

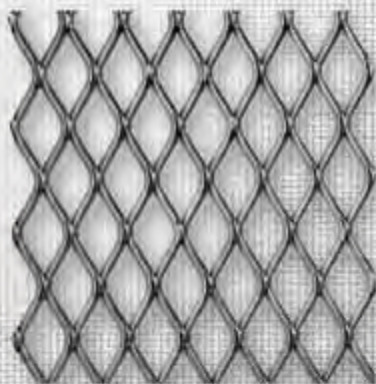
# Master Catalog

MC13

*Inspired to Serve!™*



Perforated Metal



Expanded Metal



Wire Mesh



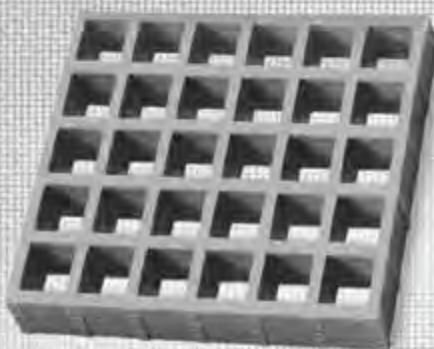
GRIP STRUT® Grating



PERF-O GRIP® Grating



Bar Grating



Molded Fiberglass Grating



DURADEK® Fiberglass Grating



## McNICHOLS

[mcnichols.com](http://mcnichols.com)

800.237.3820

800.237.9212 (español)





Bob McNichols, Founder  
(1922 - 1981)

Robert L. McNichols was a fighter. As the sole survivor of a B-17 Flying Fortress being shot down near Berlin in 1944 to his seven months in a German prisoner of war camp in World War II, Bob McNichols knew not only how to survive but how to persevere!

Taking that same strength and perseverance, Bob went on to start **McNICHOLS CO.** in 1952, with his wife Phyllis.

With holes in all the products he carried, Bob trademarked "The Hole Story." The trademark was first advertised in the 1975 **McNICHOLS** Master Catalog and began a legacy of *hole* references to products (Hole Products) and personnel (The Hole Team).



After the unexpected loss of Bob McNichols in 1981, his son Gene took over the leadership role at **McNICHOLS**. Gene carried on his father's legacy to transition the Company and ready it for the future.

In 1990, Gene made **McNICHOLS'** mission "Service, Quality and Performance." These three words embody the spirit of the organization. *Service* to customers; unfailing *quality* that is challenged and measured through ISO 9001:2008 certification; and *performance* that surpasses expectations for customers and provides a secure, fulfilling career for all Hole Team members.

As **McNICHOLS** celebrates its 61st Anniversary this year, the third generation of the McNichols family – with Scott McNichols, as president – is standing steady and making their mark, acting as stewards of the legacy passed on by their father and grandfather.

As an organization, **McNICHOLS** has grown beyond a small family business, while the essence and spirit of its founder remain ever present.

Service, Quality and Performance...  
that's The Hole Story®.

*Inspired to Serve!™*

Dear Customer,

It is no secret; today's pace is a blur. To earn your business **McNICHOLS** knows that you need solutions fast. At the same time, you deserve exceptional service! We can do both. In fact, our team knows that service excellence is not something they do in their spare time – they do it full time.

We have numerous Hole Product options and should have just what you need. However, what we think you will find, should you choose us, are honest people *Inspired to Serve* you. We will treat you like you deserve and will do what we said we would do – just like my grandfather used to do.

In Service,

Scott M. McNichols  
President

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Please note that application photos reflected are typical of our types of products in use that can be supplied or have been supplied by McNICHOLS CO. Some photos may depict uses designed, manufactured, fabricated or installed by others.



# Inspired to serve!™

Discover what literally hundreds of thousands of customers have come to know and trust since 1952 - **McNICHOLS** is the worldwide leader in providing Perforated Metal, Expanded Metal, Wire Mesh, Designer Metals, as well as a full line of Grating and Flooring Products. Our loyal customers continue to rely on our experience, vast product inventory and shipping options to produce the right hole solution for their projects. As an ISO 9001:2008 certified company, we will provide you with an unsurpassed level of **Service, Quality, and Performance...** that's The Hole Story®!



## SERVICE

Whether your requirements are large or small, **our highly trained Hole Team Associates** are committed to meeting your needs accurately and efficiently.

## QUALITY

All of our service centers are **ISO 9001:2008 certified** with fabricators that are **American Welding Standard (ASW) Certified**. Our quality programs help insure that you receive your hole products with the highest level of service.

## PERFORMANCE

With **same day stock shipment** we can meet your needs in the fastest, most efficient manner possible. Our number one goal is to serve our customers by getting hole products to them when they need it.



See page 56 for a list of our Fabrication Services.

## LOCATIONS

We have 18 service centers strategically located throughout the U.S. to provide our customers with fast service!

### CORPORATE HEADQUARTERS

2502 N. Rocky Pt. Drive, Ste. 750, Tampa, FL 33607  
PO Box 30300, Tampa, FL 33630

#### ATLANTA

Bldg 6, #300  
1980 Shiloh Road NW  
Kennesaw, GA 30144

#### BALTIMORE

9070 Junction Drive #M  
Annapolis Junction, MD 20701

#### BOSTON

33 High Street  
North Billerica, MA 01862

#### CHARLOTTE

2307 Distribution Ctr. Dr., #F  
Charlotte, NC 28269

#### CHICAGO

251 Wille Road #C  
Des Plaines, IL 60018

#### CINCINNATI

3470 E. Kemper Road  
Cincinnati, OH 45241

#### CLEVELAND

4889 NEO Parkway  
Cleveland, OH 44128

#### DALLAS

3540 W. Miller Road, #240  
Garland, TX 75041

#### DENVER

OPENING 2013

#### HOUSTON

16405 Air Center Blvd.#100  
Houston, TX 77032

#### KANSAS CITY

15341 W. 100th Terrace  
Lenexa, KS 66219

#### LOS ANGELES

14108 Arbor Place  
Cerritos, CA 90703

#### MINNEAPOLIS

22 Fifth Avenue NW  
New Brighton, MN 55112

#### NJ/NYC Area

2 Home News Row  
New Brunswick, NJ 08901

#### PHOENIX

5525 W. Latham Street, #7  
Phoenix, AZ 85043

#### SAN FRANCISCO

174 Lawrence Drive, Suite G  
Livermore, CA 94551

#### SEATTLE

1221-A 29th Street NW  
Auburn, WA 98001

#### TAMPA

9401 Corporate Lake Drive  
Tampa, FL 33634

## INDUSTRIES SERVED

We are privileged to serve thousands of customers across many industries. Below are just a few of the industries we serve:

Architectural  
Construction  
Distributors  
Energy

Government  
Hospitality  
Maintenance  
Metal Fabrication

Manufacturing  
Marine  
Residential  
Utilities

## HOW TO ORDER

Ordering is easy!

Just call **800.237.3820**  
or visit **mcnichols.com**.  
(español) **800.237.9212**  
(International) **813.739.1095**

To better assist you, please have the following information available:

- Application or use of product
- Material
- Size
- Quantity
- Finish / Surface
- Fabrication Services
- Accessories

## CONTACT US

Reaching us is now even easier!

On-line: **mcnichols.com**  
Email: **sales@mcnichols.com**  
(español) **ventas@mcnichols.com**  
App: **McNICHOLS CO.** (Free download)  
Phone: **800.237.3820**  
(español) **800.237.9212**  
(International) **813.739.1095**

You can also find us on Facebook,  
LinkedIn, Pinterest and Twitter.

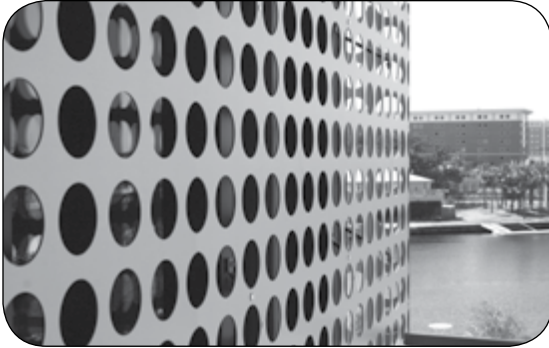


Look for these convenient QR Codes throughout our catalog and scan with your smart phone for more product details. You may also type in the web codes provided in this catalog at **mcnichols.com**.





Tampa Museum of Art



3,798 Perforated Panels were used on the exterior

## McNICHOLS CASE STUDY: TAMPA MUSEUM OF ART

### CUSTOMER VISION:

The architect's vision for the exterior metal skin for the Tampa Museum of Art was to apply a material with reflective and patterned qualities that would capture the movement of the sky, clouds and rippling waters of the adjacent Hillsborough River.

### HOLE SOLUTION:

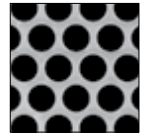
**McNICHOLS®** Perforated Aluminum Panels were applied as a double-layered facade around the upper exterior levels of the museum. They were purposefully installed slightly offset from one another to create a moiré pattern that simulates motion. To add further artistry, a special LED lighting system was installed between the layers creating a phenomenal mural for displaying electronic light shows at night.

The project called for over 3,798 panels of varying sizes with three-inch diameter holes configured in a straight row pattern, one inch apart. The low maintenance, corrosion-free panels were anodized with a clear coating for a satin-polished effect.

For continuity, the perforated panels were also used inside to clad many walls of the museum.

**McNICHOLS®**  
Quality Hole Products used:

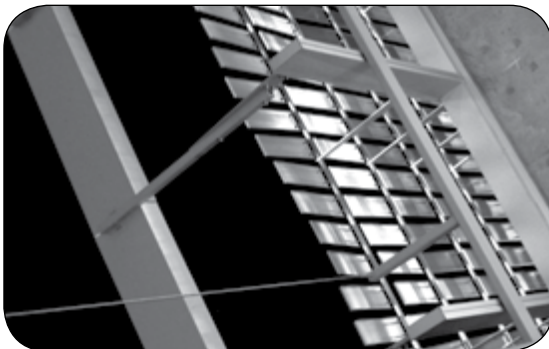
Perforated



page 4



Chandler City Hall in Chandler, Arizona



2,500 perforated panels hang on the building's facade

## McNICHOLS CASE STUDY: CHANDLER CITY HALL

### CUSTOMER VISION:

The architects of Chandler City Hall in Chandler City, Arizona, wanted to create a graphical element that would replicate the forms of nature and also provide shade and reduce solar heat gain for the building.

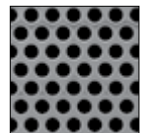
### HOLE SOLUTION:

The artist, Ned Kahn, used **McNICHOLS®** Perforated Metal to create "Turbulent Shade," a wall of 6-by-12-inch stainless steel panels designed to swing with the desert wind gusts, provide shade during the day, reduce solar heat gain during hot summer afternoons, and make a statement about the community's commitment to sustainability.

The 18-gauge panels have a 1/16-inch round hole that is 1/8-inch center staggered, creating 23% light diffusion. Attached to a stainless steel bar by two metal cylinder arms that float in a grommet, each perforated metal panel glides in the grommet ring, sitting about 30 inches from the building's glass curtain wall system.

**McNICHOLS®**  
Quality Hole Products used:

Perforated



page 4

Please be sure to specify **McNICHOLS** on your next project. Thank you!

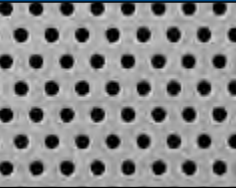
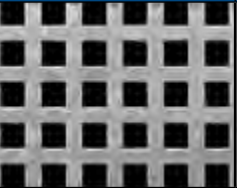


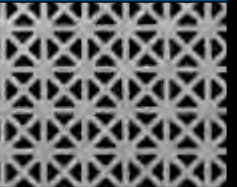


# PERFORATED






**McNICHOLS** has the largest selection of Perforated in North America in a variety of hole shapes, sizes, gauges and material types.

Perforated Metal is used for its versatility, high strength-to-weight ratio and aesthetic appeal. Perforated can also be used for screening of fluids and ventilation of air, light, sound and gases.

## PRODUCT OPTIONS

	ROUND HOLE	SQUARE HOLE	SLOTTED	HEXAGONAL	DESIGNER
Pattern Types					
	pg. 4 / webcode: PR1	pg. 6 / webcode: PR2	pg. 6 / webcode: PR3	pg. 7 / webcode: PR4	pg. 7 / webcode: PRD1

## PRODUCT SPECIFICATIONS

Materials	Plain Steel, Aluminum, Pre-Galvanized Steel, Stainless Steel	Plain Steel, Aluminum	Plain Steel	Plain Steel, Aluminum	Plain Steel, Aluminum
Thickness/ Gauges	.020 to 3/8	.032 to 18	16, 22	.032 to 22	.040 to 24
Hole Sizes	.027" to 1"	.020" to .75"	Widths: .125" to .20" Lengths: .637" to 10"	.25" to .50"	vary with pattern
Hole Centers	.50" to 1.25"	.50" to 1"	.50" to 1.25"	.2813" to .5625"	vary with pattern
Standard Sheet Sizes	3'x8', 4'x8', 3'x10', 4'x10', 4'x12', 5'x10', 5'x12'	3'x8', 4'x8', 4'x10'	3'x8', 3'x10'	3'x8', 4'x8', 3'x10', 4'x10'	3'x8', 3'x10', 4'x10'
% Open Area	5% to 63%	11% to 56%	41% to 74%	79%, 80%	35% to 68%
QR Code (Scan using a QR Reader on your smart phone)					

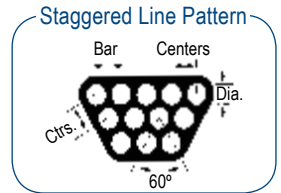
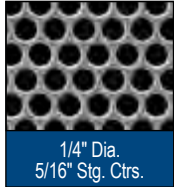
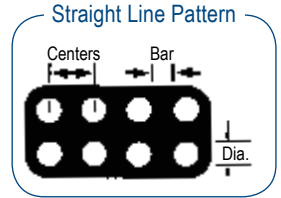
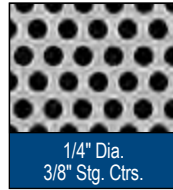
Not all product combinations are available. See [mcnichols.com](http://mcnichols.com) for availability.

## PERFORATED APPLICATIONS



ROUND HOLE PERFORATED WEB CODE: PR1

Round Hole Perforated is an extremely versatile product offered in various diameters, gauges, materials and sheet size options.



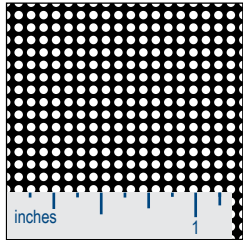
**NOTE:** Pictures are not to scale. For actual scale diagrams please see page 5.

## ROUND HOLE STOCK LIST

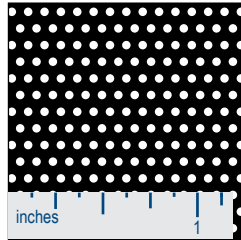
HOLE DIAMETER	CENTERS	GAUGE*	%O/A	HOLE DIAMETER	CENTERS	GAUGE*	%O/A	HOLE DIAMETER	CENTERS	GAUGE*	%O/A
PLAIN STEEL				ALUMINUM ALLOY				STAINLESS STEEL 304 (Continued)			
.027" RD	.050" Str	26	23%	.033" RD	.050" Str	.032	34%	3/32" RD	5/32" Stg	22, 20, 18, 16	33%
.045" RD	.066" Str	24	36%	1/16" RD	3/32" Stg	.032, .063	41%	3/32" RD	3/16" Stg	22	22%
.045" RD	.088" Stg	24	24%	1/16" RD	7/64" Stg	.063	30%	1/8" RD	3/16" Stg	22, 20, 18, 16, 14, 12, 11	40%
1/16" RD	3/32" Stg	24, 22, 20	41%	1/16" RD	1/8" Stg	.032, .040	23%	5/32" RD	3/16" Stg	24, 20, 18, 16	63%
1/16" RD	7/64" Stg	16	30%	.079" RD	1/8" Stg	.032	36%	3/16" RD	1/4" Stg	22, 20, 18, 16	51%
1/16" RD	1/8" Stg	22, 20, 18, 16	23%	3/32" RD	5/32" Stg	.032, .050, .080	33%	3/16" RD	5/16" Stg	16, 11	33%
.075" RD	.100" Stg	18	51%	3/32" RD	3/16" Stg	.050	23%	1/4" RD	5/16" Stg	22, 20, 18, 16	58%
5/64" RD	7/64" Stg	20	46%	.117" RD	5/32" Stg	.032	51%	1/4" RD	3/8" Stg	22, 20, 18, 16, 14, 11, 3/16	40%
5/64" RD	1/8" Stg	18, 16	36%	1/8" RD	3/16" Stg	.032, .050, .063, .125	40%	5/16" RD	7/16" Stg	16	46%
3/32" RD	5/32" Stg	24, 22, 18, 16, 14	33%	5/32" RD	3/16" Stg	.063	63%	3/8" RD	1/2" Stg	11	51%
3/32" RD	3/16" Stg	14	23%	3/16" RD	1/4" Stg	.032, .050, .063, .125	51%	3/8" RD	9/16" Stg	16, 14, 11	40%
.117" RD	5/32" Stg	22	51%	3/16" RD	5/16" Stg	.063, .125	33%	1/2" RD	11/16" Stg	16, 14, 11, 3/16, 1/4	48%
1/8" RD	3/16" Stg	24, 22, 20, 18, 16, 14, 12, 11	40%	3/16" RD	3/8" Stg	.040	23%	3/4" RD	1" Stg	16, 11	51%
1/8" RD	7/32" Stg	12	30%	1/4" RD	5/16" Stg	.063, .125	58%	1" RD	1-1/4" Stg	11	58%
1/8" RD	1/4" Stg	20, 16	23%	1/4" RD	3/8" Stg	.040, .063, .125	40%	1/4" Perf-Panl Indented	1" Str	20	5%
9/64" RD	3/16" Stg	20, 18, 11	51%	1/4" RD	1/2" Stg	.250	23%	PRE-GALVANIZED G90			
5/32" RD	3/16" Stg	22, 20, 18, 16	63%	3/8" RD	9/16" Stg	.063, .125	40%	1/16" RD	3/32" Stg	22	41%
3/16" RD	1/4" Stg	22, 20, 18, 16, 14, 12, 11	51%	1/2" RD	11/16" Stg	.063, .125, .250	48%	3/32" RD	3/16" Stg	22, 20	23%
3/16" RD	5/16" Stg	18, 16, 11, 3/16	33%	3/4" RD	1" Stg	.063, .125	51%	1/8" RD	3/16" Stg	24, 20, 18, 16	40%
3/16" RD	3/8" Stg	14	23%	1" RD	1-1/4" Stg	.125	58%	5/32" RD	3/16" Stg	22	63%
1/4" RD	5/16" Stg	20, 18, 16, 14, 12	58%	STAINLESS STEEL 316				3/16" RD	1/4" Stg	18, 16	51%
1/4" RD	3/8" Stg	20, 18, 16, 14, 12, 11, 10, 3/16, 1/4	40%	1/16" RD	3/32" Stg	22, 20	41%	1/4" RD	5/16" Stg	20	58%
1/4" RD	1/2" Str	20	20%	1/16" RD	1/8" Stg	22, 20, 18	23%	1/2" RD	11/16" Stg	18	48%
1/4" RD	1/2" Stg	20, 16, 14, 11	23%	3/32" RD	3/16" Stg	22	22%	MISCELLANEOUS			
1/4" RD	1" Str	20	5%	1/8" RD	3/16" Stg	22, 20, 18, 16, 14, 12, 11	40%	.033" RD	.056" Str	.020 Brass/Alloy	28%
5/16" RD	3/8" Stg	16	63%	5/32" RD	3/16" Stg	24, 20, 18, 16	63%	1/8" PlastiPerf	3/16" Stg	.063 Polypropylene	40%
5/16" RD	7/16" Stg	11	46%	3/16" RD	1/4" Stg	22, 20, 18, 16	51%	3/16" PlastiPerf	5/16" Stg	.125 Polypropylene	32%
3/8" RD	1/2" Stg	11, 1/4	51%	1/4" RD	5/16" Stg	22, 20, 18, 16	58%	Typical sheet sizes for Round Hole Perforated Metal are 3'x8', 4'x8', 3'x10' and 4'x10'.			
3/8" RD	9/16" Stg	20, 16, 12, 11, 3/16, 14	40%	1/4" RD	3/8" Stg	22, 20, 18, 16, 14, 11, 3/16	40%	<b>NOTE:</b> Stock items are not carried in all locations and on-hand quantities are subject to change. RETURNS are not allowed on goods made-to-order or cut-to-size.			
1/2" RD	11/16" Stg	20, 16, 14, 11, 10, 3/16, 1/4, 3/8	48%	1/2" RD	11/16" Stg	16, 14, 11, 3/16, 1/4	48%	*See page 8 for Table of Gauges and Weights.			
3/4" RD	1" Stg	16, 11, 3/16, 1/4	51%	STAINLESS STEEL 304							
1" RD	1-1/4" Stg	11, 1/4	58%	.033" RD	.055" Str	26	28%				
				.045" RD	.066" Str	26, 24	36%				
				1/16" RD	3/32" Stg	22, 20	41%				
				1/16" RD	1/8" Stg	22, 20, 18	23%				
				5/64" RD	7/64" Stg	20	46%				



