarettes, and annex material added to explain the revision.

Technical Committee on Fire Tests

Committee Scope: This Committee shall have primary responsibility for documents on fire testing procedures, for reviewing existing fire test standards and recommending appropriate action to NFPA, for recommending the application of and advising on the interpretation of acceptable test standards for fire problems of concern to NFPA technical committees and members, and for acting in a liaison capacity between NFPA and the committees of other organizations writing fire test standards. This Committee does not cover fire tests that are used to evaluate extinguishing agents, devices, or systems.

Contents

NFPA 261

Standard Method of

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2013 Edition

NOTICE: An asterisk (*) following the number or letter designating a paragraph indicates that explanatory material on the paragraph can be found in Annex A.

Changes other than editorial are indicated by a vertical rule beside the paragraph, table, or figure in which the change occurred. These rules are included as an aid to the user in identifying changes from the previous edition. Where one or more complete paragraphs have been deleted, the deletion is indicated by a bullet (•) between the paragraphs that remain.

Information on referenced publications can be found in Chapter 2 and Annex C.

Chapter 1 Administration

1.1 Scope.

1.1.1* This test shall apply to upholstered furniture mock-ups.

1.1.2 Mock-up testing is used in assessing the relative resistance to continuing combustion of individual materials used in furniture, such as cover fabrics, filling materials, and welt tape, in realistic combinations and in an ideal geometric arrangement of the seat cushions, back, and arms of furniture items.

1.2 Purpose. This test method is designed to evaluate the ignition resistance of upholstered furniture when exposed to smoldering cigarettes under specified conditions.

1.3 Application.

1.3.1 This method is intended to measure the performance of upholstered furniture under conditions of exposure to a smoldering cigarette, which shall be accomplished by testing furniture mock-ups.

1.3.2 This method shall not be used to measure the performance of upholstered furniture under conditions of open flame exposure and does not indicate whether the furniture will resist the propagation of flame under severe fire exposure or when tested in a manner that differs substantially from this test standard.

1.3.3 The results obtained with a material assembly that is tested in mock-up using this method shall not necessarily indicate the performance of the same material assembly in other geometric configurations.

1.4 Summary of Method.

1.4.1 The test shall use lighted cigarettes covered with a piece of sheeting material to determine the ignition resistance of upholstered furniture items reproduced in mock-up.

1.4.2 Locations to be tested shall include the following:

(1) Horizontal crevices formed where seat cushions and vertical test panels meet
(2) Seat cushion surfaces, including smooth surface, quilt, tuft, and welt edges
(3) Top surfaces of armrests, back, and loose seat support systems as shown in Figure 1.4.2(a) and Figure 1.4.2(b)

1.4.3 Obvious ignitions or char length measurements shall be used to determine if a particular combination of upholstering materials meets test criteria.

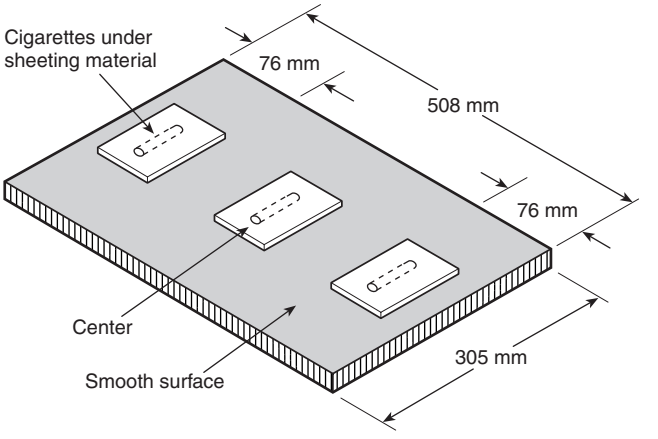

FIGURE 1.4.2(a) Upholstered Furniture Mock-Up Test: Armrest, Top of Back, and Seat Support System.

