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AMERICAN NATIONAL STANDARD

FOR

HARDWARE PREPARATION IN STEEL DOORS AND STEEL FRAMES



SPONSOR BUILDERS HARDWARE MANUFACTURERS ASSOCIATION, INC.

AMERICAN NATIONAL STANDARDS INSTITUTE Approved October 21, 2016

AMERICAN NATIONAL STANDARD

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FOREWORD (This Foreword is not a part of ANSI/BHMA A156.115)

This Standard was first published by the Door and Hardware Institute in a series of individual A115 standards, which are now combined into single documents for steel and wood doors. ANSI approval was secured under the Canvass Method. BHMA was accredited on 21 March 1983 by ANSI as a sponsor using the Canvass Method.

This Standard was developed as a joint effort by members of SDI, WDMA, DHI, HMMA, BHMA and CSDMA. The committee is grateful to Allan Ashachik for his guidance and technical contributions as the first chairman of the reconstituted group. The BHMA recognizes that errors will be found, items will become obsolete, and new products, methods and materials will be developed. With this in mind, the Association plans to update, correct and revise these Standards on a regular basis.

It is recommended that individual manufacture's catalogs be consulted.

Users of this Standard should also consult applicable local building codes as to requirements affecting the functions of hinges used on fire doors.

TABLE OF CONTENTS		
Page Number	Former A115 Series	Title
5	NA	SCOPE AND PURPOSE
5	NA	GENERAL REQUIREMENTS
5	NA	APPLICABLE DOCUMENTS
5	NA	DEFINITIONS
8	A115.1	Preparation of 1 -3/4" Steel Doors and Frames Mortise Locks
9	A115.1	Preparation of 1 -3/4" Steel Doors and Frames Mortise Locks with Escutcheon Trim
10	A115.2	Preparation of 1 -3/8" Steel Doors and Frames for Bored Locks and Latches
11	A115.2	Preparation of 1 -3/4" Steel Doors and Frames for Bored Locks and Latches
12	A115.4	Preparation of 1 -3/4" Steel Doors and Frames for Manually and Automatic Operated Lever Extension Flush Bolts
13	A115.6	Preparation of 1-3/4" Steel Doors and Steel Frames For Preassembled Door Locks
14	A115.13	Preparation of 1-3/4" Steel Doors and Steel Frames for Bored Deadlatches
15	A115.14	Preparation of 1 3/4" Steel Doors for Open Back Strikes
16	A115.15	Preparation of 1-3/4" Steel Doors with Wood Edges and Steel Frames for Bored Locks
17	A115.16	Preparation of 1-3/4" Steel Doors with Wood Edges and Steel Frames for Double Locks
18	A115.17	Preparation of 1-3/4" Steel Doors and Steel Frames for Double Locks with 4" Centerline Spacing of Combined or Interconnected Lock or Latch
19	A115.17	Preparation of 1-3/4" Steel Doors and Steel Frames for Double Locks with 5 ½" Centerline Spacing of Combined or Interconnected Lock or Latch
20	A115.18	Preparation of 1-3/8" Steel Doors and Steel Frames for Bored Locks with Lever Handles
21	A115.18	Preparation of 1-3/4" Steel Doors and Steel Frames for Bored Locks with Lever Handles
22	New	Preparation of 1 3/4" Steel Doors and Frames for 4 1/2" Full Mortise Hinges
23	New	Preparation of 1 3/4" Steel Doors (non-handed) and Frames for 4 1/2"Full Mortise Hinges
24	New	Preparation of 1 3/4" Steel Doors and Frames for 5"Full Mortise Hinges
25	New	Preparation of 1 ¾" Steel Doors and Frames for 5"Full Mortise Electric Hinges
26	New	Preparation of 1 ¾" Steel Doors and Frames for 4 ½" Full Mortise Electric Hinges
27	New	Preparation of 1 3/4" Steel Doors and Frames for 4 1/2" Full Mortise Electric Hinges (non handed)

1. SCOPE AND PURPOSE

- 1.1 These Standards cover all significant dimensional attributes for mounting common hardware products in steel doors and frames. All dimensions shall be as shown on the accompanying drawings.
- 1.2 These standards were developed to show only the most commonly used preparations for door hardware, and provide targets for standardization. Where multiple configurations are in common usage, separate drawings are provided. For other configurations, it is recognized that these standards may be used in part, or with exceptions, while still providing some degree of basic guidance and standardization.

2. GENERAL REQUIREMENTS

- 2.1 **Preparations** covered by this standard are intended for use in doors $1 \frac{3}{4}$ inches (44.5mm) $\pm 1/16$ inch (1.6mm) in thickness unless otherwise specified.
- 2.2 The center line of the lock in the door shall be located in reference to the center line of its strike...
- 2.3 Location of Operable Parts in accessible openings shall be between 34 and 48 inches.
- 2.4 **Door Edge** Doors shall be furnished with a beveled or square edge unless otherwise specified.
- 2.5 **Door Reinforcement** Doors shall be reinforced to support the requirements of the hardware application.
- 2.6 **Tolerances** for cutouts are shown on individual drawings.
- 2.7 **Metric Equivalents** are shown in the Appendix (inclusion in the individual drawings is not possible due to size constraints).

3. APPLICABLE DOCUMENTS

- 3.1 ANSI/BHMA Standards A156.2 for Bored and Preassembled Locks and Latches, A156.5 for Auxiliary Locks, A156.12 for Interconnected Locks and Latches, A156.13 for Mortise Locks and Latches, A156.16 for Auxiliary Hardware, and other standards available at www.buildershardware.com.
- 3.2 Please consult the relevant standards of the participating Associations:

Canadian Steel Door Manufacturers Association www.csdma.org

Door and Hardware Institute www.dhi.org

Hollow Metal Manufacturers Association www.naamm.org

Steel Door Institute www.steeldoor.org

Window and Doors Manufacturers Association www.wdma.com

4. **DEFINITIONS**

- 4.1 **Auxiliary Dead Latch** A plunger which, when actuated, automatically locks a projected latch bolt against return by end pressure.
- 4.2 **Auxiliary Locks** A lock having a latch bolt or dead bolt operated by a key or a turn or both. This lock is often used in addition to another lock which is or is not key operated but has a latch bolt operated by knobs, levers or thumbpiece.
- 4.2.1 **Bored Dead Latch** A lock fitting round bored openings in the face and edge of a door and having a dead latch operated by a key or turn or both.
- 4.2.2 **Bored Dead Lock** A lock fitting round bored openings in the face and edge of a door and having a dead bolt operated by a key or turn or both.
- 4.3 **Bored Locks** Bored lock is used herein to designate locks having cylindrical shaped bodies which are