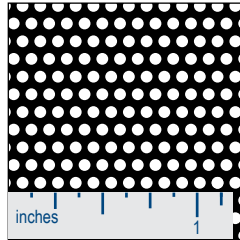
## PERFORATED HOLE DIAMETERS TO SCALE



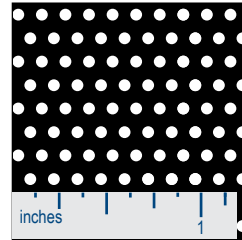
.045" on .066" Str. 36% O/A



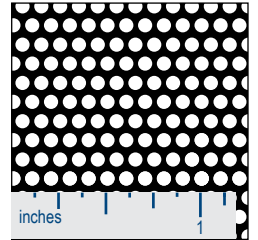
.045" on .088" Stg. 24% O/A



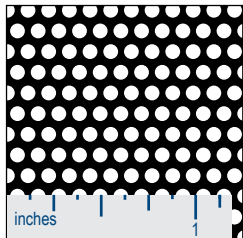
1/16" on 3/32" Stg. 41% O/A



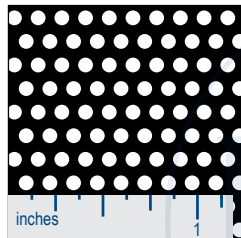
1/16" on 1/8" Stg. 23% O/A



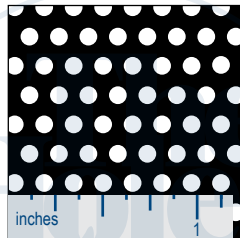
.075" on .100" Stg. 51% O/A



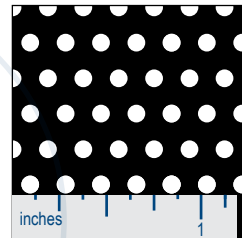
5/64" on 7/64" Stg. 46% O/A



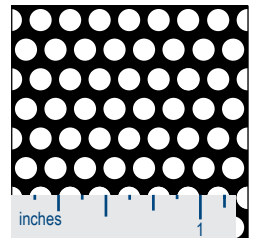
5/64" on 1/8" Stg. 36% O/A



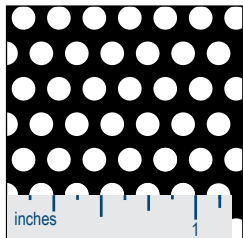
3/32" on 5/32" Stg. 33% O/A



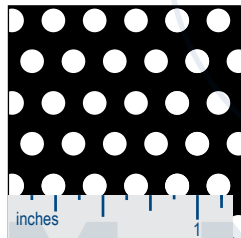
3/32" on 3/16" Stg. 23% O/A



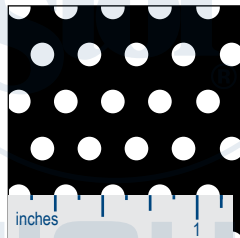
.117" on 5/32" Stg. 51% O/A



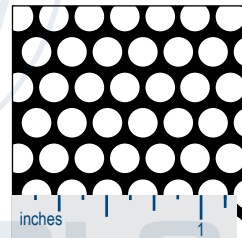
1/8" on 3/16" Stg. 40% O/A



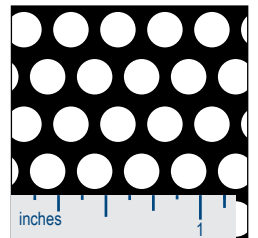
1/8" on 7/32" Stg. 30% O/A



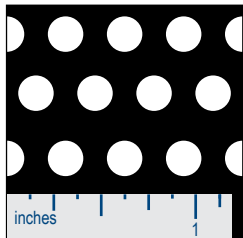
1/8" on 1/4" Stg. 23% O/A



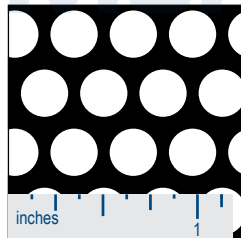
5/32" on 3/16" Stg. 63% O/A



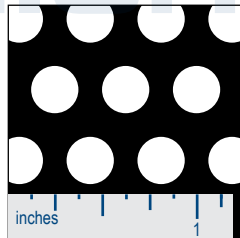
3/16" on 1/4" Stg. 51% O/A



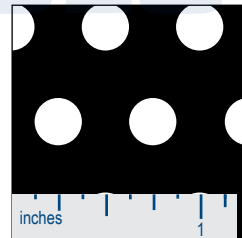
3/16" on 5/16" Stg. 32% O/A



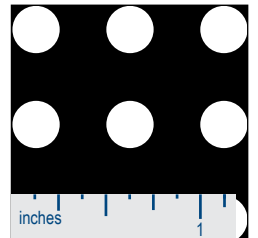
1/4" on 5/16" Stg. 58% O/A



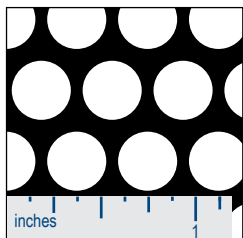
1/4" on 3/8" Stg. 40% O/A



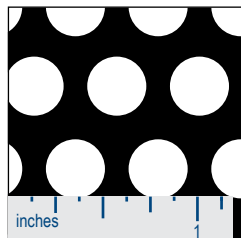
1/4" on 1/2" Stg. 23% O/A



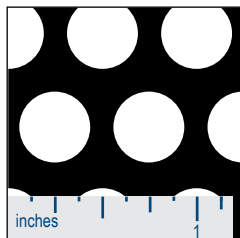
1/4" on 1/2" Str. 32% O/A



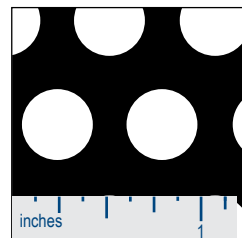
5/16" on 3/8" Stg. 63% O/A



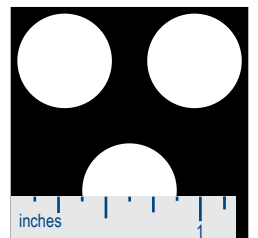
5/16" on 7/16" Stg. 46% O/A



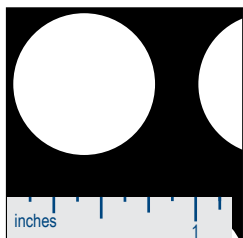
3/8" on 1/2" Stg. 51% O/A



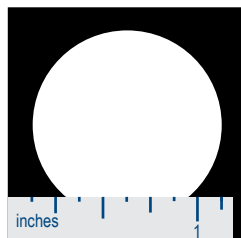
3/8" on 9/16" Stg. 40% O/A



1/2" on 11/16" Stg. 48% O/A



3/4" on 1" Stg. 51% O/A



1" on 1-1/4" Stg. 58% O/A

**Guidelines for Minimum Hole Size/Minimum Bar Width**

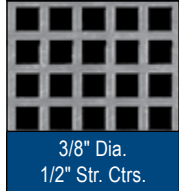
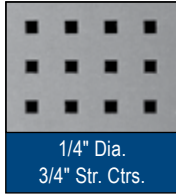
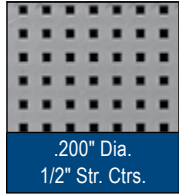
The rule of thumb for perforating is that the hole diameter should not be less than the thickness of the material. The closer to a one-to-one ratio, the higher the probability of tool failure and the greater the precautions necessary to avoid it.

Modifications can be made in certain instances at additional costs. For stainless steel and similar higher strength materials, it is preferable to specify at least three thickness gauges thinner than the hole diameter.

The same general rule applies to bar width. The bar width should be greater than material thickness because of the increased number of punches and, therefore, increased perforation tonnage. The bar width can be adjusted at increased costs.

**SQUARE HOLE PERFORATED** WEB CODE: PR2

Square Hole Perforated is an attractive alternative to round holes in some applications.

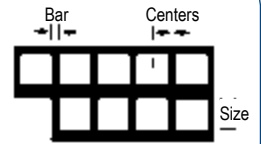
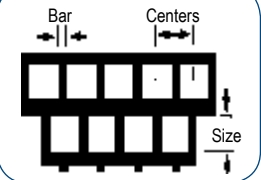


NOTE: Pictures are not to scale.

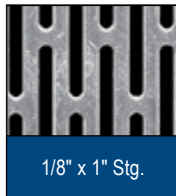
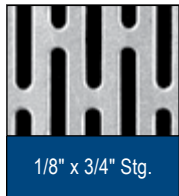
**SQUARE HOLE STOCK LIST**

HOLE SIZE	CENTERS	GAUGE	OPEN AREA	SHEET SIZE
PLAIN STEEL				
.200" SQ	1/2" Str	18	16%	4' x 10'
3/8" SQ	1/2" Str	16	56%	3' x 8', 4' x 10'
1/2" SQ	11/16" Str	16, 12	53%	4' x 10'
3/4" SQ	1" Str	16, 11	56%	4' x 10'
ALUMINUM 5052-H32				
1/4" SQ	3/4" Str	.032	11%	4' x 10'
ALUMINUM 3003-H14				
5/16" SQ	1/2" Str	.050	39%	4' x 8'
3/8" SQ	1/2" Str	.032	56%	4' x 10'
1/2" SQ	1/16" Str	.050, .063	53%	4' x 8', 4' x 10'

NOTE: Stock items are not carried in all locations and on-hand quantities are subject to change. **RETURNS** are not allowed on goods made-to-order or cut-to-size.

**Straight Line Pattern****Staggered Line Pattern****SLOTTED HOLE PERFORATED** WEB CODE: PR3

Slotted Hole Perforated are elongated holes with round or square ends in a straight line or side or end staggered pattern.



NOTE: Pictures are not to scale.

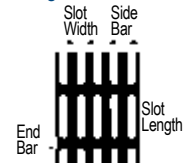
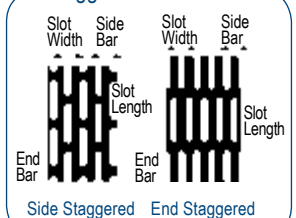
**SLOTTED HOLE STOCK LIST**

STOCK NUMBER	SLOT SHAPE	SLOT SIZE	PATTERN	GAUGE	OPEN AREA	SHEET SIZE
PLAIN STEEL						
1620632231	Square	.200" x .637"	Straight Line	22	74%	3' x 10'
1688002238	Round Moire	.125" x .75"	Side Staggered	22	41%	3' x 8'
1689001631	Round	.125" x 1"	Side Staggered	16	43%	3' x 10'

NOTE: Stock items are not carried in all locations and on-hand quantities are subject to change. **RETURNS** are not allowed on goods made-to-order or cut-to-size.

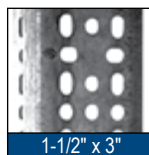
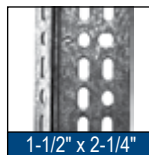
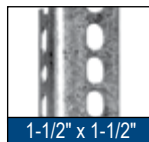
**PRODUCT SAMPLES**

Please call 800.237.3820 to request a sample of any of our hole products. We look forward to serving you!

**Straight Line Pattern****Staggered Line Pattern****FLEX ANGLE® SLOTTED ANGLE SYSTEM**

FLEX ANGLE® is offered in a perforated zinc-coated, pre-galvanized material commonly used for storage racks and other multiple purposes.

WEB CODE: SSFA1

**FLEX ANGLE® STOCK LIST**

STOCK NUMBER	GAUGE	ANGLE LEG SIZE X LENGTH	FEET / PKG.	SHIP WT.
84SA140110	14	1-1/2" x 1-1/2" x 10'	100 ft.	78#
84SA140120	14	1-1/2" x 1-1/2" x 12'	120 ft.	95#
8400140110	14	1-1/2" x 2-1/4" x 10'	100 ft.	95#
8400120112	12	1-1/2" x 3" x 12'	120 ft.	162#
8400140112	14	1-1/2" x 2-1/4" x 12'	120 ft.	113#

**CONSTRUCTION:** Slotted Angle—Holes are punched after material has been galvanized  
**MATERIAL:** Pre-Galvanized Steel (with zinc coating thickness of at least .001")  
**SIZES:** 1-1/2" x 1-1/2", 2-1/4" or 3" (Can be cut-to-size)  
**PACKAGE:** 10 lengths of angle, 75 nuts and bolts



**HEXAGONAL PERFORATED** WEB CODE: PR4

Hexagonal Perforated offers substantial open areas and is used primarily for architectural applications.

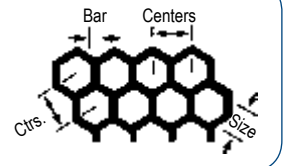


NOTE: Pictures are not to scale.

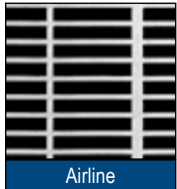
HEXAGONAL STOCK LIST				
HOLE SIZE	PATTERN	GAUGE	OPEN AREA	SHEET SIZE
PLAIN STEEL				
1/4" Hex	9/32" Stg.	22 Honeycomb	79%	3' x 10'
1/2" Hex	9/16" Stg.	16	80%	3' x 8', 4' x 8', 4' x 10'
ALUMINUM 3003-H14				
1/4" Hex	9/32" Stg.	.032 Honeycomb	79%	3'x10', 4' x 10'

NOTE: Stock items are not carried in all locations and on-hand quantities are subject to change. RETURNS are not allowed on goods made-to-order or cut-to-size.

## Staggered Line Pattern

**DESIGNER PERFORATED** WEB CODE: DMP1

Designer Perforated offers a functional yet striking design for your project with a diverse selection of styles. See more Designer Selections on page 19 and inside back cover.



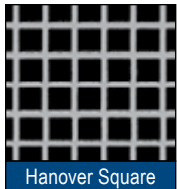
Airline



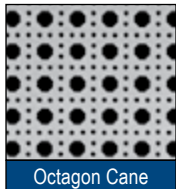
Full Cloverleaf



Grecian



Hanover Square



Octagon Cane



Windsor

NOTE: Pictures are not to scale.

DESIGNER STOCK LIST				
PATTERN	GAUGE	OPEN AREA	SHEET SIZE	DESCRIPTION
PLAIN STEEL				
Airline	16, 18	68%	3' x 8', 3' x 10'	1/4" x 1-1/2" Rectangular Slots, Straight Row
Full Cloverleaf	20	51%	3' x 8'	1/2" Staggered Clovers
Grecian	24, 22	24%	3' x 8', 3' x 10'	Triangular Holes
Hanover Square	22, 20	64%	3' x 10'	2/10" Square on 1/4" Straight Row
Octagon Cane	22	36%	3' x 8'	9/32" Octagons on 7/64" Straight Row
Windsor	20	45%	3' x 8'	Triangular and Diamond Holes
ALUMINUM				
Airline	.063	68%	3' x 10', 4' x 10'	1/4" x 1-1/2" Rectangular Slots Straight Rows
Windsor	.040	45%	3' x 8'	Triangular and Diamond Holes

NOTE: Stock items are not carried in all locations and on-hand quantities are subject to change. RETURNS are not allowed on goods made-to-order or cut-to-size.

**FRAMING SOLUTIONS****FRAMING SOLUTIONS** WEB CODE: AHE1

McNICHOLS has many framing options to choose from including Hemmed Edging, U-Edging, Flat Bar and Angle.



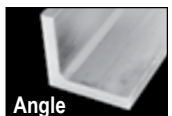
Hemmed Edging



U-Edging

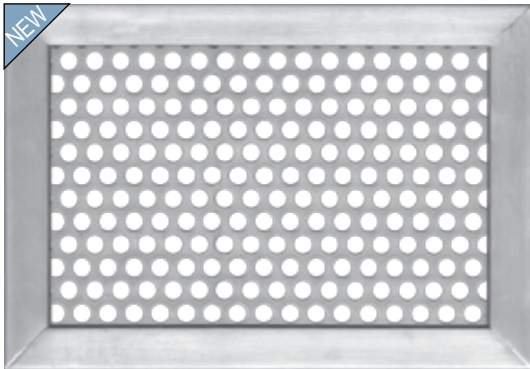


Flat Bar



Angle

For U-Edging see page 11



McNICHOLS® Hemmed Edging is a new, high quality folded-edge framing that is perfect for infill panels, partitions and inserts. Drain holes available.

HEMMED EDGING STOCK LIST							
STOCK NUMBER	WIDTH	OPENING	WEIGHT PER FT.	LENGTH	MATERIAL		USED FOR
4081610405	1.25"	.045"	.91# LF	60"	304 SS - 2B**	14 GA	16 GA
4081410605	1.25"	.060"	.91# LF	60"	304 SS - 2B**	14 GA	14 GA
40S1610405	1.25"	.045"	.91# LF	60"	304 SS - #4*	14 GA	16 GA
40S1410605	1.25"	.060"	.91# LF	60"	304 SS - #4*	14 GA	14 GA
4071610308	1.25"	.035"	.33# LF	96"	AL 3003	.080 GA	16 GA
4071410508	1.25"	.050"	.33# LF	96"	AL 3003	.080 GA	14 GA
4001610408	1.25"	.045"	.73# LF	96"	PLAIN STEEL	16 GA	16 GA
4001410608	1.25"	.060"	.91# LF	96"	PLAIN STEEL	14 GA	14 GA

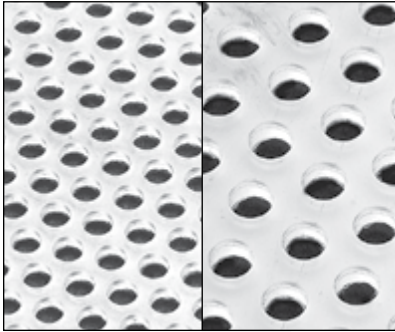
NOTES: Openings up to .120" may be special ordered for all three materials shown.