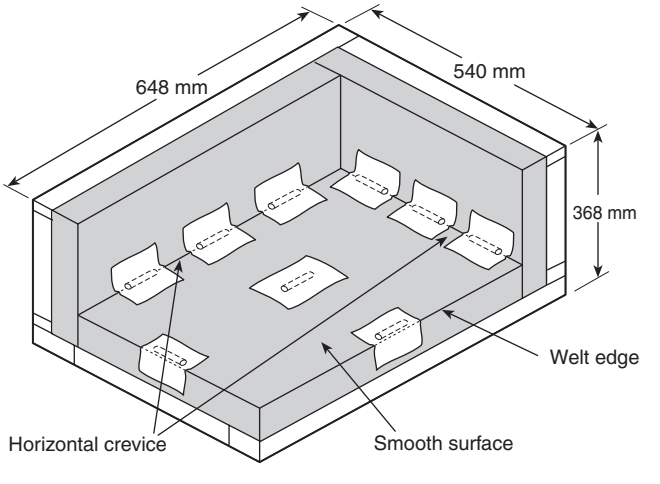

FIGURE 1.4.2(b) Upholstered Furniture Mock-Up Test: Seat Cushion, Side, and Back.

Chapter 2 Referenced Publications

2.1 General. The documents or portions thereof listed in this chapter are referenced within this standard and shall be considered part of the requirements of this document.

2.2 NFPA Publications. (Reserved)

2.3 Other Publications.

Merriam-Webster's Collegiate Dictionary, 11th Edition, Merriam-Webster, Inc., Springfield, MA, 2003.

2.4 References for Extracts in Mandatory Sections. (Reserved)

Chapter 3 Definitions

3.1 General. The definitions contained in this chapter shall apply to the terms used in this standard. Where terms are not defined in this chapter or within another chapter, they shall be defined using their ordinarily accepted meanings within the context in which they are used. *Merriam-Webster's Collegiate Dictionary*, 11th edition, shall be the source for the ordinarily accepted meaning.

3.2 NFPA Official Definitions.

3.2.1 Shall. Indicates a mandatory requirement.

3.2.2 Should. Indicates a recommendation or that which is advised but not required.

3.2.3 Standard. A document, the main text of which contains only mandatory provisions using the word "shall" to indicate requirements and which is in a form generally suitable for mandatory reference by another standard or code or for adoption into law. Nonmandatory provisions are not to be considered a part of the requirements of a standard and shall be located in an appendix, annex, footnote, informational note, or other means as permitted in the *Manual of Style for NFPA Technical Committee Documents*.

3.3 General Definitions.

3.3.1 Bolsters. Pillows or similarly shaped units containing upholstery material covered by upholstery cover material, which might or might not be attached to the upholstered furniture item but are sold and delivered with it.

3.3.2 Char. Carbonaceous material formed by pyrolysis or incomplete combustion.

3.3.3 Deck. The upholstered support under the seat cushion in a loose seat construction.

3.3.4 Furniture Mock-Up. A representation of production furniture that uses the same upholstery cover material and upholstery material, assembled in the same manner as in production furniture but with straight, vertical sides.

3.3.5 Quilted. Fused or stitched with thread through the upholstery cover material and through one or more layers of upholstery material.

3.3.6 Tufted. Buttoned or laced through the upholstery cover material and through the upholstery material.

3.3.7 Upholstered Furniture. For the purpose of this test method, a unit of interior furnishing that has any surface covered, in whole or in part, with a fabric or related upholstery cover material, contains upholstery material, and is intended or promoted for sitting or reclining.

3.3.8 Upholstery Cover Material. The outermost layer of fabric or related material used to enclose the main support system, upholstery materials, or both, used in a furniture item.

3.3.9* Upholstery Material. The padding, stuffing, or filling material used in a furniture item, which can be either loose or attached, enclosed by an upholstery cover material, or located between the upholstery cover material and support system, if present.

3.3.10 Welt. The cord or piping sewn into the seam or border edge of a cushion, pillow, arm, or back of a furniture item.

Chapter 4 Test Apparatus

4.1* Mock-Ups. Mock-up elements for the mock-up test jigs shall be constructed as illustrated in Figure 4.1(a), Figure 4.1(b), and Figure 4.1(c).

4.2* Ignition Source. The ignition source shall be SRM 1196 cigarettes without filter tips, made from natural tobacco, 83 mm ± 2 mm long with a tobacco packing density of 0.270 g/cm^3 ± 0.020 g/cm^3 and a total weight of 1.1 g ± 0.1 g.

