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AMERICAN NATIONAL STANDARD

FOR

EXIT DEVICES



SPONSOR

BUILDERS HARDWARE MANUFACTURERS ASSOCIATION

AMERICAN NATIONAL STANDARDS INSTITUTE

Approved June 9, 2014

AMERICAN NATIONAL STANDARD

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FOREWORD (This Foreword is not a part of ANSI/BHMA A156.3)

The general classification of builders hardware includes a wide variety of items which are divided into several categories. To recognize this diversity, a sectional classification system has been established. Exit devices is one such section and this Standard is the result of the collective efforts of members of the Builders Hardware Manufacturers Association, Inc. who manufacture these products. The total Product Standards effort is therefore, a collection of sections, each covering a specific category of items.

The BHMA recognized 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.

In most cases, products have been described in grade levels related to performance with Grade 1 being the highest rating. Some products described are suitable for use according to conditions and are not graded. Grade classifications indicate levels only within their own product category. Choice of grade and specific product should be made on the basis of utility, aesthetics, security objectives and end use desired.

The BHMA numbers which indicate types and functions of hardware do not identify size, finish, material or design and are not intended to be used without necessary supplementary information.

Users of this Standard are cautioned over the selection of exit devices to be installed on fire doors. Only devices investigated for both fire and panic protection may be used. Labels employed by laboratories listing such devices bear the designation, "Fire Exit Hardware." Other devices, although suitable for many doors within a means of egress, may not be used with fire door assemblies. The fire door must also bear a label containing the phrase, "Fire Door to be equipped with Fire Exit Hardware".

TABLE OF CONTENTS

I.	SCOPE	5
2.	GENERAL	5
3.	DEFINITIONS	6
4.	TYPES	7
5.	FUNCTIONS	7
6.	AUXILIARY ITEMS	8
7.	TEST METHODS	9
8.	INSIDE OPERATIONAL TESTS	.10
9.	OUTSIDE OPERATIONAL TESTS	.13
10.	STRENGTH TESTS	.14
11.	MATERIAL EVALUATION TESTS	.16
12.	COORDINATOR AND CARRY-OPEN BAR TESTS	.17
13.	AUTOMATIC FLUSH BOLT TESTS	.18
14.	FINISH TESTS	.18
API	PENDIX A (NOT A PART OF ANSI/BHMA A156.3)	.20
API	PENDIX B ILLUSTRATIONS OF EXIT DEVICE TYPES	.21
A DI	DENIDLY C TEST ELYTTIDES	27

1. SCOPE

- 1.1 This standard establishes requirements for exit devices and trim, automatic and self-latching flush bolts, removable mullions, coordinators, and carry-open bars. Performance criteria include cycle, operational, strength, material evaluation, and finish tests. Functions and types are described and numbered.
- 1.2 Tests described in this standard are performed under laboratory conditions. In actual usage, results vary because of installation, maintenance and environmental conditions.

2. GENERAL

- 2.1 All products certified to this standard shall be listed or labeled by a Nationally Recognized Testing Laboratory (NRTL) and be subject to periodic examination service.
- 2.2 Exit devices are available in Grades 1, 2, and 3 with grade 1 being the highest grade. All are suitable for all classes of buildings and are based on the performance tests listed. A Grade 1 exit device shall be furnished with all Grade 1 trim and cylinders, when supplied, in order to retain an overall Grade 1 rating. A Grade 2 exit device shall be furnished with grade 2, or higher, trim and cylinder in order to retain an overall Grade 2 rating; and similarly for Grade 3 rating.
- 2.3 Door coordinators Type 21A are available in Grade 1 and 2. Door coordinators Type 21B are available in Grade 2. Both Grades are suitable for all classes of buildings and are based on performance tests listed.
- 2.4 Carry-open bars are available in Grades 1 and 2. Both are suitable for all classes of buildings and are based on the performance test listed. When coordinators are installed with carry-open bars, the Grade of the combination is the lower Grade of either component.
- 2.5 All exit devices shall meet the requirements and performance tests found in Underwriters Laboratories, Inc. Standard UL305 Panic Hardware 2012.
- 2.6 The cycling requirements listed shall not be considered as being in addition to those required by UL305 but comprise the total required.
- 2.7 **Values** Required values in this Standard are given in US units. The SI (metric) equivalents are approximate. All values which do not carry specific tolerances or are not marked maximum or minimum shall have the following tolerances: Linear dimensions shall be $\pm 1/16$ in (1.6 mm). Pounds or pound force shall be $\pm 5\%$. Angular measurements shall be ± 4 degrees. Voltage measurements shall be ± 5 percent. Temperature measurements shall be ± 4 degrees F (± 2 degrees C).
- 2.8 For testing, other mechanisms are permitted to be used in lieu of cylinders providing the test performance is equivalent to that of a cylinder.
- 2.9 **Reference to ANSI Standards** ANSI Standards are available from the American National Standards Institute, 11 W. 42nd Street, New York, NY 10036 or www.buildershardware.com.