\* - #4 has a "brushed or satin" finish

\*\* - 2B has annealed, pickled and bright cold rolled finish.

Neither - #4 OR -2B are "mill finish."

## PLASTIPERF™ WEB CODE: PRPP1



PLASTIPERF™ is made from polypropylene plastic that excels in damp or corrosive environments and is non-magnetic, anti-static and lightweight.

## TYPICAL INDUSTRIES

Plating • Fish Hatcheries  
Food • Electronics

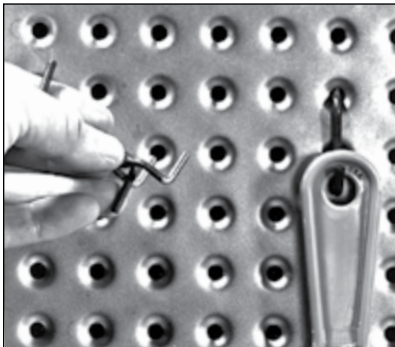
## APPLICATIONS

Signs • Filters • Baskets • Strainers  
Sizing Screens • Insulation Parts

## PLASTIPERF™ STOCK LIST

STOCK NUMBER	ROUND	CENTERS	GAUGE	OPEN AREA	# SQ. FOOT	SIZE
1P18311648	1/8"	3/16" Stg.	.063"	40%	.18	48"x96"
1P31511148	3/16"	5/16" Stg.	.125"	32%	.39	48"x96"

## PERF-PANL™ WEB CODE: PRP1



PERF-PANL™ has indented round holes and is typically used for display, exhibits, and fixtures. Available from stock in both plain steel and stainless steel.

## APPLICATIONS

Display Fixtures • Store Wall Panels • Custom Exhibits  
Point-of-Purchase • Utility Dividers

## PERF-PANL™ STOCK LIST

STOCK NUMBER	ROUND	CENTERS	GAUGE	OPEN AREA	# SQ. FOOT	SIZE
1614962048	1/4"	1" Str.	20	5%	1.42	48"x96"
1614962041	1/4"	1" Str.	20	5%	1.42	48"x120"
1814962048 (Stainless Steel)	1/4"	1" Str.	20	5%	1.42	48"x96"

## TABLE OF GAUGES AND WEIGHTS

	Steel		Galvanized Steel		Stainless USS Gauge			Monel		Brass		Copper		Aluminum	
	USS Gauge Rev.		USS Gauge		lbs. per sq. ft.			USS Gauge		B&S Gauge		BW Gauge		B&S Gauge	
Gauge	Decimal Thick	#/SF	Decimal Thick	#/SF	Decimal Thick	Chrome Alloy	Chrome Nickel	Decimal Thick	#/SF	Decimal Thick	#/SF	Decimal Thick	#/SF	Decimal Thick	#/SF
32	.0100	.408	.0134	.560	.009	.371	.378	.....	.....	.0080	.353	.0080	.371	.008	.113
31	.0110	.449	.0142	.594	.010	.412	.420	.010	.459	.0089	.392	.0100	.464	.009	.127
30	.0120	.490	.0157	.656	.012	.495	.504	.012	.551	.0100	.441	.0108	.500	.010	.141
29	.0135	.563	.0172	.719	.013	.536	.546	.014	.650	.0113	.498	.0126	.584	.011	.155
28	.0149	.625	.0187	.781	.015	.599	.610	.015	.689	.0126	.555	.0135	.625	.012	.170
27	.0164	.688	.0202	.844	.016	.660	.672	.....	.....	.0142	.626	.0159	.737	.014	.197
26	.0179	.750	.0217	.906	.0178	.736	.750	.018	.827	.0159	.700	.0162	.750	.016	.225
25	.0209	.875	.0247	1.031	.021	.866	.882	.021	.965	.0179	.789	.0189	.875	.018	.254
24	.0239	1.000	.0276	1.156	.0235	.972	.990	.025	1.148	.0201	.886	.0201	.932	.020	.282
23	.0269	1.125	.0306	1.281	.026	1.072	1.092	.028	1.286	.0226	.996	.0216	1.000	.022	.310
22	.0299	1.250	.0336	1.406	.0291	1.197	1.220	.031	1.424	.0254	1.115	.0226	1.050	.025	.353
21	.0329	1.375	.0366	1.531	.032	1.319	1.344	.034	1.562	.0285	1.256	.0243	1.125	.028	.395
20	.0359	1.500	.0396	1.656	.0355	1.462	1.490	.037	1.700	.0320	1.410	.0253	1.170	.032	.452
19	.0418	1.750	.0456	1.906	.042	1.731	1.764	.043	1.975	.0359	1.582	.0270	1.250	.036	.508
18	.0478	2.000	.0516	2.156	.048	1.979	2.016	.050	2.297	.0403	1.776	.0285	1.320	.040	.564
17	.0538	2.250	.0575	2.406	.054	2.226	2.268	.056	2.572	.0453	1.996	.0320	1.480	.045	.635
16	.0598	2.500	.0635	2.656	.0595	2.454	2.500	.062	2.848	.0508	2.238	.0323	1.500	.050	.706
15	.0673	2.812	.0710	2.969	.067	2.762	2.814	.070	3.216	.0571	2.516	.0350	1.625	.056	.790
14	.0747	3.125	.0785	3.281	.075	3.047	3.150	.078	3.583	.0641	2.825	.0359	1.660	.063	.889
13	.0897	3.750	.0934	3.906	.090	3.710	3.780	.093	4.272	.0720	3.173	.0377	1.750	.071	1.000
12	.1046	4.375	.1084	4.531	.105	4.328	4.410	.109	5.007	.0808	3.560	.0431	2.000	.080	1.130
11	.1196	5.000	.1233	5.156	.120	4.946	5.040	.125	5.742	.0907	3.997	.0485	2.250	.090	1.270
10	.1345	5.625	.1382	5.781	.135	5.523	5.628	.140	6.431	.1019	4.490	.0508	2.360	.100	1.410
9	.1495	6.250	.1532	6.406	.150	6.183	6.300	.156	7.166	.1144	5.041	.0512	2.375	.112	1.579
8	.1644	6.875	.1681	7.031	.165	6.801	6.930	.172	7.855	.1285	5.662	.0539	2.500	.125	1.760
7	.1793	7.500	.....	.....	.1874	7.708	7.854	.187	8.590	.1443	6.358	.0641	2.970	.140	1.980
3/16"	.1875	7.660	.....	.....	.....	.....	8.579	.....	.....	.....	.....	.....	.....	.190	2.713
1/4"	.2500	10.210	.....	.....	.....	11.16	11.160	.....	.....	.....	.....	.....	.....	.....	3.530
5/16"	.3125	12.760	.....	.....	.....	15.75	13.750	.....	.....	.....	.....	.....	.....	.....	4.420
3/8"	.3750	15.320	.....	.....	.....	15.97	16.500	.....	.....	.....	.....	.....	.....	.....	5.290
1/2"	.5000	20.420	.....	.....	.....	.....	21.660	.....	.....	.....	.....	.....	.....	.....	7.060
5/8"	.6250	25.530	.....	.....	.....	.....	26.830	.....	.....	.....	.....	.....	.....	.....	8.920
3/4"	.7500	30.630	.....	.....	.....	.....	32.120	.....	.....	.....	.....	.....	.....	.....	10.580
1"	1.0000	40.800	.....	.....	.....	.....	42.670	.....	.....	.....	.....	.....	.....	.....	14.110

NOTE: To calculate weight per square foot of perforated screen (a) subtract % open area from 100% to determine % material in screen; (b) multiply % material in screen times blank pounds per square foot of material. (Open area % does not include margins.)



Perforated Metal surrounds this fountain



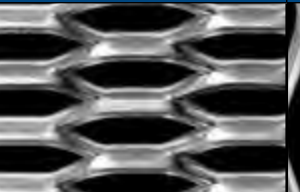



# EXPANDED





**McNICHOLS** has the largest selection of Expanded in North America stocked in a variety of styles and materials.

Expanded Metal is a versatile and economical product that can be used for screening, ventilating or for security enclosures. The openings permit passage of light, air and sound, and is lightweight and easy to fabricate and form.

## PRODUCT OPTIONS

	STANDARD	FLATTENED	GRATING	CATWALK
Construction Styles				
	pg. 10 / webcode: EMS1	pg. 11 / webcode: EMF1	pg. 12 / webcode: GEG1	pg. 12 / webcode: GEG1

## PRODUCT SPECIFICATIONS

Materials	Plain Steel, Aluminum, HD Galvanized Steel, Stainless Steel	Plain Steel, Aluminum, HD Galvanized Steel, Stainless Steel	Plain Steel, Aluminum, HD Galvanized Steel, Stainless Steel	Plain Steel, Aluminum, HD Galvanized Steel, Stainless Steel
Gauges	20 to 6 (Aluminum .032 to .125)	20 to 9 (Aluminum .05 to .125)	.54" to .73" (overall thickness)	.46" to .655" (overall thickness)
Style	3/16" to 2"	3/16" to 2"	3# to 6.25#	4.27#
Weight (per square foot)	.16# to 2.5#	.16# to 1.95#	2# to 7# (Plain Steel), 3.3# (Stainless Steel), 2# (Aluminum)	4.27#
Standard Sheet Sizes	4'x8', 4'x10', 5'x8', 6'x8', 6'x10'	3'x8', 4'x8', 4'x10', 4'x12'	4'x8', 4'x10', 6'x10'	10'x3' (others available)
% Open Area	43% to 90%	35% to 83%	45% to 77%	58%
QR Code (Scan using a QR Reader on your smart phone)				

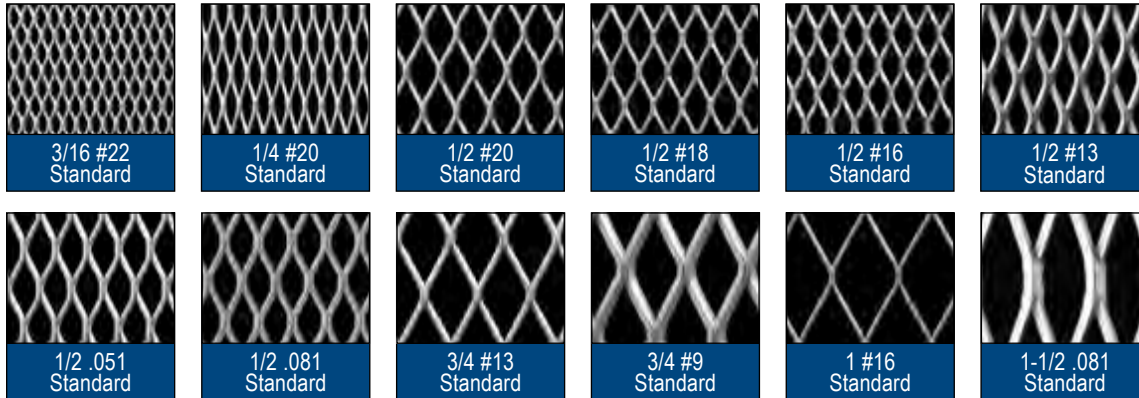
Not all product combinations are available. See [mcnichols.com](http://mcnichols.com) for availability.

## EXPANDED APPLICATIONS



STANDARD EXPANDED WEB CODE: EMS1

Standard Expanded Metal, also known as Raised Expanded, has diamond-shaped openings with a slightly raised surface. This product comes in a wide variety of opening sizes, gauges, materials and sheet sizes.

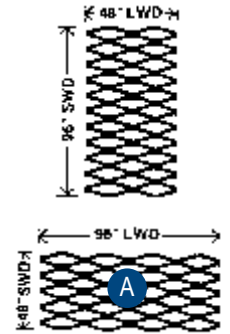


**NOTE:** Pictures are not to scale. For actual scale diagrams please see bottom of page 12.

STANDARD EXPANDED STOCK LIST												
STYLE	#/SQ. FT.	DESIGN SIZE		OPENING SIZE		STRAND SIZE		OVERALL THICKNESS	MESHES PER FT.		OPEN AREA	SHEET SIZES
		SWD	LWD	SWO	LWO	THICKNESS	WIDTH		SWD	LWD		
PLAIN STEEL												
3/16 #22 S	.45#	.19"	.50"	.14"	.345"	.031"	.034"	.070"	63	24	61%	8'x3'
1/4 #20 S	.86#	.25"	1.0"	.125"	.718"	.036"	.072"	.135"	48	12	45%	4'x8'
1/4 #18 S	1.14#	.25"	1.0"	.110"	.718"	.048"	.072"	.147"	48	12	43%	4'x8'
1/2 #20 S	.43#	.50"	1.2"	.438"	.938"	.036"	.072"	.140"	24	10	80%	4'x8'
1/2 #18 S	.70#	.50"	1.2"	.438"	.938"	.048"	.088"	.172"	24	10	72%	4'x8'
1/2 #16 S	.86#	.50"	1.2"	.375"	.938"	.060"	.087"	.175"	24	10	65%	4'x8'
1/2 #13 S	1.47#	.50"	1.2"	.312"	.938"	.090"	.096"	.204"	24	10	57%	4'x8'
3/4 #16 S	.54#	.923"	2.0"	.813"	1.750"	.060"	.101"	.210"	13	6	78%	4'x8'
3/4 #13 S	.80#	.923"	2.0"	.750"	1.688"	.090"	.096"	.205"	13	6	76%	4'x8'
3/4 #9	1.9#	.923"	2.0"	.688"	1.562"	.015"	.134"	.312"	13	6	68%	4'x10', 6'x10'
1 #16 S	.44#	1.00"	2.4"	.938"	2.062"	.060"	.087"	.192"	12	5	82%	4'x8'
1-1/2 #16 S	.40#	1.33"	3.0"	1.250"	2.625"	.060"	.108"	.230"	9	4	85%	4'x8'
1-1/2 #13 S	.60#	1.33"	3.0"	1.188"	2.500"	.090"	.105"	.242"	9	4	85%	4'x8'
1-1/2 #6 S	2.50#	1.33"	3.0"	1.110"	2.313"	.194"	.203"	.433"	9	4	69%	4'x8', 4'x10'
1-1/2 #9	1.2#	1.33"	3.0"	1.125"	2.375"	.134"	.144"	.312"	9	4	76%	4'x8', 4'x10'
2 #9 S 10 ga.	.90#	1.85"	4.0"	1.563"	3.375"	.134"	.149"	.312"	6.5	3	84%	4'x8'
STAINLESS STEEL (TYPE 304)												
1/2 #18 S	.73#	.50"	1.2"	.437"	.937"	.050"	.087"	.164"	24	10	70%	4'x8'
1/2 #16 S	.91#	.50"	1.2"	.437"	.937"	.062"	.087"	.164"	24	10	70%	4'x8'
1/2 #13 S	1.87#	.50"	1.2"	.325"	.875"	.093"	.119"	.225"	24	10	52%	4'x8'
3/4 #16 S	.60#	.923"	2.0"	.812"	1.750"	.062"	.106"	.202"	13	6	83%	4'x8'
3/4 #13 S	.91#	.923"	2.0"	.750"	1.687"	.093"	.107"	.202"	13	6	80%	4'x8'
3/4 #9 S 10 ga.	2.05#	.923"	2.0"	.687"	1.562"	.140"	.160"	.300"	13	6	67%	4'x8', 5'x8'
1-1/2 #13 S	.68#	1.33"	3.0"	1.250"	2.625"	.093"	.115"	.222"	9	4	83%	4'x8'
1-1/2 #9 S 10 ga.	1.37#	1.33"	3.0"	1.125"	2.500"	.140"	.155"	.280"	9	4	77%	4'x8'
ALUMINUM 3003-H14												
3/16 #.032 S	.16#	.190"	.50"	.160"	.360"	.032"	.034"	.070"	63	24	66%	4'x4'
1/2 #.051 S	.27#	.50"	1.2"	.375"	.937"	.051"	.093"	.158"	24	10	65%	4'x8'
1/2 #.081 S	.44#	.50"	1.2"	.375"	.937"	.081"	.096"	.186"	24	10	60%	4'x8', 4'x10'
3/4 #.081 L S	.32#	.923"	2.0"	.750"	1.68"	.081"	.129"	.220"	13	6	76%	4'x8'
3/4 #.081 H S	.41#	.923"	2.0"	.750"	1.68"	.081"	.165"	.300"	13	6	69%	4'x8'
3/4 #.125 S	.65#	.923"	2.0"	.687"	1.68"	.125"	.169"	.305"	13	6	68%	4'x8'
1-1/2 #.081 S	.22#	1.33"	3.0"	1.187"	2.50"	.081"	.128"	.240"	9	4	85%	4'x8'
HOT DIP GALVANIZED												
3/4 #9 S	1.9#	.923"	2.0"	.688"	1.562"	.150"	.134"	.3120"	--	--	68%	6'x8'
1-1/2 #10 S	.9#	1.33"	3.0"	1.188"	2.50"	.093"	.134"	.2840"	--	--	80%	6'x8'

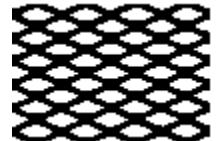
**NOTE:** Measurements are approximates and subject to mill tolerances. All chart specifications may vary. Please inquire if they are critical to your application.

## SWD &amp; LWD Dimensions

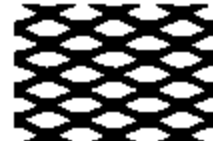


It is important when ordering to give the proper SWD (short way of design) and LWD (long way of design) dimensions. **Stock size sheets are like figure A above.**

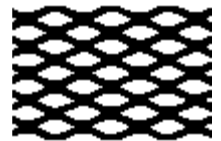
## Random Shearing



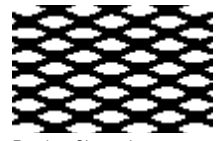
Standard Sheets - Bond or machine run all sides (On flattened material some patterns may result in one random sheared LWD.)