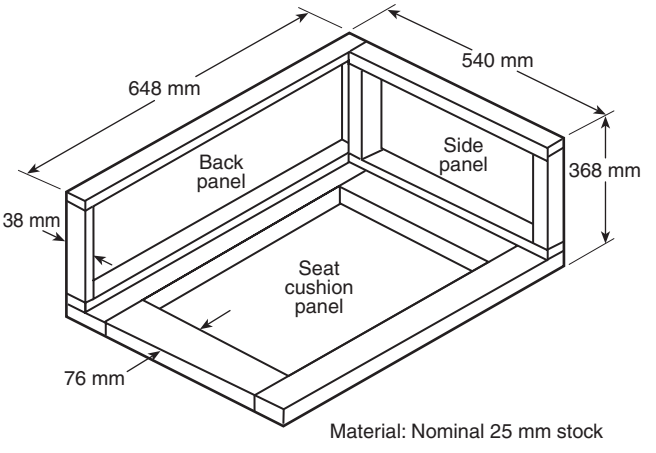

FIGURE 4.1(a) Frame for Upholstered Furniture Mock-Up Test.

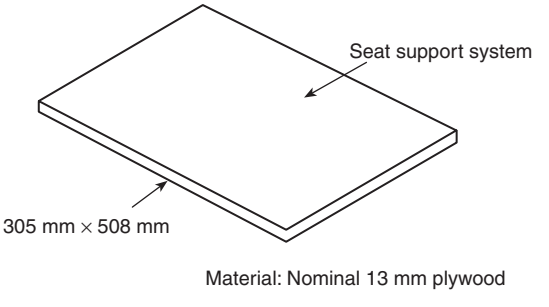

FIGURE 4.1(b) Armrest and Top of Back Mock-Up Test.

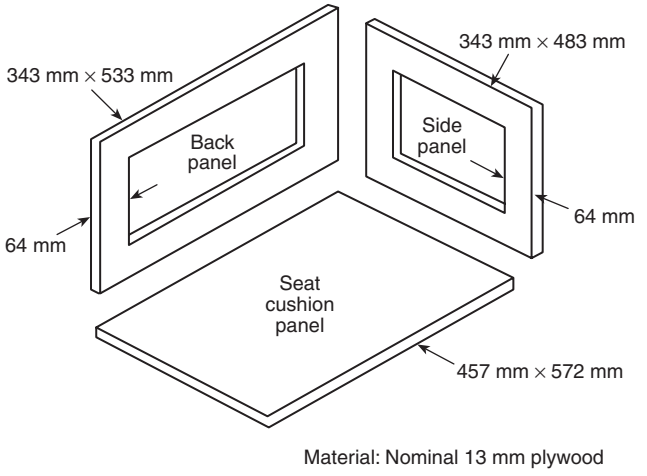

FIGURE 4.1(c) Panels for Upholstered Furniture Mock-Up Test.

4.3 Sheeting Material.

4.3.1 The sheeting material used to cover the test cigarettes shall be 50 percent cotton/50 percent polyester or 100 percent cotton bed sheeting material, and shall weigh 125 g/m^2 ± 28 g/m^2.

4.3.2 The material shall be laundered in an automatic home clothes washing machine and dried in a tumble dryer at least once before use.

4.3.3 For testing, the sheeting material shall be cut into pieces approximately 125 mm × 125 mm.

4.4 Test Area. The test room shall be draft-protected and equipped with a system for exhausting smoke and noxious gases produced during testing.

4.5 Extinguishing Equipment.

4.5.1 A pressurized water fire extinguisher or other fire extinguishing equipment shall be immediately available.

4.5.2 A water bottle fitted with a spray nozzle shall be provided to extinguish any ignited portions of the mock-up.

4.5.3 A bucket of water shall be provided for immersing smoldering or burning materials removed from the mock-up.

4.6 Miscellaneous. Other apparatus required to carry out the testing shall include the following: straight pins, a knife or scissors, tongs, and a linear scale at least 150 mm long and graduated in millimeter divisions.

Chapter 5 Conditioning

5.1 General. Test samples, cigarettes, and sheeting material shall be conditioned at a temperature of 23°C ± 5°C and at a relative humidity of 50 percent ± 5 percent for at least 48 hours immediately prior to testing.

5.1.1 If the test room conditions do not meet the specifications stated in Section 5.1, then testing shall be initiated within 10 minutes after the materials are removed from the conditioned room.

