

ANSI MH26.2-2017
Revision of
ANSI MH26.2 - 2007



Design, Fabrication, Testing and Utilization of Welded-Wire Rack Decking



Storage Rack Decking Group

An Industry Group of MHI
8720 Red Oak Blvd., Suite 201
Charlotte, NC 28217-3992
standards@mhi.org

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**Rack Manufacturers Institute –
Storage Rack Decking Group
An Industry Group of MHI**
8720 Red Oak Blvd., Suite 201, Charlotte, NC, 28217-3992
Telephone: (704) 676-1190 Fax: (704) 676-1199
www.mhi.org/rmi
standards@mhi.org

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Rack Manufacturers Institute – Storage Rack Decking Group
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Approved February 17, 2017
American National Standards Institute, Inc.

FOREWORD. This standard, which was developed under the American National Standards Institute (ANSI) Canvass method and approved by ANSI on February 17, 2017, represents suggested design practices and operational requirements for dock leveling devices. It was developed by MHI, along with the Rack Manufacturers Institute ("RMI"), one of its Industry Groups, and is intended to provide useful information and guidance for owners, users, designers, purchasers or specifiers of material handling equipment or engaged in the manufacture, marketing, purchase, or use of welded-wire rack decking. It is advisory only and should only be regarded as a simple tool that its intended audience may or may not choose to follow, adopt, modify, or reject. A standard may be part of, but does not constitute a comprehensive safety program that cannot guard against pitfalls in operating, selecting and purchasing such a system, and should not be relied upon as such. Such a program should be developed by a qualified professional.

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The Storage Rack Decking Group is a subset of the **Rack Manufacturers Institute** (RMI), an MHI Industry Group. The Storage Rack Decking Group is comprised of a substantial portion of the major companies that design and manufacture welded-wire rack decking in the United States. This standard is the result of the group's recognition of the need to develop a comprehensive safety standard and establish minimum design and performance criteria to ensure the safe application and utilization of welded-wire rack decking, and was formulated under American National Standards Institute (ANSI) procedures.

This standard, which was originally approved by ANSI on November 15, 2007, represents design, operating and testing practices and performance criteria that may be used in determining product utilization.

At the date of approval of this amended standard, the Storage Rack Decking Group of RMI consisted of the following member companies:

- DACS, Inc.
- Husky Rack & Wire
- ITC
- J&L Wire Products
- Nashville Wire Products
- Prodeck 50 Inc.
- Worldwide Material Handling Products, LLC

Questions or suggestions for improvement regarding this standard are welcome. They should be sent to: MH26.2 Committee (RMI), MHI, 8720 Red Oak Blvd., Suite 201, Charlotte, NC, 28217; standards@mhi.org.

Design, Fabrication, Testing and Utilization of Welded-Wire Rack Decking

Contents

1	Purpose and scope	1
1.1	Purpose	1
1.2	Limitations	1
2	Normative references.....	1
3	Definitions	2
3.1	General.....	2
4	Materials	6
5	Dimensional and descriptive characteristics.....	6
5.1	Nominal dimensions and descriptive characteristics	6
5.2	Actual dimensions	7
5.3	Manufacturing tolerances.....	7
6	Design and fabrication procedures	7
6.1	Design procedures	7
6.2	Fabrication procedures	7
6.2.1	Welding	7
6.2.2	Wires	7
6.2.3	Reinforcement members.....	8
7	Two-line load test procedures.....	8
7.1	General.....	8
7.2	Safety factors	8
7.2.1	Deflection limit.....	8
7.2.2	Stress safety factor.....	8
7.3	Equipment required.....	8
7.4	Procedure.....	9
7.5	Allowable work load capacity ratings	10

List of Figures

Figure 1.	Section through a typical bay in a storage rack system	2
Figure 2.	Deck section	3
Figure 3.	Deck section with reinforcement.....	3
Figure 4.	Box beam.....	4
Figure 5.	Step beam.....	5
Figure 6.	Two line-load testing diagram for 42 in. deep decking assembly.....	9

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1 Purpose and scope

1.1 Purpose

This standard is established to provide a guideline for design, testing, fabrication and utilization of welded-wire mesh rack decking utilized as an accessory for industrial steel storage racks.

This standard applies to uniformly loaded rack decking fabricated from welded-wire mesh with permanently attached reinforcements for use in storage racks. The purpose for such rack decking is to provide storage capability by creating a surface, in conjunction with a rack upon which to place materials that may be on pallets, in containers, or in some other form.

1.2 Limitations

This standard does not apply to:

- rack decking manufactured prior to date of adoption of this standard;
- rack decking that has been improperly installed, altered, damaged, or used in any manner other than that for which it was originally intended, designed, purchased, sold, or a combination thereof;
- decking or shelf surface materials other than welded-wire rack decking; or
- decking or surfaces intended to carry anything other than static loads (e.g. impact or moving loads due to walking or stepping).

2 Normative references

The following standards contain provisions, which through reference in this text, constitute provisions of this American National Standard. At the time of publication of this document, the editions indicated were valid. All standards are subject to revision, and parties to agreements based on this American National Standard are encouraged to investigate the possibility of applying the most recent editions of the standards indicated below.

ANSI/AWS D1.1/D1.1M:2015, *Structural Welding Code – Steel*

ANSI/AWS D1.3/D1.3M:2008 *Structural Welding Code – Sheet Steel*

AWS C1.1M/C1.1:2012, *Recommended Practices for Resistance Welding*

AISC, *Steel Construction Manual, 14th Edition*

AISI Publication SG 671, 1991 (1986 edition with 1989 Addendum), *Specification for The Design of Cold-Formed Steel Structural Member, Allowable Stress Design*

AISI Publication SG 672, *Test Procedures for Use with August 19, 1986 Edition of the Cold-Formed Specification*

ASTM A510/A510M-13, *Standard Specification for General Requirements for Wire Rods and Coarse Round Wire, Carbon Steel, and Alloy Steel*

ASTM A1064/A1064M-16b, *Standard Specification for Carbon-Steel Wire and Welded Wire Reinforcement, Plain and Deformed, for Concrete*

ASTM A1011/A1011M-15, *Standard Specification for Steel, Sheet and Strip, Hot-Rolled, Carbon, Structural, High-Strength Low-Alloy, High-Strength Low-Alloy with Improved Formability, and Ultra-High Strength*

ASTM A1008/A1008M-03, *Standard Specification for Steel, Sheet, Cold-Rolled, Carbon, Structural, High-Strength Low-Alloy, High-Strength Low-Alloy with Improved Formability, Solution Hardened, and Bake Hardenable*