Bond sheared LWD  
Random sheared SWD



Bond sheared SWD  
Random sheared LWD



Random Sheared  
LWD & SWD

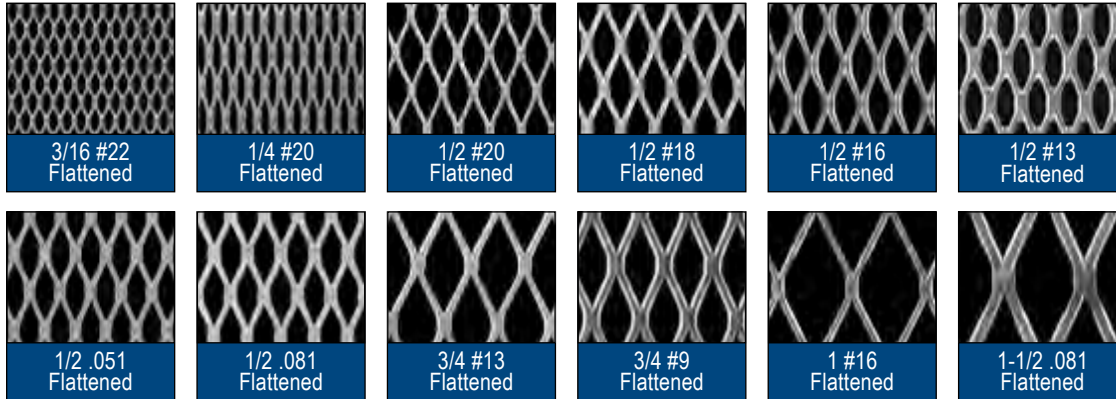
## Shearing Terminology

**SWD:** short way of design  
**LWD:** long way of design  
**SWO:** short way of opening  
**LWO:** long way of opening



## FLATTENED EXPANDED WEB CODE: EMF1

Flattened Expanded Metal is Standard Expanded Metal that has been flattened.



## FLATTENED EXPANDED STOCK LIST

STYLE	#/SQ. FT.	DESIGN SIZE SWD LWD	OPENING SIZE SWO LWO	STRAND SIZE THICKNESS WIDTH	OVERALL THICKNESS	MESHES PER FT. SWD LWD	OPEN AREA	COMMON SHEET SIZES
PLAIN STEEL								
3/16 #22 F	.43#	.20" .51"	.115" .300"	.024" .040"	.024"	60 23	55%	8'x3'
1/4 #20 F	.82#	.25" 1.05"	.110" .715"	.030" .079"	.030"	48 11.6	35%	4'x8'
1/4 #18 F	1.08#	.25" 1.05"	.118" .715"	.040" .080"	.040"	48 11.6	35%	4'x8'
1/2 #20 F	.40#	.50" 1.25"	.375" 1.00"	.029" .079"	.029"	24 9.5	65%	4'x8'
1/2 #18 F	.66#	.50" 1.25"	.312" 1.00"	.039" .097"	.039"	24 9.5	60%	4'x8' & 10'
1/2 #16 F	.82#	.50" 1.25"	.312" 1.00"	.050" .096"	.050"	24 9.5	63%	3'x8', 4'x8', 5'x8', 4'x10'
1/2 #13 F	1.40#	.50" 1.25"	.265" 1.00"	.078" .107"	.078"	24 9.5	52%	3'x8', 4'x8', 5'x8', 4'x10', 5'x10'
3/4 #16 F	.51#	.923" 2.10"	.750" 1.75"	.048" .111"	.048"	13 5.7	74%	4'x8', 4'x10'
3/4 #14 F	.63#	.923" 2.10"	.688" 1.813"	.061" .105"	.061"	13 5.7	74%	4'x8', 4'x10'
3/4 #13 F	.75#	.923" 2.10"	.688" 1.781"	.078" .106"	.078"	13 5.7	74%	4'x8', 4'x10', 5'x10'
3/4 #9 F 10ga.	1.71#	.923" 2.10"	.563" 1.688"	.120" .165"	.120"	13 5.7	63%	4'x8', 4'x10', 4'x12', 5'x10', 6'x10'
1 #16 F	.41#	1.00" 2.50"	.813" 2.250"	.050" .098"	.050"	12 4.68	78%	4'x8'
1-1/2 #16 F	.38#	1.33" 3.20"	1.062" 2.750"	.048" .119"	.048"	9 3.75	83%	4'x8'
1-1/2 #13 F	.57#	1.33" 3.20"	1.062" 2.750"	.078" .116"	.078"	9 3.75	80%	4'x8'
1-1/2 #9 F 10ga.	1.14#	1.33" 3.20"	1.000" 2.563"	.110" .158"	.110"	9 3.75	75%	4'x8', 4'x10'
STAINLESS STEEL (TYPE 304 OR 316)								
1/4 #18 F	1.43#	.25" 1.20"	.080" .66"	.047" .090"	.047"	48 11.6	28%	4'x8'
1/2 #18 F	.69#	.50" 1.26"	.312" 1.00"	.040" .098"	.040"	24 9.5	60%	4'x8'
1/2 #16 F	.86#	.50" 1.26"	.312" 1.00"	.050" .099"	.050"	24 9.5	60%	4'x8'
1/2 #13 F	1.78#	.50" 1.26"	.240" .915"	.080" .132"	.080"	24 9.5	45%	4'x8', 4'x10'
3/4 #18 F	.46#	.923" 2.10"	.750" 1.812"	.040" .118"	.040"	13 5.7	75%	4'x8'
3/4 #16 F	.57#	.923" 2.10"	.750" 1.812"	.050" .118"	.050"	13 5.7	75%	4'x8'
3/4 #13 F	.86#	.923" 2.10"	.625" 1.75"	.080" .120"	.080"	13 5.7	75%	4'x8'
3/4 #9 F 10ga.	1.95#	.923" 2.10"	.562" 1.697"	.119" .165"	.119"	13 5.7	61%	4'x8', 4'x9', 4'x10'
1-1/2 #16 F	.43#	1.33" 3.15"	1.062" 2.75"	.050" .128"	.050"	9 3.8	80%	4'x8'
1-1/2 #13 F	.65#	1.33" 3.15"	1.000" 2.625"	.080" .130"	.080"	9 3.8	80%	4'x8'
1-1/2 #9 F 10ga.	1.31#	1.33" 3.15"	.937" 2.625"	.119" .165"	.119"	9 3.8	75%	4'x8'
ALUMINUM 3003-H14								
1/2 #.051 F	.26#	.50" 1.27"	.312" 1.00"	.040" .104"	.040"	24 9.5	61%	4'x8'
1/2 #.081 F	.42#	.50" 1.27"	.312" 1.00"	.060" .105"	.060"	24 9.5	58%	4'x8'
3/4 #.051 F	.16#	.923" 2.125"	.75" 1.812"	.040" .122"	.040"	13 5.66	72%	4'x8'
3/4 #.081 LF	.30#	.923" 2.125"	.687" 1.75"	.070" .143"	.070"	13 5.66	70%	4'x8'
3/4 #.081 HF	.39#	.923" 2.125"	.687" 1.75"	.070" .181"	.070"	13 5.66	63%	4'x8'
3/4 #.125 F	.62#	.923" 2.125"	.625" 1.75"	.095" .187"	.095"	13 5.66	62%	4'x8', 4'x10'
1-1/2 #.081 F	.21#	1.33" 3.15"	1.062" 2.75"	.060" .143"	.060"	9 3.8	77%	4'x8'
1-1/2 #.125 F	.41#	1.33" 3.15"	1.00" 2.75"	.080" .181"	.080"	9 3.8	70%	4'x8'
HOT DIP GALVANIZED								
1/2 #16 F	.98#	.50" 1.25"	.312" 1.0"	.050" .096"	.05"	24 9.5	63%	4'x8', 4'x10'
1/2 #13 F	1.61#	.50" 1.25"	.265" 1.0"	.078" .107"	.07"	24 9.5	52%	4'x8'
3/4 #16 F	.56#	.923" 2.1"	.75" 1.75"	.048" .111"	.048"	13 5.7	74%	5'x10', 4'x8'
3/4 #9 F	1.88#	.923" 2.1"	.563" 1.688"	.120" .165"	.120"	13 5.7	63%	4'x8', 4'x10'

## U-Edging



U-edging is a U-shaped strip that is attached to the edge of the expanded metal sheet by a press-fit or weld. It makes the edges safe and provides an attractive appearance. U-edging is available in 10 or 12 foot pieces.

Type	Open	Size	Gauge	Material
401	1/4"	1"x120" 1.5"x120" .75"x144" 1"x144"	18	Steel, Alum.
402	1/8"	1"x120" 1"x144"	18	Steel, Alum.
403	1/16"	1"x144"	18	Steel, Alum.
438	3/8"	1"x120"	18	Steel
450	1/2"	1"x120"	18	Alum.

See more framing solutions on page 7.

## Hemmed Edging



## McNICHOLS®

Hemmed Edging is a new high-quality, architectural, folded-edge framing option. See page 7 for details.

## Attachment Clips



## ITEM NUMBER:

4040SQ0399

## MATERIAL:

Pre-Galvanized Steel

## SIZE:

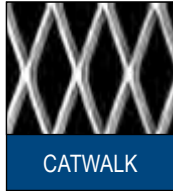
2.95" square

This clip is typically used to attach Expanded Metal to drywall applications where additional security within walls is needed.

**NOTE:** Measurements are approximate and subject to mill tolerances. All chart specifications may vary. Please inquire if they are critical to your application.

EXPANDED GRATING & CATWALK WEB CODE: GEG1

GRATING



CATWALK

Expanded Grating or Expanded Catwalk is an economical solution for ramps, flooring, catwalks, platforms, walkways, treads or other types of lightweight structural applications. Standard Expanded Grating is similar to regular Expanded Metal only considerably heavier and load bearing. Expanded Metal Catwalk Grating is structurally stronger than Standard Expanded Grating because the long way of the diamond runs across a shorter span.

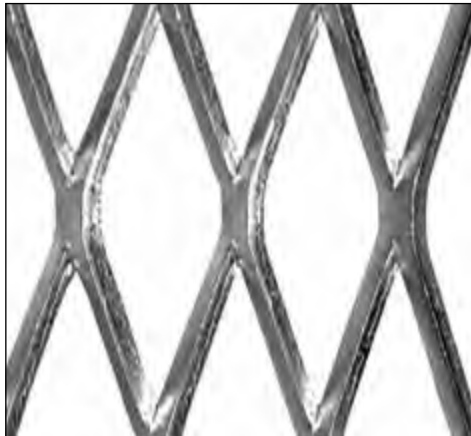


Catwalk Grating for Billboard

## GRATING &amp; CATWALK STOCK LIST

STYLE	#/SQ. FT.	DESIGN SIZE SWD	DESIGN SIZE LWD	OPENING SIZE SWO	OPENING SIZE LWO	STRAND SIZE THICKNESS	STRAND SIZE WIDTH	OVERALL THICKNESS	MESHES/SQ. FT. SWD	MESHES/SQ. FT. LWD	OPEN AREA	COMMON SHEET SIZES
PLAIN STEEL												
3.00#	3.00#	1.33"	5.33"	.940"	3.44"	.183"	.264"	.540"	9	2.25	60%	4'x8'
3.14#	3.14#	2.00"	6.00"	1.625"	4.88"	.250"	.312"	.656"	6	2	69%	4'x8', 4'x10', 6'x10'
4.00#	4.00#	1.33"	5.33"	.940"	3.44"	.215"	.300"	.618"	9	2.25	55%	4'x8', 4'x10'
4.27#	4.27#	1.41"	4.00"	1.000"	2.88"	.250"	.300"	.625"	8.5	3	58%	4'x8', 3'x10'
5.00#	5.00#	1.33"	5.33"	.813"	3.38"	.250"	.331"	.655"	9	2.25	50%	4'x8'
6.25#	6.25#	1.41"	5.33"	.813"	3.38"	.312"	.350"	.715"	8.5	2.25	50%	4'x8'
STAINLESS STEEL TYPE 304												
4.50#	4.50#	1.41"	4.00"	1.00"	2.88"	.250"	.300"	.625"	8.5	3	58%	4' x 10'
ALUMINUM 5052-H32												
2.00#	2.00#	1.33"	5.33"	.940"	3.44"	.250"	.387"	.730"	9	2.25	48%	4'x8'

**NOTE:** Measurements are approximate and subject to mill tolerances. All chart specifications may vary. Please inquire if they are critical to your application.



Close up Expanded Grating. Photo not to scale.

## GRATING &amp; CATWALK LOAD TABLE

STEEL	CLEAR SPAN							
	23"	30"	35"	42"	47"	54"	60"	
50 lbs./LF	3.0	3.0	3.0	3.0	3.0	4.0	5.0	
	3.14	3.14	3.14	3.14	3.14	4.27	6.25	
100 lbs./LF	3.0	3.0	3.0	4.0	5.0			
	3.14	3.14	3.14	4.27	6.25			
150 lbs./LF	3.0	4.0	4.0	5.0	6.25			
	3.14	4.27	4.27	6.25				
200 lbs./LF	3.0	4.0	4.27	6.25				
	3.14	4.27	5.0					
250 lbs./LF	4.0	5.0	5.0					
	4.27		6.25					
300 lbs./LF	4.0	5.0	6.25					
	4.27	6.25						
350 lbs./LF	4.0	6.25						
	4.27							

Distance between supports is measured from inside edge of one support to inside edge of next support.

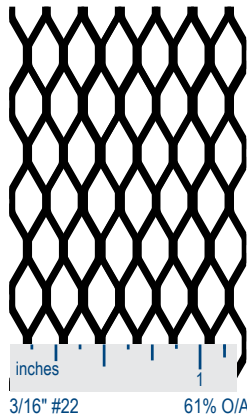
**NOTE:** The concentrated load deflection for the above selection chart does not exceed the 1/4" maximum deflection, and the generally accepted recommendation for normal pedestrian comfort.

## CATWALK FIXED SPAN LOAD TABLE

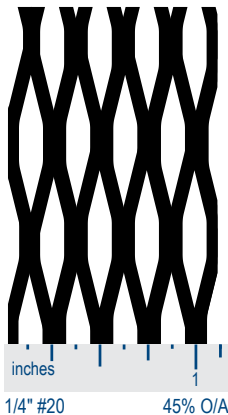
CLEAR SPAN	LOAD	24"	36"	48"
3.00# Steel	U	.275	.100	--
	D	.250	.220	--
	C	.275	.165	.75
	D	.250	.250	.250
3.14# Steel	U	.375	.150	.50
	D	.250	.240	.250
	C	.375	.155	.75
	D	.250	.250	.250
4.00# Steel	U	.350	.150	.50
	D	.240	.245	.250
	C	.440	.220	100
	D	.250	.250	.250
4.27# Steel	U	.500	.165	.60
	D	.245	.245	.250
	C	.400	.225	100
	D	.250	.240	.250
5.00# Steel	U	.600	.175	100
	D	.240	.240	.250
	C	.540	.310	140
	D	.245	.250	.250
6.25# Steel	U	.800	.300	115
	D	.220	.250	.240
	C	.800	.300	150
	D	.220	.240	.240
2.00# Aluminum	C	.250	.100	.50
	D	.250	.250	.250
4.50# Stainless	C	.300	.150	100
	D	.217	.192	.212

U - Uniform Load - pounds/sq. ft.;  
D - Deflection in inches;  
C - Concentrated Load - pounds/per ft. width at mid span

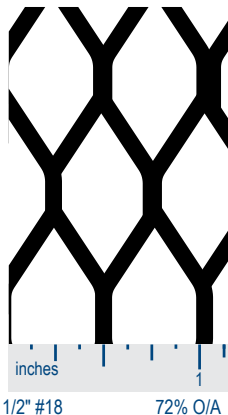
## EXPANDED METAL DIAMOND OPENINGS TO SCALE



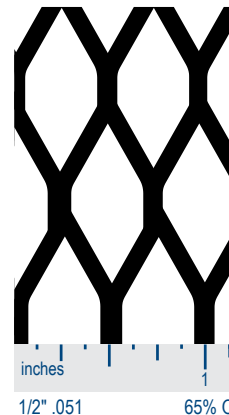
3/16" #22 61% O/A



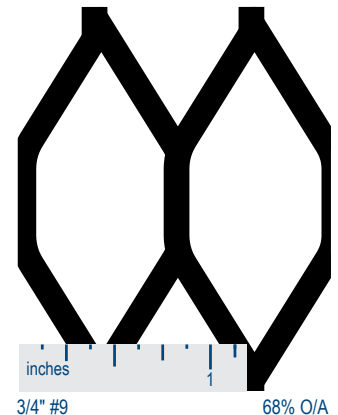
1/4" #20 45% O/A



1/2" #18 72% O/A



1/2" .051 65% O/A



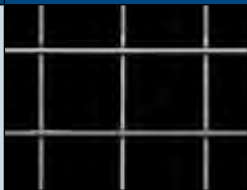
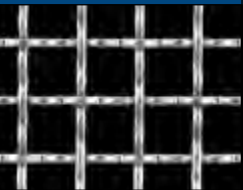
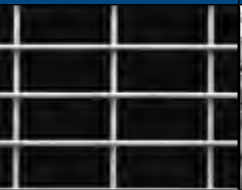


3/4" #9 68% O/A

# WIRE MESH






**McNICHOLS** has the largest selection of Wire Mesh in North America stocked in various mesh sizes, openings, thicknesses and materials.

Used as shade and screen partitions for facades, parking garages and buildings, Wire Mesh is amazingly versatile and is easily adapted to almost any application.

## PRODUCT OPTIONS

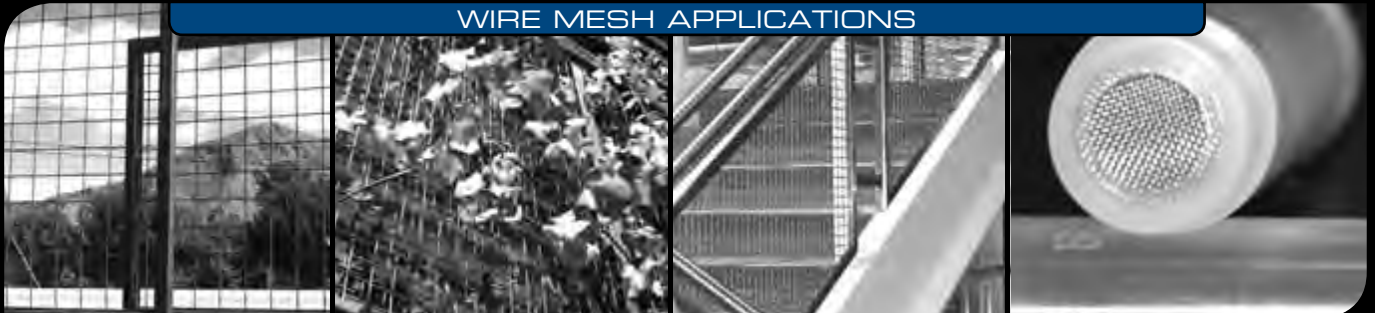
	SQUARE OPENING	SQUARE MESH	RECTANGULAR	ECO-MESH®	DESIGNER
Pattern Types					
	pg. 14 / webcode: WM2	pg. 15 / webcode: WM4	pg. 17 / webcode: WM8	pg. 18 / webcode: ECO1	pg. 19 / webcode: DMW1

## PRODUCT SPECIFICATIONS

Styles/Class	Square Woven, Square Welded	Square Woven, Square Welded, Hardware & Industrial, VINYL MESH™	Rectangular Welded, Insect Screen, Test Sieves	ECO-MESH® Modular Facade & Trellis System	Many styles available. See page 19.
Materials	Plain, Stainless and Galvanized Steel, Aluminum	Plain, Stainless and Galvanized Steel, Aluminum, Brass, Copper, Galvanized-PVC Coated	Plain, Stainless and Galvanized Steel, Aluminum	Plain, Stainless and Galvanized Steel, Aluminum, Powder Coated	Plain and Stainless Steel, Aluminum, Copper, Bronze
Wire Diameter	.063" to .375"	.0045" to .25"	.063" to .120" Insect Scrn.: .009", .011"	9, 10, 11 gauge	.105" to .192"
Opening Sizes or Mesh Sizes	.250" to 4"	<b>Woven:</b> 1 to 325 mesh <b>Welded:</b> 1 to 6" mesh <b>H&amp;I:</b> 1 to 4 mesh <b>VINYL MESH™:</b> 1 to 2" mesh	1/2"x1", 2"x1" or 3"x1-1/2"	2" standard, (others by special order)	.838" to 3.895"
Standard Sizes	4'x8', 4'x10', 5'x10'	Sheet: 3'x8', 4'x8', 4'x10', 4'x12', 5'x10', 6'x10', 6'x12' Coil: 2', 3', 4', 5' & 6'x100'; 3' & 4' x 50' Coil	3'x8', 4'x8'	Heights: 2' up to 25' Widths: 2' up to 7'	4'x8', 5'x8', 5'x10'
QR Code (Scan using a QR Reader on your smart phone)					

Not all product combinations are available. See [mcnichols.com](http://mcnichols.com) for availability.