5.1.2 The mock-up assembly shall be constructed in the conditioned area.

Chapter 6 Test Specimens

6.1 General.

6.1.1 Furniture mock-ups shall be created by arranging upholstery cover material and upholstery materials in the same sequence in which they are used in production furniture.

6.1.2 The various parts of the mock-up shall be constructed as described in Sections 6.2 through 6.7.

6.1.3 In all cases, the arrangement and thickness of upholstery material in the mock-up shall reproduce the construction details of production furniture.

6.2 Loose Seat Cushions.

6.2.1 Seat cushions shall be made in the same size and manner and with the same materials as production furniture.

6.2.2 Cushions 680 mm × 550 mm shall be permitted to be used if production furniture cushion dimensions exceed these values.

6.2.3 The cushion thickness shall be a maximum of 130 mm.

6.3 Decks.

6.3.1 Decks shall be prepared, if they are part of the furniture item, by attaching the same materials with the same thickness as used in actual furniture construction to the horizontal panel of the test apparatus, as shown in Figure 4.1(b).

6.3.2 The decking or the upholstery cover material shall be stretched over the upholstery materials and securely fastened to the underside of the wood panel.

6.4 Tight Seat.

6.4.1 If a furniture item is constructed with tight seats only, then the seat shall be duplicated for test in mock-up.

6.4.2 Tight seat cushions shall be made 450 mm ± 50 mm × 550 mm ± 50 mm and with the same fabric and the same thickness used in production furniture.

6.4.3 The cushion assembly shall be attached to the horizontal panel of the test apparatus, as shown in Figure 4.1(c), by extending the upholstery cover material around the panel edges and fastening the cover material to the underside of the wood panel.

6.5 Side and Back Panels.

6.5.1 A mock-up of furniture sides and back shall be constructed if, in the type of furniture to be represented by the mock-up, the sides and back are located within 25 mm of a seat cushion.

6.5.2 Mock-ups shall be made by upholstering one surface of the vertical test panel as shown in Figure 4.1(c), with the same upholstery material and upholstery cover material used in production furniture.

6.5.3 The upholstery cover material shall be stretched over the upholstery material and fastened to the back side of the framework.

6.5.4 All edges of the panels shall be covered with upholstery cover material.

6.5.5 If the side panel and back panel constructions of the furniture item are the same, only one vertical panel shall be required to be assembled and tested.

6.6 Bolsters. In cases where bolsters resting on the seat cushion or suspended above it could confine the heat from the cigarette and create a spatial arrangement that differs from the crevice space found in production furniture, a mock-up bolster shall be prepared with dimensions that fit into the mock-up to create the same spatial arrangement for the cigarette as in production furniture.

6.7 Tops of Armrests and Backs.

6.7.1 Tops of armrests and backs shall be tested if they present a surface large enough and so oriented as to support a cigarette and the construction differs in any way from the side panel and back panel constructions.

6.7.2 Mock-ups of tops of armrests and backs shall be made by upholstering a piece of 13 mm thick plywood, approximately 300 mm × 500 mm, with the same materials used in the furniture item.

6.7.3 The mock-up shall reproduce significant details of the construction of full-size furniture.

Chapter 7 Testing Procedures

7.1 Mock-Up Test Sample.

7.1.1 A mock-up test sample shall be assembled by attaching the side panel, back panel, or both, to the mock-up frame and placing a seat cushion, either loose or tight seat construction, against the panels as shown in Figure 1.4.2(b).

7.1.2 The assembly shall be permitted to be placed on a table or platform in the test area and shall be under an exhaust hood or other means for exhausting the products of combustion from testing.

7.1.3 The decks for loose cushion items, tops of armrests, and tops of backs shall be tested separately.

7.2 Cigarette Locations.

7.2.1 At least three cigarettes shall be burned on each surface location as shown in Figure 1.4.2(a) and Figure 1.4.2(b).

7.2.2 These locations shall include the crevice(s) where seat cushions and vertical panels meet; seat cushion surfaces, including welt and smooth, quilted, or tufted areas; top of upholstered armrest; and tops of upholstered back and deck.

7.3 Crevice Location.

7.3.1 For crevice locations, the two cigarettes on either side of the center cigarette shall be placed in the crevice so that their butt ends burn out at least 75 mm from the outermost edge of the side of the back panel.

7.3.2 The cigarettes shall be placed horizontally.

7.3.3 Two of the three cigarettes shall be placed so that their entire length burns out against the welt cord and the vertical panel surface.

7.3.4 The third cigarette shall be placed so that its entire length burns out against the welt cord and a horizontal surface of the seat cushion.

7.4 Test Cigarette.

7.4.1 Each test cigarette shall be well-lighted and burned not more than 4 mm when placed at a specific test location.

7.4.2 After placement, each cigarette shall be covered with a piece of sheeting material.

7.4.3 For crevice tests, one end of the sheeting material shall be pinned to the vertical panels approximately 50 mm above the cigarette and the remaining material dropped to completely cover the test cigarette.

7.4.4 For all tests, sheeting material-to-cigarette contact shall be ensured by running a finger across the full length of the covered cigarette.

7.5 Seat Cushion.

7.5.1 For the test of either loose or tight seat cushions, three covered cigarettes shall be burned on each different surface location encountered.

7.5.2 For the purposes of this test, smooth surfaces, welt edges, fused or threaded portions of quilts, and tuft depressions shall be considered different surface locations on a seat cushion.

7.5.3 Test cigarettes shall be arranged so that the butt ends burn out on the threads of a quilt or in tuft depressions.

7.5.4 The smooth surface of a quilted or tufted cushion shall not be required to be tested.

7.5.5 For smooth surface cushions, the test cigarettes shall be burned in the center of the cushion.

7.6 Number of Test Cigarettes.

7.6.1 Three test cigarettes shall be burned on each horizontal mock-up test panel duplicating armrests, tops of backs, and seat cushion support systems.

7.6.2 One cigarette shall be burned at the center of the panel and the other two shall be burned at least 75 mm from the edges of the test panel as shown in Figure 1.4.2(a) for the location of the cigarettes on the test panels.

7.7 Test Acceptance. A test at any location shall be considered complete if any of the following occurs:

(1) Three cigarettes in a given location have burned their full lengths without sustained ignition.
(2) Three cigarettes in a given location have self-extinguished before burning their full lengths.
(3) Three cigarettes in a given location sustained ignition.

7.8 Ignition.

7.8.1 If obvious ignition occurs, the test shall be stopped and the burning material extinguished.

7.8.2 The test room shall be ventilated, and an ignition shall be recorded for the cigarette test location.

7.9 Char Length Measurement.

7.9.1 If the cigarette burns to completion at a test location, the maximum char length in any direction of any material shall be measured from the point nearest to the original location of the cigarette.

7.9.2 Cigarette Ignition Results.

7.9.2.1 The char length measurement for each cigarette shall be recorded, except when the cigarette has extinguished without burning to completion or where obvious combustion occurs.

7.9.2.2 If the char from one cigarette runs into the char from another, the results of the test shall be invalid and the test shall be repeated, burning one cigarette at a time.

7.9.2.3 All mock-ups shall be disassembled after testing is complete.

7.9.2.3.1 If when disassembling the apparatus, it is determined that smoldering is still in progress, the test shall be invalid and shall be repeated.

7.10 Testing Environment. The test shall be carried out in a draft-protected area. The maximum airflow across the sample face shall be less than 15.2 m/min.

Chapter 8 Safety Precautions

8.1 Test Termination.

8.1.1 A test shall be stopped as soon as continuing combustion has definitely occurred.

CAUTION: Even under the most carefully observed conditions, smoldering combustion can progress to a point where it cannot be readily extinguished.

8.1.2 The exposed area shall be immediately wetted with a water spray from the water bottle, the charred or burned material shall be removed, and the material shall be immersed in a bucket of water.

8.1.3 The test area shall be ventilated.

8.2* Exposure.

8.2.1 Test personnel shall avoid exposure to smoke and gases produced during testing as much as possible.

8.2.2 A large hood with a low air velocity shall be permitted to be in operation during testing to remove products of combustion.

Chapter 9 Reporting

9.1 Reporting.

9.1.1 The maximum char distance measured to the nearest 5 mm from the center of the original location of the test cigarette shall be recorded for each cigarette location.

9.1.2 When obvious ignition occurs, an ignition shall be recorded for the test location.

Annex A Explanatory Material

Annex A is not a part of the requirements of this NFPA document but is included for informational purposes only. This annex contains explanatory material, numbered to correspond with the applicable text paragraphs.