## WIRE MESH APPLICATIONS



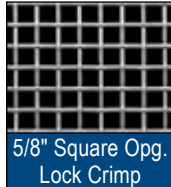


## SQUARE OPENING WIRE MESH

Square Opening Wire Mesh is known for its easy handling and solid construction. Wire Mesh can be used for both internal and external applications. It is commonly used for shade and screen structures for facades, parking garages and buildings. Interior uses include decorative architectural and functional screening in any space (commercial or residential).

### WOVEN WEB CODE: WM2

Square Opening Woven Wire Mesh is the most popular wire mesh offered. It is available in a wide range of meshes, weaves and opening sizes.



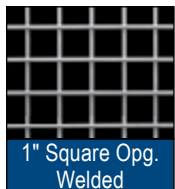
**NOTE:** Pictures are not to scale. For actual scale diagrams please see page 24.

### WOVEN STOCK LIST

MESH	GAUGE	MESH	GAUGE
STAINLESS STEEL TYPE 304		PRE-GALVANIZED STEEL	
4" opening	.250	4" opening	.250
2" opening	.120, .192, .250	2" opening	.250
1-1/2" opening	.120	1" opening	.120
1" opening	.120	PLAIN STEEL	
1/2" opening	.063, .092, .120	4" opening	.250
3/8" opening	.063	3" opening	.250
1/4" opening	.120	2" opening	.120, .135, .162, .192, .250, .375
ALUMINUM		1-3/4" opening	.250
4" opening	.250	1-1/2" opening	.120, .135, .192, .250
2" opening	.250	1" opening	.120, .135, .192, .250
1-1/2" opening	.120, .250	3/4" opening	.120, .250
1" opening	.120	5/8" opening	.120
		1/2" opening	.120, .250

### WELDED WEB CODE: WM3

Square Opening Welded Wire Mesh typically has larger openings than woven wire mesh. Wire strands are welded at each intersection.



**NOTE:** Pictures are not to scale. For actual scale diagrams please see page 24.

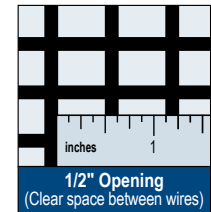
### WELDED STOCK LIST

MESH	GAUGE
STAINLESS STEEL 304	
4" opening (Welded)	.250
3" opening (Welded)	.250
2" opening (Welded)	.188 (.120 in Stainless Steel 316)
1-1/2" opening (Welded)	.250
1" opening (Welded)	.120
PLAIN STEEL	
3" opening (Welded)	.250
2" opening (Welded)	.250



See page 56 for a list of our Fabrication Services.

### How To Measure Square Openings



The opening is measured from the inside edge of the wire to the inside edge of the adjacent wire.

### Types of Weaves

#### Plain Weave



#### Lock Crimp Weave



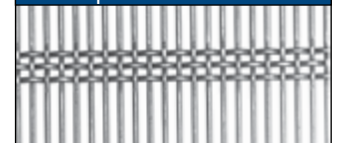
#### Intercrimp Weave



#### Flat Top Weave



#### Triple Shute Weave

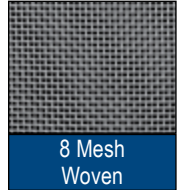


## SQUARE WOVEN WIRE MESH

Square Woven Wire Mesh is available in a wide range of meshes, weaves and opening sizes. The spacing is measured from center to center of the adjacent wire. The material remains stable and rigid by virtue of the mechanical properties of the woven wire.

### WOVEN WEB CODE: WM4

Square Woven Wire Mesh is a stable and rigid wire mesh due to its mechanical properties. It is available in a wide range of meshes, weaves and opening sizes. Pictures not to scale.



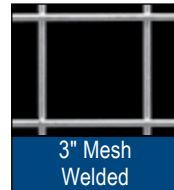
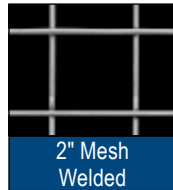
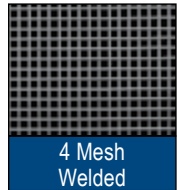
**NOTE:** Pictures are not to scale. For actual scale diagrams please see page 20-21.

### WOVEN STOCK LIST

MESH	GAUGE	MESH	GAUGE	MESH	GAUGE
STAINLESS STEEL		STAINLESS STEEL		PLAIN STEEL	
3/4" mesh	.105, .120	80	.0055	12	.023, .028
1	.120, .250	100	.0045	14	.020
2	.047, .063, .080, .105, .120, .135	150	.0026	16	.018
3	.063, .080	200	.0021	20	.016
4	.028, .035, .047, .063, .080, .120	325	.0014	60	.0075
5	.041	ALUMINUM		GALVANIZED	
6	.035, .047, .063	1	.120	8	.017
8	.017, .028, .032, .047, .063	2	.063	COPPER	
10	.025, .035, .047	4	.047, .063	2	.063
12	.018, .023, .028, .035	8	.028	4	.047
14	.020	PLAIN STEEL		8	.028
16	.009, .018, .028	1	.120	10	.025
18	.009	2	.063, .080, .120, .135	16	.011
20	.014, .016, .023	3	.063, .105	40	.010
24	.014	3-1/2	.063	100	.0045
30	.012	4	.047, .080	BRASS	
40	.010	6	.035, .047, .063	8	.028
50	.009	8	.028, .032, .047, .063	16	.018
60	.0075	10	.025		

### WELDED WEB CODE: WM5

Square Welded Wire Mesh typically has larger openings than woven wire mesh. Welded wire mesh is capable of maintaining its shape when stressed.

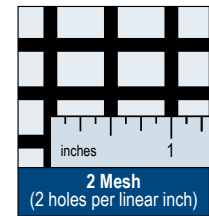


**NOTE:** Pictures are not to scale. For actual scale diagrams please see page 20-21.

### WELDED STOCK LIST

MESH	GAUGE	MESH	GAUGE	MESH	GAUGE
STAINLESS STEEL		PLAIN STEEL		GALVANIZED	
1 (Welded)	.063, .080, .120	1 (Welded)	.105, .120, .135	1 (Welded)	.063, .080, .118, .120
2 (Welded)	.047, .063	2" (Welded)	.097, .135, .156, .160, .185	2 (Welded)	.063
3 (Welded)	.047	3" (Welded)	.135, .192	4 (Welded)	.025
4 (Welded)	.032	4" (Welded)	.225, .250	2" (Welded)	.118, .135, .159, .160, .187, .188, .192
3" (Welded)	.188	6" (Welded)	.187	3" (Welded)	.135, .188, .192
2" (Welded)	.120, .188	1-1/2" (Welded)	.135	4" (Welded)	.148

### How To Measure Square Mesh



The opening is measured from center to center of the adjacent wire.



Wire Mesh is available in sheet and coil form.

### U-Edging for Mesh Infill Panels



U-edging is a U-shaped strip that covers the edge of the expanded metal sheet by a press-fit or weld. It makes the edges safer and provides an attractive appearance. U-edging is available in 10 or 12 foot lengths.

Type	Open	Size	Gauge	Material
401	1/4"	1"x120" 1.5"x120" .75"x144" 1"x144"	18	Steel, Alum.
402	1/8"	1"x120" 1"x144"	18	Steel, Alum.
403	1/16"	1"x144"	18	Steel, Alum.
438	3/8"	1"x120"	18	Steel
450	1/2"	1"x120"	18	Alum.

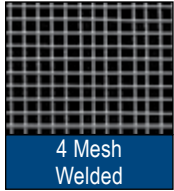
See more framing solutions on page 7.

### PRODUCT SAMPLES

Please call **800.237.3820** to request a sample of any of our hole products. We look forward to serving you!

**HARDWARE & INDUSTRIAL CLOTH** WEB CODE: WM6

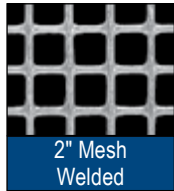
Hardware and Industrial Wire Mesh, available in a welded or woven construction, is widely used in the farming industry and serves many other applications due to its corrosion resistance and lightweight characteristics.



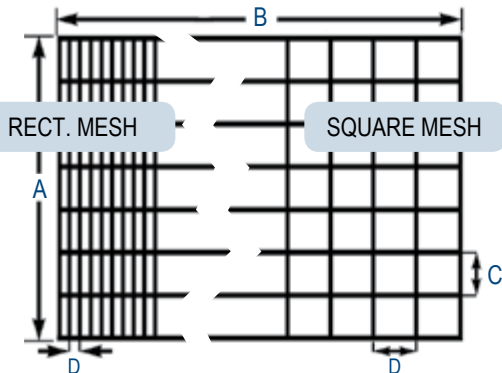
HARDWARE & INDUSTRIAL STOCK LIST				
MESH	GAUGE	OPENING	WIDTHS	#/SF
1 (Welded)	.063	.937"	48"	.27
2 (Welded)	.041	.459"	36", 48", 60"	.22
2 (Welded)	.063	.437"	48"	.63
2 (Welded)	.080	.42"	48"	.83
3 (Welded)	.032	.3013"	36"	.24
4 (Welded)	.025	.255"	48"	.16
4 (Welded)	.047	.203"	48"	.57

**VINYLMESH™** WEB CODE: WMUM1

VINYLMESH™ is a welded, galvanized and then vinyl coated Wire Mesh offered in a variety of meshes, gauges and widths. VINYLMESH™ is easy to clean, weather resistant and corrosion resistant. Applications include animal cages, enclosures, screens, partitions, racking, guards and others. VINYLMESH™ is available in full 100' rolls only.



VINYLMESH™ STOCK LIST				
MESH	GAUGE	OPENING	WIDTHS	#/SF
2" (Welded)	.099	1.895"	48"	.43
2" (Welded)	.080	1.9"	36"	.24
1 (Welded)	.080	.92"	36", 48", 60"	.49
1 (Welded)	.063	.937"	24"	.31
2 (Welded)	.063	.437"	48"	.65

**HOW TO ORDER/SPECIFY WELDED WIRE MESH**

- A = Panel Width
- B = Panel Length
- C = Mesh Size on Width  
(center to center of wire)
- D = Mesh Size on Length  
(center to center of wire)



Rectangular Wire Mesh Fence Panels

**DIAMETERS & GAUGE EQUIVALENTS**  
(actual size)

.430			5/0
.362			3/0
.331			2/0
.283			1 Ga.
.263			2 Ga.
.244			3 Ga.
.225			4 Ga.
.207			5 Ga.
.192			6 Ga.
.177			7 Ga.
.162			8 Ga.
.148			9 Ga.
.135			10 Ga.
.120			11 Ga.
.105			12 Ga.
.092			13 Ga.
.080			14 Ga.
.072			15 Ga.
.063			16 Ga.
.054			17 Ga.
.047			18 Ga.
.041			19 Ga.
.035			20 Ga.
.032			21 Ga.

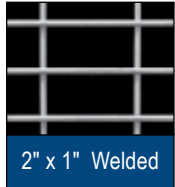


## RECTANGULAR MESH

Rectangular Wire Mesh has many of the same properties as Square Mesh. The primary difference is the rectangular opening that is created when the mesh is welded or woven.

**RECTANGULAR WELDED** WEB CODE: WM8

Welded Wire Mesh typically has larger openings than Woven Wire Mesh. With the wire strands welded at each intersection, Welded Wire Mesh is more capable of maintaining its shape when stressed.



2" x 1" Welded

WELDED STOCK LIST					
MESH	GAUGE	OPENING	WIDTHS	#/SF	MATERIAL
2"x1" (Welded)	.0120	1.880"	48"	.7	Steel
3"x1-1/2" (Welded)	.0120	2.9"	36"	1.1	Stainless Steel



Infills of 3"x1" Rectangular Opening Flat Top Plain Weave HD Galvanized

**INSECT SCREEN** WEB CODE: WM7

Insect Screen has a woven wire mesh construction. Small insects, such as no-see-ums, may pass through a typical insect screen (18 x 14 mesh). Smaller meshes from 20 to 325 are available.

18 x 14 Mesh  
Stainless Steel

INSECT SCREEN STOCK LIST					
MESH	GAUGE	WIDTHS	OPENING	MATERIAL TYPE	
18 x 14	.011	36", 48"	.13	Bronze	
18 x 16	.011	36", 48"	.05	Aluminum (Inquire)	
18 x 14	.009	36", 48"	.09	Stainless Type 304	
18 x 14	.011	36", 48"	.13	Stainless Type 304	
18 x 14	.009	36", 48"	.09	Epoxy Coated	

**TEST SIEVES** WEB CODE: WMSV1

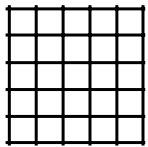
Test Sieves are accurately and optically constructed by placing wire mesh between two suppressed die-formed frames. Sieves are also available in other sizes and in stainless steel by special order.



SIEVES STOCK LIST			
ITEM NUMBER	DIAMETER	SIZE	MATERIAL
3S98488001	8"	90 Micron	Brass

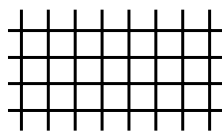
WELDED WIRE MESH  
TRIM & STUB OPTIONS

## Trimmed



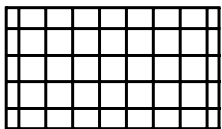
Minimum on all four sides approximately 1/16"-1/8" long. Trimmed flush (no stubs) must be specified when required.

## Untrimmed Balanced Stubs



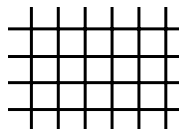
Equal stubs on opposite sides only. Stubs will not exceed opening unless specified.

## Balanced Stubs w/ Edge Wire



Equal stubs on opposite sides with welded edge wire. (Special order only)

## Untrimmed Random Stubs



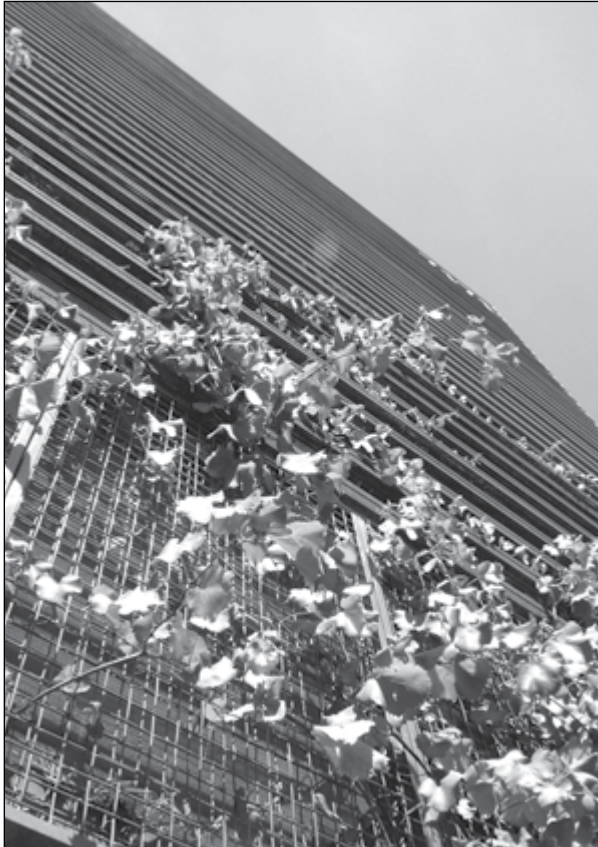
Varies on all four sides. Results from shearing a larger sheet, pieces will not be identical.



Infills fabricated of Sq. Opening Wire Mesh - 1-1/2" Mesh, .135 Wire Diameter

## ECO-MESH® MODULAR FACADE &amp; TRELLIS SYSTEM

**ECO-MESH® MODULAR FACADE & TRELLIS SYSTEM** offers architects and contractors many aesthetic, sustainable and functional green-build opportunities. Panels are strong and durable while being lightweight. Panels are well-suited for both exterior and interior spaces. Modular applications include facades, partitions, fences, canopies and arbors. **ECO-MESH®** provides the ideal environment for vegetation to grow within the panel grid. [WEB CODE: EC01](#)



ECO-MESH® along the facade of a building



Close up of an ECO-MESH® Panel

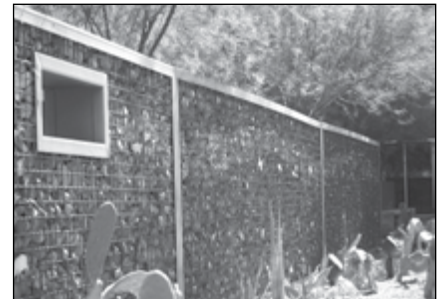


ECO-MESH® used in fence or garden

## ECO-MESH®

MODULAR FACADE  
& TRELLIS SYSTEM

- Woven screen - no welds to break
- .120" gauge wire - 2-1/2 times stronger than others
- Strong and sustainable garners LEED points
- Super durable powder coating
- 12 standard colors - or custom available
- Framework units - modular/moveable



ECO-MESH® Wall

## ECO-MESH® PRODUCT DETAILS

PANEL HEIGHTS	2' to 25' (30' Custom)	Stocked 4'x8' panels in Textured Black ready to go!
PANEL WIDTH	2' to 7'	
BRIDGE WIRE	.105	
GAUGE	9, 10, 11	
MESH OPENING	1"x1" to 3"x3", 2" is standard	
WEAVE	Woven Intercrip standard, other weaves available	
FRAME DEPTH	2", 3", 16 gauge standard	
MATERIAL	Plain Steel, Pre-Galvanized, Stainless Steel, Aluminum	
FINISH	Bare or powder coated	
COLORS	Red Orange, Brick Red, Aged Copper, Forest Green Texture, Moss Green, Reed Green, Sierra Tan, Medium Bronze, Jet Black, Texture Black (Stock), Traffic White, Anodized Silver	



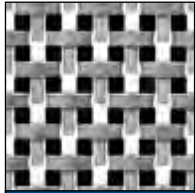
ECO-MESH® Wall along pathway

For color samples and more on **ECO-MESH®** see back cover or visit [mcnichols.com](http://mcnichols.com)

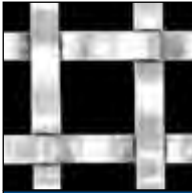


## DESIGNER WIRE MESH

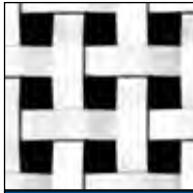
Designer Wire Mesh is constructed of wires that are woven into a variety of unique patterns. Wire mesh applications can be for ceilings, stairway infill panels, overlay surfaces, wall cladding, sunshades, partitions, guard rails, store fixtures, cabinet infills and as signage or sign backing, aesthetic accents and more. We have several patterns and styles available. Please see our full collection at [mcnichols.com](http://mcnichols.com). [WEB CODE: DMW1](#)



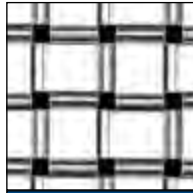
Ashland™ 2015+®



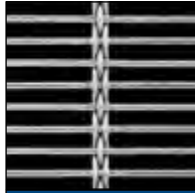
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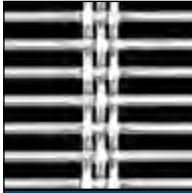
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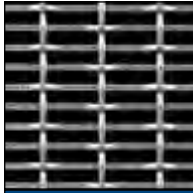
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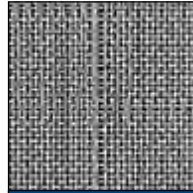
Aura™ 8155+®



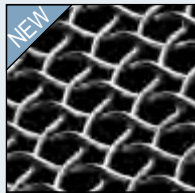
Aura™ 8856+®



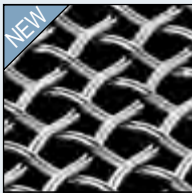
Chateau™ 3105



Plaid™ 6013



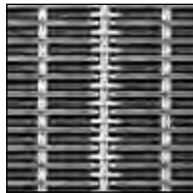
Halo™ 1162



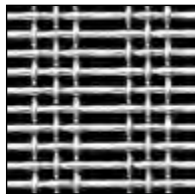
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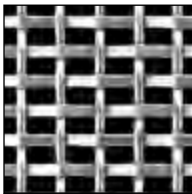
Shire™ 2134+®



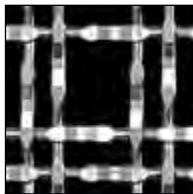
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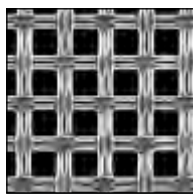
Shire™ 8314+®



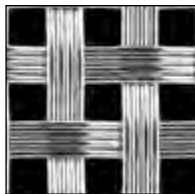
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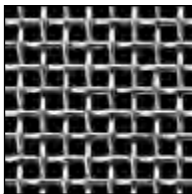
Talica™ 8146+®



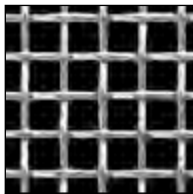
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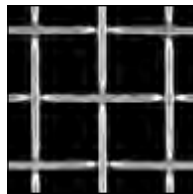
Talica™ 8158+®



Talica™ 8220+®



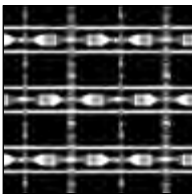
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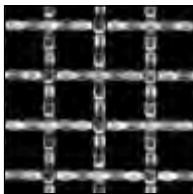
Techna™ 8168+®



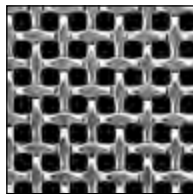
Techna™ 3155+®



Techna™ 3156+®



Techna™ 8159+®



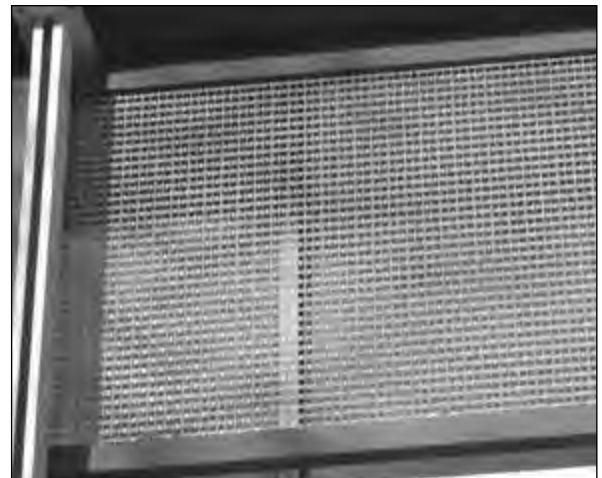
Techna™ 8163+®

## DESIGNER WIRE MESH DETAILS

STYLES/ PATTERNS	Many styles & patterns to choose from. Please visit <a href="http://mcnichols.com">mcnichols.com</a> for complete collection.
SHEET WIDTHS	48", 60"
SHEET LENGTHS	96", 120"
WEAVE	Woven
MATERIAL	Aluminum, Bronze, Copper, Plain Steel, Stainless Steel



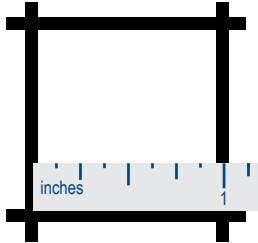
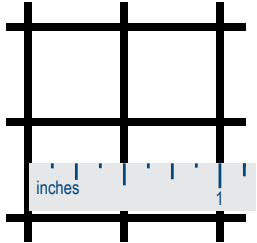
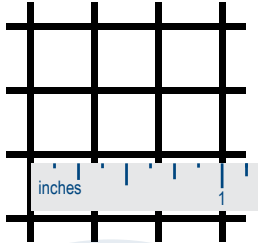
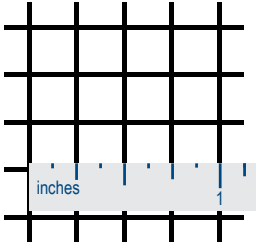
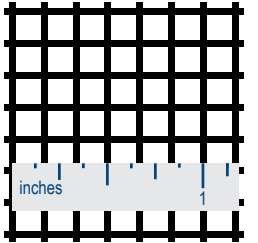
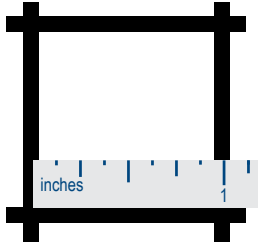
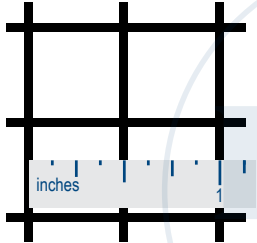
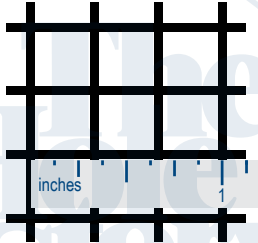
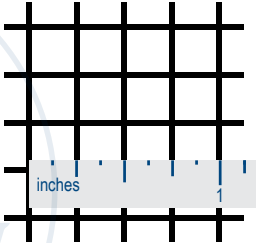
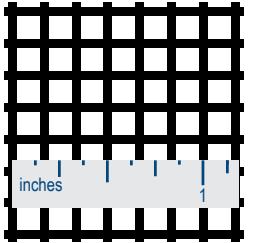
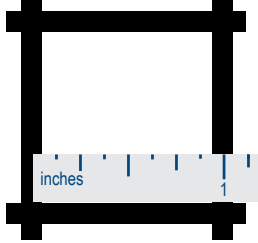
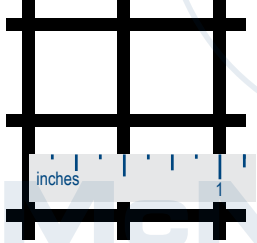
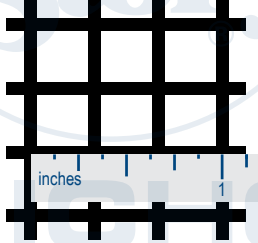
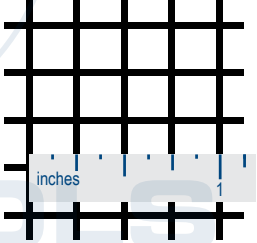
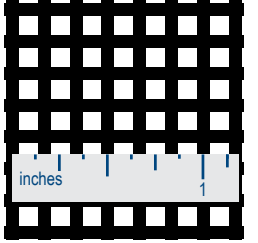
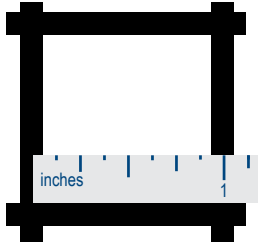
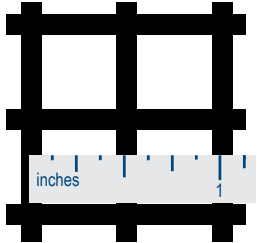
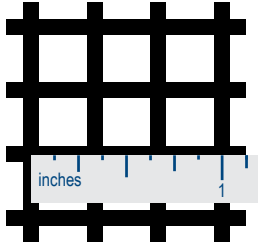
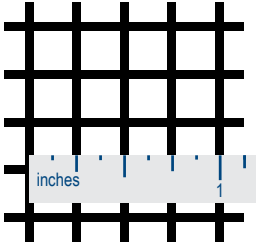
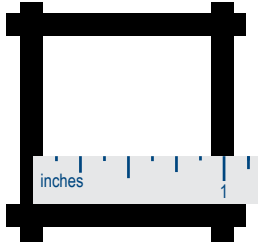
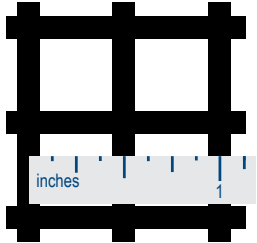
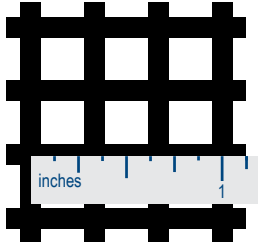
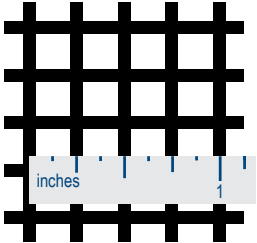
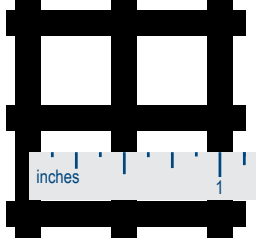
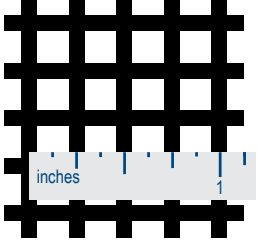
Plaid™ 6013 Wire Mesh was selected as an infill panel on this stairway. See it in color on the inside back cover of the catalog.



Balcony infill panel made with Techna™ 3156+®



SQUARE WIRE MESH SIZES TO SCALE

1 Mesh	2 Mesh	3 Mesh	4 Mesh	6 Mesh
				
1 Mesh, .063" Wire Dia., 88% O/A	2 Mesh, .041" Wire Dia., 84% O/A	3 Mesh, .032" Wire Dia., 82% O/A	4 Mesh, .025" Wire Dia., 81% O/A	6 Mesh, .035" Wire Dia., 63% O/A
				
1 Mesh, .080" Wire Dia., 85% O/A	2 Mesh, .047" Wire Dia., 82% O/A	3 Mesh, .047" Wire Dia., 74% O/A	4 Mesh, .028" Wire Dia., 79% O/A	6 Mesh, .047" Wire Dia., 52% O/A
				
1 Mesh, .105" Wire Dia., 82% O/A	2 Mesh, .063" Wire Dia., 76% O/A	3 Mesh, .063" Wire Dia., 66% O/A	4 Mesh, .032" Wire Dia., 76% O/A	6 Mesh, .063" Wire Dia., 39% O/A
				
1 Mesh, .118" Wire Dia., 77% O/A	2 Mesh, .105" Wire Dia., 62% O/A	3 Mesh, .080" Wire Dia., 58% O/A	4 Mesh, .047" Wire Dia., 66% O/A	
				
1 Mesh, .120" Wire Dia., 77% O/A	2 Mesh, .120" Wire Dia., 58% O/A	3 Mesh, .105" Wire Dia., 47% O/A	4 Mesh, .063" Wire Dia., 56% O/A	
				
	2 Mesh, .135" Wire Dia., 53% O/A		4 Mesh, .080" Wire Dia., 46% O/A	

Please be sure to specify  
**McNICHOLS**  
on your next project.

All mesh sizes not shown.  
For our full stock list visit  
[mcnichols.com](http://mcnichols.com)

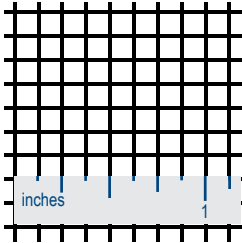
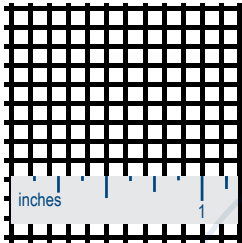
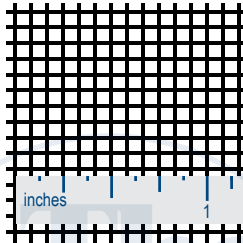
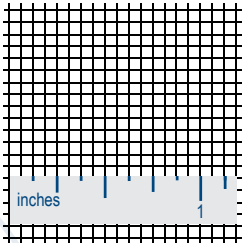
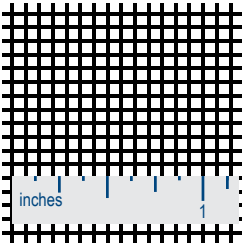
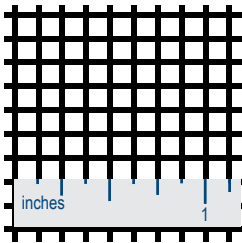
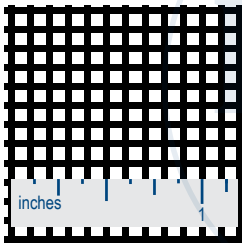
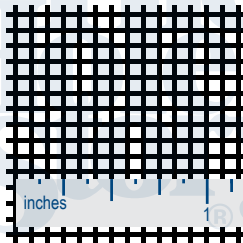
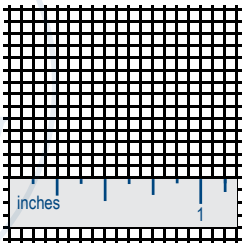
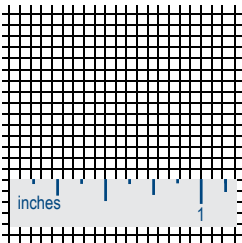
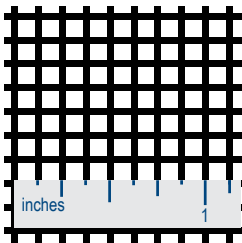
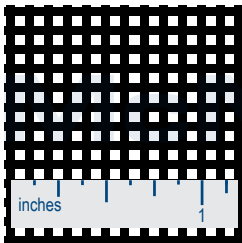
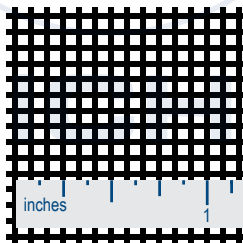
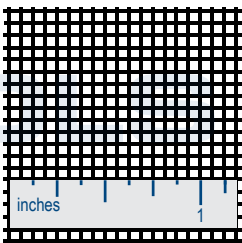
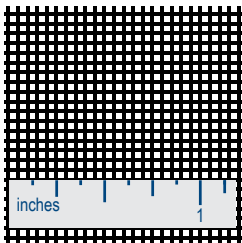
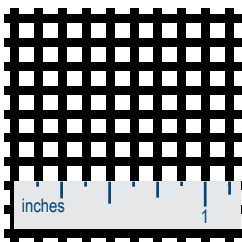
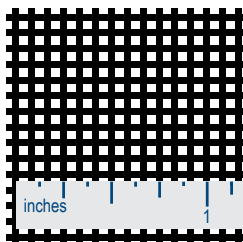
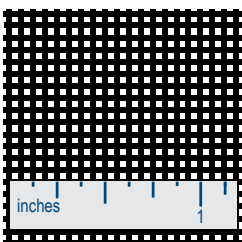
**PRODUCT  
SAMPLES**

Samples of any of our products can be sent to you. Please call  
**800.237.3820**  
to request a sample.



We look forward to  
serving you!

SQUARE WIRE MESH SIZES TO SCALE

8 Mesh	10 Mesh	12 Mesh	16 Mesh	Finer Meshes
				
8 Mesh, .0170" Wire Dia., 75% O/A	10 Mesh, .0250" Wire Dia., 56% O/A	12 Mesh, .0180" Wire Dia., 61% O/A	16 Mesh, .0090" Wire Dia., 72% O/A	14 Mesh, .0200" Wire Dia., 51% O/A
				
8 Mesh, .0280" Wire Dia., 60% O/A	10 Mesh, .0350" Wire Dia., 42% O/A	12 Mesh, .0230" Wire Dia., 52% O/A	16 Mesh, .0110" Wire Dia., 68% O/A	18 Mesh, .0090" Wire Dia., 70% O/A
				
8 Mesh, .0320" Wire Dia., 55% O/A	10 Mesh, .0470" Wire Dia., 28% O/A	12 Mesh, .0280" Wire Dia., 44% O/A	16 Mesh, .0180" Wire Dia., 51% O/A	20 Mesh, .0160" Wire Dia., 46% O/A
	<p>For Diameters and Gauge Equivalents see chart 3.1a on page 16.</p> <p>All mesh sizes not shown. For our full stock list visit <a href="http://mcnichols.com">mcnichols.com</a></p>			
8 Mesh, .0470" Wire Dia., 39% O/A		12 Mesh, .0350" Wire Dia., 33% O/A	16 Mesh, .0280" Wire Dia., 31% O/A	24 Mesh, .0140" Wire Dia., 44% O/A

Screens for sizing and straining can be furnished by McNICHOLS with any style of edge preparation or hook strip, ready for installation into any type equipment.

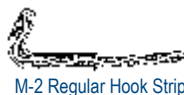
Hooks are furnished galvanized unless otherwise specified.

Hook Strips and Edges are all special order.