A.1.1.1 This test method is similar to that described in ASTM E 1352, *Standard Test Method for Cigarette Ignition Resistance of Mock-Up Upholstered Furniture Assemblies.*

A.3.3.9 Upholstery Material. This definition includes, but is not limited to, material such as foam, cotton batting, polyester fiberfill, bonded cellulose, or down.

A.4.1 Figure 1.4.2(a) and Figure 1.4.2(b) show the completed mock-up assemblies.

A.4.2 Standard Reference Material (SRM) 1196 is obtained from the National Institute of Standards and Technology (NIST).

In previous editions of this test method, the ignition source was a commercially available cigarette identified by certain characteristics that corresponded to an unfiltered Pall Mall cigarette. Based on regulations for reduced ignition propensity cigarettes, these particular cigarettes are no longer available in the United States. That cigarette has been replaced by the manufacturer with a banded cigarette that meets the regulations for reduced ignition propensity. Banded cigarettes frequently go out when placed on a test substrate. Since the test requires that a test cigarette burn its full length, the new version of the old test cigarette is not usable.

NIST had samples of the old cigarettes and was able to characterize their ignition propensity. They commissioned cigarettes to be manufactured to those specifications. Then they verified that the new cigarettes met the physical and performance requirements of the previously used cigarettes. These cigarettes are now available from NIST as SRM 1196, one of over 2000 standard reference materials that they produce for various uses.

A.8.2 Products of combustion can be physically irritating and dangerous to test personnel.

Annex B Commentary

This annex is not a part of the requirements of this NFPA document but is included for informational purposes only.

B.1 Introduction. The test for determining the smoldering cigarette ignition resistance of mock-up furniture material assemblies was developed by the National Bureau of Standards (NBS) with the cooperation of various industry groups and individuals. The work was done in response to data indicating that cigarette ignition of upholstered furniture is a major cause of life loss due to fire in the United States.

B.2 Nature of Test.

B.2.1 Upholstered furniture consists of upholstery cover fabric and interior filling/padding components such as foam, polyester, or cotton batting. Often a welt cord is attached to the pillow and other edges of the upholstery. These materials are arranged in complex geometrical forms, including flat, tufted, convex, concave, and horizontal and vertical surfaces. Both the combination of fabric and filling/padding materials and their geometrical arrangement affect their propensity to ignite when exposed to burning cigarettes.

B.2.2 Originally, an attempt was made to develop separate tests for each of the component materials: fabric, filling/padding, and welt cord. It soon became obvious that there was considerable interaction among these components, and it was decided that they would have to be tested in the combination in which they would be used in actual furniture. However, to avoid the cost and effort required to build prototype furniture for each combination of materials, the test is limited to a simple mock-up of the seating surface and vertical members, with the fabric, filling/padding, and welt cord arranged as in the proposed construction of actual furniture.

B.3 Experimental Studies. In a controlled study, the relationship between the results of the mock-up test and the performance of actual furniture was shown to be very close. Thirty-eight locations in both mock-up and full-size chairs were tested in each of three laboratories for a total of 114 tests. Fourteen out of 114 test locations provided different results for the mock-up than for the actual item of furniture. There was 87 percent agreement.

B.4 Agreement Between Laboratories. In a controlled study, the percentage of agreement between laboratories was high. More than 2200 tests were conducted on mock-ups in 38 laboratories. One-hundred twenty-six test results differed from the majority. There was 94 percent agreement. For additional information, see NBSIR, PFF8.76, *Back-Up Report for the Proposed Standard for the Flammability (Cigarette Ignition Resistance) of Upholstered Furniture*.

Annex C Informational References

C.1 Referenced Publications. The documents or portions thereof listed in this annex are referenced within the informational sections of this standard and are not part of the requirements of this document unless also listed in Chapter 2 for other reasons.

C.1.1 NFPA Publications. (Reserved)

C.1.2 Other Publications.

C.1.2.1 ASTM Publications. ASTM International, 100 Barr Harbor Drive, P.O. Box C700, West Conshohocken, PA 19428-2959.

ASTM E 1352, *Standard Test Method for Cigarette Ignition Resistance of Mock-Up Upholstered Furniture Assemblies*, 2008a.

C.1.2.2 NTIS Publications. National Technical Information Service, Springfield, VA 22161.

NBSIR, PFF8.76, *Back-Up Report for the Proposed Standard for the Flammability (Cigarette Ignition Resistance) of Upholstered Furniture*, Joseph J. Loftus, Final Report, June 1978.

C.2 Informational References. (Reserved)

C.3 References for Extracts in Informational Sections. (Reserved)

Index

Sequence of Events Leading to Issuance of This NFPA Committee Document

Step 1: Call for Proposals

- Proposed new Document or new edition of an existing Document is entered into one of two yearly revision cycles, and a Call for Proposals is published.

Step 2: Report on Proposals (ROP)

- Committee meets to act on Proposals, to develop its own Proposals, and to prepare its Report.
- Committee votes by written ballot on Proposals. If two-thirds approve, Report goes forward. Lacking two-thirds approval, Report returns to Committee.
- Report on Proposals (ROP) is published for public review and comment.

Step 3: Report on Comments (ROC)

- Committee meets to act on Public Comments to develop its own Comments, and to prepare its report.
- Committee votes by written ballot on Comments. If two-thirds approve, Report goes forward. Lacking two-thirds approval, Report returns to Committee.
- Report on Comments (ROC) is published for public review.

Step 4: Technical Report Session

- "*Notices of intent to make a motion"* are filed, are reviewed, and valid motions are certified for presentation at the Technical Report Session. ("Consent Documents" that have no certified motions bypass the Technical Report Session and proceed to the Standards Council for issuance.)
- NFPA membership meets each June at the Annual Meeting Technical Report Session and acts on Technical Committee Reports (ROP and ROC) for Documents with "certified amending motions."
- Committee(s) vote on any amendments to Report approved at NFPA Annual Membership Meeting.

Step 5: Standards Council Issuance

- Notification of intent to file an appeal to the Standards Council on Association action must be filed within 20 days of the NFPA Annual Membership Meeting.
- Standards Council decides, based on all evidence, whether or not to issue Document or to take other action, including hearing any appeals.

Committee Membership Classifications

The following classifications apply to Technical Committee members and represent their principal interest in the activity of the committee.

M *Manufacturer:* A representative of a maker or marketer of a product, assembly, or system, or portion thereof, that is affected by the standard.

U *User:* A representative of an entity that is subject to the provisions of the standard or that voluntarily uses the standard.

I/M *Installer/Maintainer:* A representative of an entity that is in the business of installing or maintaining a product, assembly, or system affected by the standard.

L *Labor:* A labor representative or employee concerned with safety in the workplace.

R/T *Applied Research/Testing Laboratory:* A representative of an independent testing laboratory or independent applied research organization that promulgates and/or enforces standards.

E *Enforcing Authority:* A representative of an agency or an organization that promulgates and/or enforces standards.

I *Insurance:* A representative of an insurance company, broker, agent, bureau, or inspection agency.

C *Consumer:* A person who is, or represents, the ultimate purchaser of a product, system, or service affected by the standard, but who is not included in the *User* classification.

SE *Special Expert:* A person not representing any of the previous classifications, but who has a special expertise in the scope of the standard or portion thereof.

NOTES:
1. "Standard" connotes code, standard, recommended practice, or guide.
2. A representative includes an employee.
3. While these classifications will be used by the Standards Council to achieve a balance for Technical Committees, the Standards Council may determine that new classifications of members or unique interests need representation in order to foster the best possible committee deliberations on any project. In this connection, the Standards Council may make appointments as it deems appropriate in the public interest, such as the classification of "Utilities" in the National Electrical Code Committee.
4. Representatives of subsidiaries of any group are generally considered to have the same classification as the parent organization.

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At this point, the NFPA Standards Development Site will open showing details for the document you have selected. This "Document Home" page site includes an explanatory introduction, information on the current document phase and closing date, a left-hand navigation panel that includes useful links, a document Table of Contents, and icons at the top you can click for Help when using the site. The Help icons and navigation panel will be visible except when you are actually in the process of creating a Public Input.

Once the First Draft Report becomes available there is a Public comment period during which anyone may submit a Public Comment on the First Draft. Any objections or further related changes to the content of the First Draft must be submitted at the Comment stage.

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