HOOK STRIPS & EDGES



M-1 Hooked Edge w/out Reinforcing



M-2 Regular Hook Strip



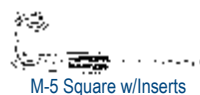
M-3 Two-Piece Hook Strip



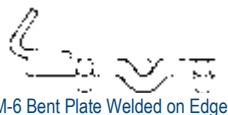
M-3-C Two-Piece Hook Strip w/Canvas Insert



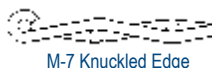
M-4 Bonded Plate Welded Insert



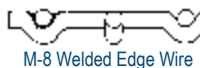
M-5 Square w/Inserts



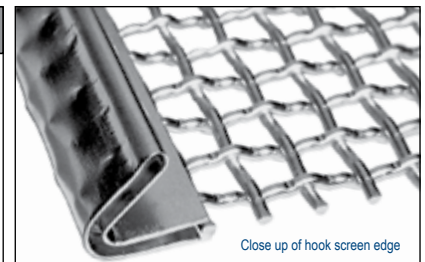
M-6 Bent Plate Welded on Edge



M-7 Knuckled Edge



M-8 Welded Edge Wire



Close up of hook screen edge

HOOK/EDGE TYPE	RECOMMENDED WIRE RANGE
M-1, M-4, M-6	.312" dia. and heavier
M-2, M-5	.063" dia. to .250" dia.
M-3 or M-3C	.054" dia. and lighter
M-7	.192" dia. and heavier
M-8	.148" dia. and heavier

## SQUARE OPENING SPACE SCREENS

DIAM.	% O/A	#/SF	DIAM.	% O/A	#/SF	DIAM.	% O/A	#/SF	DIAM.	% O/A	#/SF	DIAM.	% O/A	#/SF	DIAM.	% O/A	#/SF	DIAM.	% O/A	#/SF
4" SQ. OPENING			7/16	74.4	3.88	5/8	54.3	10.88	.135	81.5	.85	283	52.7	5.15	.120	65.0	1.51	.135	42.2	3.21
1	64.0	13.06	3/8	77.4	2.90	1/2	60.5	7.29	.120	83.2	.68	.263	54.8	4.52	.105	68.3	1.18	.120	45.6	2.62
3/4	70.9	7.66	5/16	80.6	2.05	7/16	64.0	5.71	.105	85.1	.52	.250	56.3	4.12	.092	71.3	.93	.105	49.6	2.07
5/8	74.8	5.46	.283	82.2	1.70	3/8	67.8	4.30	3/4	36.0	20.68	.225	59.2	3.41	.080	74.3	.71	.092	53.4	1.64
1/2	79.0	3.58	.263	83.3	1.48	5/16	71.9	3.07	5/8	41.3	15.17	.207	61.4	2.93	.072	76.4	.58	.080	57.4	1.28
7/16	81.3	2.77	.250	84.0	1.34	.283	74.1	2.55	1/2	47.9	10.30	.192	63.4	2.56	.063	78.9	.45	.072	60.3	1.06
3/8	83.6	2.07	.225	85.4	1.09	.263	75.6	2.22	7/16	51.8	8.14	.177	65.5	2.20	1/2" SQ. OPENING			.063	63.8	.83
5/16	86.0	1.45	.207	86.5	.93	.250	76.6	2.02	3/8	55.0	6.19	.162	67.6	1.87	3/8	29.0	12.20	.054	67.6	.62
.283	87.2	1.20	.192	87.4	.80	.225	78.5	1.65	5/16	61.0	4.45	.148	69.8	1.58	5/16	34.0	9.03	.047	70.9	.48
.263	88.0	1.04	.177	88.3	.69	.207	80.0	1.41	.283	63.8	3.71	.135	71.8	1.33	.283	36.9	7.64	3/16" SQ. OPENING		
.250	88.6	.94	.162	89.2	.58	.192	81.2	1.22	.263	65.7	3.25	.120	74.3	1.07	.263	39.0	6.75	.177	26.5	6.12
3-3/4" SQ. OPENING			.148	90.0	.48	.177	82.5	1.04	.250	67.0	2.96	.105	76.9	.83	250	40.5	6.19	.162	28.8	5.30
1	62.3	13.77	2-1/2" SQ. OPENING			.162	83.8	.88	.225	69.6	2.43	.092	79.3	.65	.225	43.6	5.16	.148	31.3	4.57
3/4	69.4	8.11	1	51.0	19.02	.148	85.0	.74	207	71.3	2.08	.080	81.7	.50	207	46.0	4.47	.135	33.8	3.92
5/8	73.5	5.77	3/4	59.2	11.37	.135	86.2	.62	.192	73.0	1.81	3/4" SQ. OPENING			.192	48.3	3.92	.120	37.2	3.22
1/2	77.9	3.79	5/8	64.0	8.16	.120	87.6	.49	.177	74.7	1.55	1/2	30.9	15.57	.177	50.7	3.40	.105	41.1	2.56
7/16	80.2	2.94	1/2	69.4	5.41	1-1/2" SQ. OPENING			.162	76.4	1.32	7/16	34.6	12.47	.162	53.2	2.90	.092	45.1	2.04
3/8	82.6	2.19	7/16	72.4	4.22	1	36.0	27.57	.148	78.1	1.11	3/8	39.1	9.61	.148	55.8	2.47	.080	49.1	1.60
5/16	85.2	1.54	3/8	75.6	3.16	3/4	44.4	16.86	.135	79.7	.93	5/16	44.4	7.03	7/16" SQ. OPENING			.072	52.2	1.33
.283	86.5	1.27	5/16	79.0	2.24	5/8	49.8	12.27	.120	81.7	.74	283	47.4	5.91	.135	58.4	2.09	.063	56.0	1.05
.263	87.3	1.11	.283	80.7	1.85	1/2	56.3	8.25	.105	83.7	.58	.263	49.5	5.20	.120	61.5	1.69	.054	60.3	.79
.250	87.9	1.00	.263	81.9	1.61	7/16	59.9	6.48	.092	85.5	.45	250	51.0	4.76	.105	65.0	1.33	.047	63.9	.62
3-1/2" SQ. OPENING			.250	82.6	1.46	3/8	64.0	4.90	1-1/8" SQ. OPENING			.225	54.0	3.94	.092	68.3	1.04	.041	67.3	.48
1	60.5	14.57	.225	84.2	1.19	5/16	68.5	3.50	3/4	32.6	22.38	207	56.4	3.40	.080	71.5	.80	5/32" SQ. OPENING		
3/4	67.8	8.60	.207	85.3	1.02	.283	70.8	2.91	5/8	37.9	16.49	.192	58.5	2.97	.072	73.7	.66	.120	32.2	3.64
5/8	72.0	6.13	.192	86.2	.88	.263	72.4	2.54	1/2	44.4	11.25	.177	60.7	2.56	.063	76.4	.51	.105	36.9	2.95
1/2	76.6	4.03	.177	87.2	.75	.250	73.4	2.31	7/16	48.4	8.91	.162	63.1	2.18	3/8" SQ. OPENING			.092	39.9	2.36
7/16	79.0	3.13	.162	88.2	.63	.225	75.6	1.89	3/8	52.9	6.79	.148	65.4	1.85	5/16	29.7	9.99	.080	43.5	1.86
3/8	81.6	2.33	.148	89.1	.53	.207	77.2	1.62	5/16	58.0	4.90	.135	67.6	1.56	.283	32.5	8.48	.072	48.1	1.56
5/16	84.3	1.65	2-1/4" SQ. OPENING			.192	78.6	1.40	283	60.8	4.09	.120	70.3	1.25	.263	34.5	7.51	.063	51.2	1.23
.283	85.6	1.36	1	47.9	20.61	.177	80.0	1.20	.263	62.7	3.58	.105	73.4	.98	.250	36.0	6.89	.054	53.3	.94
.263	86.5	1.18	3/4	56.2	12.37	.162	81.5	1.02	250	64.0	3.26	.092	76.0	.76	.225	39.0	5.77	.047	58.5	.73
.250	87.1	1.07	5/8	61.2	8.90	148	82.8	.85	.225	66.6	2.69	.080	78.6	.58	.207	41.5	5.00	.041	63.2	.55
.225	88.3	.87	1/2	66.9	5.91	135	84.2	.72	.207	68.6	2.31	.072	80.4	.48	.192	43.8	4.39	1/8" SQ. OPENING		
.207	89.1	.74	7/16	70.1	4.62	120	85.7	.57	.192	70.4	2.01	.063	82.5	.37	.177	46.1	3.82	.120	26.0	4.19
3-1/4" SQ. OPENING			3/8	73.4	3.46	1-3/8" SQ. OPENING			.177	72.2	1.72	5/8" SQ. OPENING			.162	48.7	3.27	.105	29.5	3.37
1	58.5	15.47	5/16	77.1	2.46	3/4	41.9	17.97	.162	74.0	1.46	7/16	31.6	13.45	.148	51.4	2.79	.092	33.4	2.71
3/4	66.0	9.16	.283	78.9	2.04	5/8	47.3	13.10	.148	75.9	1.23	3/8	36.0	10.40	.135	54.1	2.37	.080	37.2	2.15
5/8	70.3	6.54	.263	80.2	1.77	1/2	53.8	8.83	.135	77.6	1.04	5/16	41.3	7.64	.120	57.4	1.92	.072	40.2	1.79
1/2	75.0	4.31	.250	81.0	1.61	7/16	57.5	6.95	.120	79.7	.83	283	44.2	6.44	.105	61.0	1.51	.063	44.2	1.43
7/16	77.6	3.35	.225	82.6	1.31	3/8	61.6	5.26	.105	81.9	.64	.263	46.4	5.67	.092	64.5	1.18	.054	48.7	1.09
3/8	80.4	2.50	.207	83.9	1.12	5/16	66.5	3.77	.092	83.9	.50	250	47.9	5.19	.080	67.9	.91	.047	52.8	.85
5/16	83.2	1.76	.192	84.9	.97	.283	68.8	3.14	.080	85.7	.38	.225	50.7	4.31	.072	70.4	.75	.041	56.7	.67
.283	84.6	1.46	.177	85.9	.83	.263	70.5	2.74	1" SQ. OPENING			.207	53.4	3.72	.063	73.3	.59	.035	61.0	.50
.263	85.6	1.26	.162	87.0	.70	.250	71.5	2.49	5/8	34.0	18.06	.192	55.0	3.26	.054	76.4	.44	3/32" SQ. OPENING		
.250	86.2	1.15	.148	88.0	.59	.225	73.9	2.04	1/2	40.5	12.38	.177	57.6	2.81	.263	29.5	8.46	.092	24.5	3.10
.225	87.5	.93	.135	89.0	.49	.207	75.6	1.75	7/16	44.4	9.84	.162	61.0	2.40	.250	30.9	7.78	.080	29.6	2.48
.207	88.4	.79	2" SQ. OPENING			.192	77.0	1.52	3/8	49.0	7.52	.148	62.7	2.04	.225	33.8	6.53	.072	32.5	2.18
3" SQ. OPENING			1	44.4	22.49	.177	78.5	1.30	5/16	54.3	5.44	.135	65.0	1.72	.207	36.2	5.68	.063	35.0	1.66
1	56.3	16.50	3/4	52.9	13.57	.162	80.0	1.10	283	57.1	4.55	.120	67.9	1.38	.192	38.4	5.00	.054	38.8	1.35
3/4	64.0	9.79	5/8	58.0	9.79	.148	81.5	.92	.263	59.1	3.99	.105	71.0	1.08	.177	40.8	4.36	.047	45.2	1.05
5/8	68.5	7.00	1/2	64.0	6.53	.135	82.9	.78	250	60.5	3.64	.092	73.8	.85	.162	43.4	3.74	.041	47.6	.83
1/2	73.5	4.62	7/16	67.3	5.11	.120	84.6	.62	.225	63.3	3.01	.080	76.6	.65	.148	46.0	3.20	1/16" SQ. OPENING		
7/16	76.2	3.59	3/8	70.9	3.84	1-1/4" SQ. OPENING			.207	65.3	2.58	.072	78.5	.53	.135	48.8	2.72	.063	24.6	2.15
3/8	79.0	2.68	5/16	74.8	2.73	3/4	39.1	19.22	.192	67.2	2.25	.063	80.9	.41	.120	52.2	2.21	.054	29.6	1.67
5/16	82.0	1.90	.283	76.7	2.26	5/8	44.4	14.06	.177	69.2	1.93	9/16" SQ. OPENING			.105	56.0	1.74	.047	33.2	1.40
.283	83.5	1.57	.263	78.1	1.97	1/2	51.0	9.51	.162	71.2	1.64	7/16	28.4	14.42	.092	59.6	1.37	.041	37.0	1.11
.263	84.5	1.36	.250	79.0	1.79	7/16	54.8	7.												



## SQUARE MESH WEAVE CHART

DIAM.	OPENING WIDTH	%O/A	#/100 SF	DIAM.	OPENING WIDTH	%O/A	#/100 SF	DIAM.	OPENING WIDTH	%O/A	#/100 SF	DIAM.	OPENING WIDTH	%O/A	#/100 SF	DIAM.	OPENING WIDTH	%O/A	#/100 SF
1" MESH CENTER TO CENTER				.177	.2674	36.1	485.7	4-1/2 MESH				.023	.0881	62.7	31.1	.016	.0340	46.2	34.4
.250	.7500	56.3	412.4	.162	.2824	40.3	402.3	.105	.1172	27.7	333.7	.020	.0911	67.1	23.4	.015	.0350	49.0	30.1
.225	.7750	60.1	332.1	.148	.2964	44.4	332.5	.092	.1302	34.2	263.9	10 MESH				.014	.0360	51.8	26.1
.207	.7930	62.9	280.1	.135	.3094	48.3	274.3	.080	.1422	40.8	195.9	.047	.0530	28.1	148.4	.0135	.0365	53.3	24.2
.192	.8080	65.3	240.3	.120	.3244	53.1	214.8	.072	.1502	45.6	157.0	.041	.0590	34.8	116.3	.013	.0370	54.8	22.4
.177	.8230	67.7	203.7	.105	.3394	58.2	163.2	.063	.1592	51.2	118.9	.035	.0650	42.3	83.1	.012	.0380	57.8	19.0
.162	.8380	70.2	170.2	.092	.3524	62.7	124.5	.054	.1682	57.2	86.4	.032	.0680	46.2	68.8	.011	.0390	60.8	15.9
.148	.8520	72.6	141.7	.080	.3644	67.1	93.7	.047	.1752	62.0	65.0	.028	.0720	51.8	52.1	.010	.0400	64.0	13.1
.135	.8650	74.8	117.7	.072	.3724	70.1	75.7	.041	.1812	66.3	49.2	.025	.0750	56.3	41.2	.0095	.0405	65.6	11.8
.120	.8800	77.4	92.8	.063	.3814	73.5	57.8	.035	.1872	70.8	35.7	.023	.0770	59.3	34.7	.009	.0410	67.2	10.5
.105	.8950	80.1	71.0	.054	.3904	77.0	42.3	.032	.1902	73.1	29.8	.020	.0800	64.0	26.1	24 MESH			
.092	.9080	82.4	54.4	.047	.3974	79.8	32.0	5 MESH				12 MESH				.020	.0217	27.1	64.8
.080	.9200	84.6	41.1	.041	.4034	82.2	24.3	.092	.1080	29.2	283.4	.041	.0423	25.4	136.7	.018	.0237	32.4	51.5
.072	.9280	86.1	33.3	2-1/2 MESH				.080	.1200	36.0	220.6	.035	.0483	33.2	102.1	.017	.0247	35.1	48.0
.063	.9370	87.8	25.5	.192	.2080	27.0	654.4	.072	.1280	41.0	176.4	.032	.0513	37.5	84.3	.016	.0257	38.0	42.1
3/4" MESH CENTER TO CENTER				.177	.2230	31.1	548.2	.063	.1370	46.9	133.2	.028	.0553	43.6	63.5	.015	.0267	41.1	36.7
.250	.5000	44.4	562.3	.162	.2380	35.4	453.1	.054	.1460	53.3	96.7	.025	.0583	48.4	50.1	.014	.0277	44.2	31.8
.225	.5250	49.0	451.0	.148	.2520	39.7	373.7	.047	.1530	58.5	72.6	.023	.0603	51.8	42.2	.0135	.0282	45.8	29.4
.207	.5430	52.4	379.4	.135	.2650	43.9	307.8	.041	.1590	63.2	54.9	.020	.0633	57.2	31.6	.013	.0287	47.4	27.2
.192	.5580	55.3	324.8	.120	.2800	49.0	240.6	.035	.1650	68.1	39.8	.018	.0653	60.8	25.5	.012	.0297	50.8	23.0
.177	.5730	58.3	274.7	.105	.2950	54.4	182.4	.032	.1680	70.6	33.2	14 MESH				26 MESH			
.162	.5880	61.4	229.2	.092	.3080	59.3	139.0	.028	.1720	74.0	25.3	.035	.0364	25.4	116.1	.018	.0205	28.4	56.6
.148	.6020	64.4	190.5	.080	.3200	64.0	104.4	.025	.1750	76.6	20.2	.032	.0394	29.8	100.5	.017	.0215	31.2	52.6
.135	.6150	67.2	158.1	.072	.3280	67.2	84.3	.023	.1770	78.3	17.0	.028	.0434	36.2	75.5	.016	.0225	34.2	46.1
.120	.6300	70.5	124.4	.063	.3370	71.0	64.3	6 MESH				.025	.0464	41.5	59.3	.015	.0235	37.3	40.2
.105	.6450	73.9	95.0	.054	.3460	74.8	47.1	.092	.0747	20.2	352.8	.023	.0484	45.2	49.8	.014	.0245	40.6	34.7
.092	.6580	76.9	72.8	.047	.3530	77.9	35.6	.080	.0867	27.2	259.1	.020	.0514	51.0	37.2	.0135	.0250	42.3	32.1
.080	.6700	79.8	54.9	.041	.3590	80.6	27.0	.072	.0947	32.5	216.9	.018	.0534	55.1	29.9	.013	.0255	44.0	29.7
.072	.6780	81.7	44.5	3 MESH				.063	.1037	38.9	163.0	.017	.0544	57.2	26.6	.012	.0265	47.5	25.1
.063	.6870	83.9	34.0	.162	.1713	26.3	560.4	.054	.1127	46.0	117.7	.016	.0554	59.3	23.5	.011	.0275	51.1	20.9
.054	.6960	86.1	24.9	.148	.1853	30.8	460.2	.047	.1197	51.8	88.2	.015	.0564	61.5	20.6	.010	.0285	54.9	17.2
5/8" MESH CENTER TO CENTER				.135	.1983	35.3	377.6	.041	.1257	57.2	66.5	.014	.0574	63.7	17.9	30 MESH			
.250	.3750	36.0	689.4	.120	.2133	40.8	293.9	.035	.1317	62.7	48.1	16 MESH				.016	.0173	26.9	51.8
.225	.4000	41.0	551.0	.105	.2283	46.8	222.0	.032	.1347	65.6	40.0	.028	.0345	30.5	83.6	.015	.0183	30.1	47.4
.207	.4180	44.7	462.4	.092	.2413	52.3	168.7	.028	.1387	69.6	30.5	.025	.0375	36.0	68.9	.014	.0193	33.5	40.8
.192	.4330	48.0	395.0	.080	.2533	57.6	126.4	.025	.1417	72.6	24.3	.023	.0395	39.9	57.7	.0135	.0198	35.3	37.8
.177	.4480	51.4	333.5	.072	.2613	61.3	101.9	.023	.1437	74.7	20.5	.020	.0425	46.2	43.0	.013	.0203	37.1	34.8
.162	.4630	54.9	277.7	.063	.2703	65.6	77.6	.020	.1467	77.8	15.5	.018	.0445	50.7	34.5	.012	.0213	40.8	29.4
.148	.4770	58.3	230.5	.054	.2793	70.1	56.7	7 MESH				.017	.0455	53.0	30.7	.011	.0223	44.8	24.5
.135	.4900	61.5	191.0	.047	.2863	73.6	42.8	.063	.0799	31.4	184.7	.016	.0465	55.4	27.1	.010	.0233	48.9	20.0
.120	.5050	65.3	150.2	.041	.2923	76.7	32.5	.054	.0889	38.8	139.7	.015	.0475	57.8	23.7	.0095	.0238	51.0	18.0
.105	.5200	69.2	114.5	.035	.2983	79.9	23.7	.047	.0959	45.2	104.2	.014	.0485	60.2	20.6	.009	.0243	53.1	16.1
.092	.5330	72.7	87.9	.032	.3013	81.5	19.7	.041	.1019	51.0	78.4	.0135	.0490	61.5	19.1	.0085	.0248	55.4	14.3
.080	.5450	76.0	66.1	3-1/2 MESH				.035	.1079	57.2	56.5	.013	.0495	62.7	17.7	35 MESH			
.072	.5530	78.3	53.5	.135	.1507	27.9	429.0	.032	.1109	60.4	47.0	.012	.0505	65.3	15.0	.014	.0146	26.1	46.5
.063	.5620	80.9	40.9	.120	.1657	33.8	349.9	.028	.1149	64.8	35.8	.011	.0515	67.9	12.6	.0135	.0151	27.9	45.2
.054	.5710	83.5	30.0	.105	.1807	40.1	263.2	.025	.1179	68.2	28.4	.010	.0525	70.6	10.4	.013	.0156	29.8	41.6
.047	.5780	85.5	22.7	.092	.1937	46.1	199.3	.023	.1199	70.6	24.0	.0095	.0530	71.9	9.4	.012	.0166	33.8	35.0
2 MESH				.080	.2057	52.0	148.9	.020	.1229	74.1	18.1	18 MESH				.011	.0176	37.9	29.0
.250	.2500	25.0	894.6	.072	.2137	56.1	119.8	.018	.1249	76.6	14.6	.025	.0306	30.3	75.0	.010	.0186	42.4	23.7
.225	.2750	30.3	710.6	.063	.2237	60.9	91.1	8 MESH				.023	.0326	34.4	66.0	.0095	.0191	44.7	21.3
.207	.2930	34.3	593.8	.054	.2317	65.9	66.5	.054	.0710	32.3	162.7	.020	.0356	41.1	49.0	.009	.0196	47.1	19.0
.192	.3080	37.9	505.5	.047	.2387	70.9	50.2	.047	.0780	38.9	120.9	.018	.0376	45.8	39.2	40 MESH			
.177	.3230	41.7	425.4	.041	.2447	73.5	38.1	.041	.0840	45.2	90.6	.017	.0386	48.3	34.8	.012	.0130	27.0	40.9
.162	.3380	45.7	353.3	.035	.2507	77.2	27.6	.035	.0900	51.8	65.1	.016	.0396	50.8	30.7	.011	.0140	31.4	33.8
.148	.3520	49.6	292.4	.032	.2537	79.0	23.1	.032	.0930	55.4	54.1	.015	.0406	53.4	26.8	.010	.0150	36.0	27.6
.135	.3650	53.3	241.7	4 MESH				.028	.0970	60.2	41.1	.014	.0416	56.1	23.3	.0095	.0155	38.4	24.7
.120	.3800	57.8	189.6	.120	.1300	27.0	388.6	.025	.1000	64.0	32.6	.0135	.0421	57.4	21.6	.009	.0160	41.0	22.0
.105	.3950	62.4	144.2	.105	.1450	33.6	306.2	.023	.1020	66.6	27.5	.013	.0426	58.8	20.0	45 MESH			
.092	.4080	66.6	110.2	.092	.1580	39.9	231.0	.020	.1050	70.6	20.7	.012	.0436	61.6	17.0	.011	.0112	25.4	36.9
.080	.4200	70.6	83.0	.080	.1700	46.2	172.1	.018	.1070	73.3	16.8	.011	.0446	64.4	14.2	.010	.0122	30.1	31.6
.072	.4280	73.3	67.1	.072	.1780	50.7	138.2	.017	.1080	74.6	14.9	.010	.0456	67.4	11.7	.0095	.0127	32.7	28.3
.063	.4370	76.4	51.2	.063	.1870	56.0	104.8	9 MESH				.0095	.0460	68.9	10.5	.009	.0132	35.3	25.2
.054	.4460	79.6	37.6	.054	.1960	61.5	76.4	.054	.0571	26.3	177.4	.009	.0466	70.4	9.5	.0085	.0137	38.0	22.3
.047	.4530	82.1	28.4	.047	.2030	65.9	57.6	.047	.0641	33.2	138.2	20 MESH				.008	.0142</		

SQUARE MESH WEAVE CHART (CONTINUED FROM PAGE 23)

DIAM.	OPENING WIDTH	%O/A	#/100 SF	DIAM.	OPENING WIDTH	%O/A	#/100 SF	DIAM.	OPENING WIDTH	%O/A	#/100 SF
50 MESH (CONTINUED)				130 MESH				120 MESH			
.0085	.0115	33.1	25.1	.0034	.0043	31.1	11.9	.0042	.0041	24.6	10.4
.008	.0120	36.0	22.1	.0034	.0043	31.1	11.9	.0040	.0043	26.6	10.2
.0075	.0125	39.1	19.2	140 MESH				130 MESH			
60 MESH				.0029	.0042	34.9	9.3	.0038	.0039	25.6	14.5
.008	.0087	27.2	27.3	150 MESH				140 MESH			
.0075	.0092	30.5	23.7	.0026	.0041	37.4	8.0	.0033	.0038	28.6	11.8
.007	.0097	33.9	20.4	160 MESH				150 MESH			
.0065	.0102	37.5	17.4	.0025	.0038	36.4	7.9	.0030	.0037	30.8	7.1
.006	.0107	41.2	14.7	170 Mesh				160 MESH			
70 MESH				.0024	.0035	35.1	7.7	.0028	.0035	31.4	7.0
.007	.0073	26.1	23.3	180 MESH				170 MESH			
.0065	.0078	29.8	20.8	.0023	.0033	34.7	7.5	.0026	.0033	31.2	8.8
.006	.0083	33.8	17.5	200 MESH				180 MESH			
80 MESH				.0021	.0029	33.6	7.0	.0025	.0031	31.1	6.7
.006	.0065	27.0	20.4	220 MESH				200 MESH			
.0055	.0070	31.4	16.9	.0017	.0028	38.7	5.0	.0025	.0025	25.0	6.6
.005	.0075	36.0	13.8	250 MESH				.0023	.0027	29.2	6.3
90 MESH				.0016	.0024	36.0	5.1	250 MESH			
.006	.0051	21.1	22.4	325 MESH				.0016	.0024	36.0	4.6
.0055	.0056	25.4	18.4	.0011	.0020	42.0	4.2	270 MESH			
.005	.0061	30.1	15.8	400 MESH				.0016	.0021	32.2	5.3
100 MESH				.0010	.0015	36.0	3.7	300 MESH			
.0045	.0055	30.3	14.2	TWILLED WEAVE				.0015	.0018	29.7	5.2
.004	.0060	36.0	11.0	100 MESH							
.0035	.0065	42.3	8.3	.005	.0045	25.0	17.0				
.003	.0070	49.0	6.0	110 MESH							
120 MESH				.0045	.0046	25.6	12.4				
.0037	.0046	30.7	13.0								

To see more product application photos visit [mcnichols.com](http://mcnichols.com).



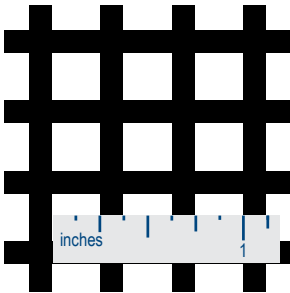
SQUARE OPENING SIZES TO SCALE

1/4" Sq. Open

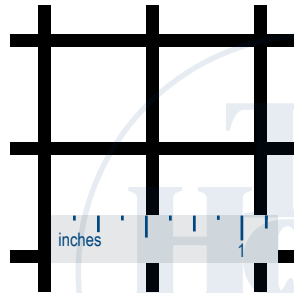
1/2" Sq. Open

3/4" Sq. Open

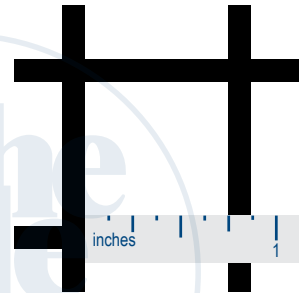
1" Sq. Open



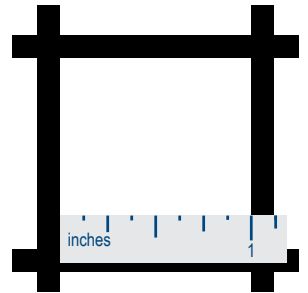
1/4" Sq. Opg., .120" Wire Dia., 46% O/A



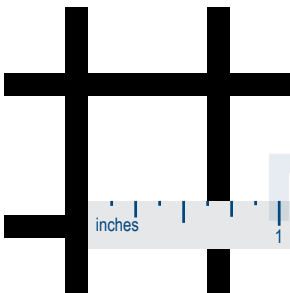
1/2" Sq. Opg., .063" Wire Dia., 79% O/A



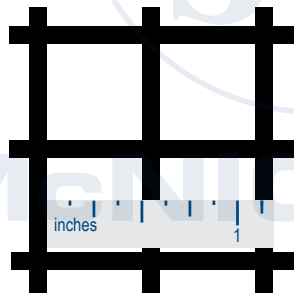
3/4" Sq. Opg., .120" Wire Dia., 74% O/A



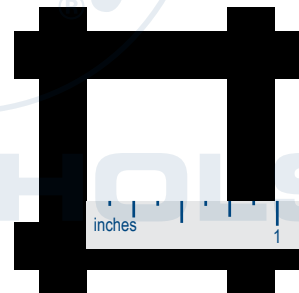
1" Sq. Opg., .120" Wire Dia., 77% O/A



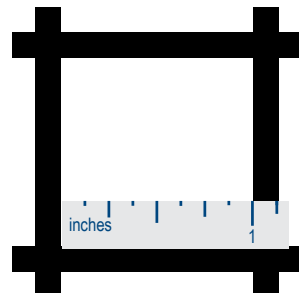
5/8" Sq. Opg., .120" Wire Dia., 70% O/A



1/2" Sq. Opg., .092" Wire Dia., 71% O/A



3/4" Sq. Opg., .250" Wire Dia., 56% O/A




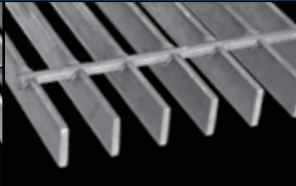

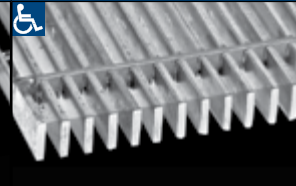
1" Sq. Opg., .135" Wire Dia., 78% O/A

# BAR GRATING





**McNICHOLS®** Quality Bar Grating is the top choice for strength, safety and overall value!

Bar Grating provides a load bearing surface but allows air, light, heat, sound and fluid to pass through. Bar Grating is strong, durable and virtually maintenance free.

## PRODUCT OPTIONS

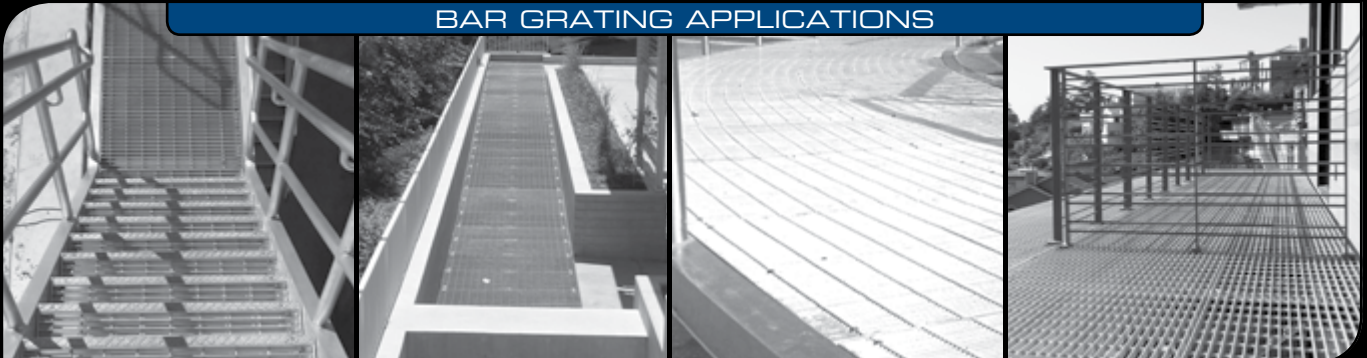
	WELDED	HEAVY-DUTY WELDED	LOCKED BY SWAGING	PRESS-LOCKED CLOSE MESH
Pattern Types				
	pg. 26 / webcode: GBW1	pg. 27 / webcode: GBW2	pg. 28 / webcode: GBL1	pg. 31 / webcode: GBP2

## PRODUCT SPECIFICATIONS

Series (Visit <a href="http://mcnichols.com">mcnichols.com</a> for all of our series options)	GW, SGW	GHB	GAL, SFT Flush Top, I-Bar GIA, Safe-T-Grid®	GAA, GCM
Materials	Plain Steel, Galvanized Steel, Stainless Steel	Plain Steel, Galvanized Steel, Stainless Steel	Aluminum, Stainless Steel	Plain Steel, Galvanized Steel, Aluminum (others by special order)
Surface	Smooth or Serrated	Smooth or Serrated	Smooth, Grooved or Serrated	Smooth or Serrated
Bar Thickness	3/16", 1/4"	1/8", 3/8", 1/4"	1/8", 3/16", 1/4", .94" (Safe-T-Grid®)	3/16"
Bar Heights	3/4" to 2.5"	1" to 3"	1" to 2"	1" to 2"
Standard Sizes	2'x20', 3'x20', 2'x12', 3'x12', 2'x24', 3'x24', 4'x24'	3'x20'	2'x24', 2'x20', 3'x20', 3'x24'	3'x12', 3'x20', 3'x24' (GAA Only)
QR Code (Scan using a QR Reader on your smart phone)				

Not all product combinations are available. See [mcnichols.com](http://mcnichols.com) for availability.

## BAR GRATING APPLICATIONS



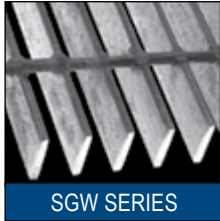


## WELDED BAR GRATING

Welded Bar Grating is a suitable flooring application choice because of its strength, safety and overall value. Welded bar grating has a rectangular-shaped bearing bar that is available in a variety of bar thicknesses, heights, spacings and materials.



GW SERIES

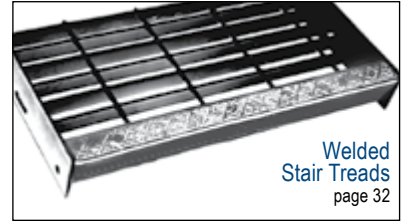


SGW SERIES

**GW, SGW SERIES** WEB CODE: GBW1

GW Series Grating will handle most moderate loads and light wheel traffic with its standard bearing bar centers of 1-3/16".

SGW Series Grating will handle heavier loads than the GW Series.

Welded  
Stair Treads  
page 32

## PRODUCT OPTIONS

**Materials:** Plain Steel, Galvanized Steel, Stainless Steel  
(Plain Steel available with a standard black painted coat)

**Surface:** Smooth or Serrated

**Bar Heights:** 3/4" to 2-1/2"

**Bar Thickness:** 1/8", 3/16"

**Standard Sizes:** 2'x20', 3'x20', 2'x24', 3'x24'



Serrated Grating

## STEEL LOAD TABLE: GW, GW-2

Bearing Bar Size		SPAN (1-3/16" Center to Center Bar Spacing)															
		2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	7'	8'					
3/4" x 1/8"	U	355	227	158	116	89	70										
	D	.099	.155	.223	.304	.397	.503										
	C	355	284	237	174	178	158										
	D	.079	.124	.179	.243	.319	.402										
3/4" x 3/16"	U	533	341	237	174	133	105										
	D	.099	.155	.223	.304	.397	.502										
	C	533	426	355	305	266	237										
	D	.079	.124	.179	.244	.318	.403										
1" x 1/8"	U	632	404	281	206	158	125	101	84	70							
	D	.075	.116	.168	.228	.298	.378	.466	.563	.670							
	C	632	505	421	361	316	281	253	230	211							
	D	.060	.093	.134	.183	.239	.302	.372	.451	.536							
1" x 3/16"	U	947	606	421	309	237	187	152	125	105							
	D	.074	.116	.168	.228	.298	.377	.467	.563	.670							
	C	947	758	632	541	474	421	379	344	316							
	D	.060	.093	.134	.182	.239	.302	.372	.451	.536							
1-1/4" x 1/8"	U	987	632	439	322	247	195	158	130	110	81						
	D	.060	.093	.134	.182	.239	.302	.372	.451	.538	.730						
	C	987	789	658	564	493	439	395	359	329	282						
	D	.048	.074	.107	.146	.191	.241	.298	.360	.429	.584						
1-1/4" x 3/16"	U	1480	947	658	483	370	292	237	196	164	121						
	D	.060	.093	.134	.182	.238	.302	.373	.451	.536	.731						
	C	1480	1184	987	846	740	658	592	538	493	423						
	D	.048	.074	.107	.146	.191	.241	.298	.360	.429	.584						
1-1/2" x 1/8"	U	1421	909	632	464	355	281	227	188	158	116	89					
	D	.050	.078	.112	.152	.199	.252	.310	.376	.447	.608	.794					
	C	1421	1137	947	812	711	632	568	517	474	406	355					
	D	.040	.062	.089	.122	.159	.201	.248	.300	.358	.487	.636					
1-1/2" x 3/16"	U	2132	1364	947	696	533	421	341	282	237	174	133					
	D	.050	.078	.112	.152	.199	.251	.310	.376	.447	.608	.794					
	C	2132	1705	1421	1218	1066	947	853	775	711	609	533					
	D	.040	.062	.089	.122	.159	.201	.248	.300	.358	.487	.636					
1-3/4" x 3/16"	U	2901	1857	1289	947	725	573	464	384	322	237	181					
	D	.043	.067	.096	.130	.170	.215	.266	.322	.383	.521	.681					
	C	2901	2321	1934	1658	1451	1289	1161	1055	967	829	725					
	D	.034	.053	.077	.104	.136	.172	.213	.257	.306	.417	.545					
2" x 3/16"	U	3789	2425	1684	1237	947	749	606	501	421	309	237					
	D	.037	.058	.084	.114	.149	.189	.233	.282	.335	.456	.596					
	C	3789	3032	2526	2165	1895	1684	1516	1378	1263	1083	947					
	D	.030	.047	.067	.091	.119	.151	.186	.225	.268	.365	.477					
2-1/4" x 3/16"	U	4796	3069	2132	1566	1199	947	767	634	533	392	300					
	D	.033	.052	.074	.101	.132	.168	.207	.250	.298	.406	.530					
	C	4796	3837	3197	2741	2398	2132	1918	1744	1599	1370	1199					
	D	.026	.041	.060	.081	.106	.134	.166	.200	.238	.324	.424					
2-1/2" x 3/16"	U	5921	3789	2632	1933	1480	1170	947	783	658	483	370					
	D	.030	.047	.067	.091	.119	.151	.186	.225	.268	.365	.477					
	C	5921	4737	3947	3383	2961	2632	2368	2153	1974	1692	1480					
	D	.024	.037	.054	.073	.095	.121	.149	.180	.215	.292	.381					

To determine load for SGW, SGW-2, multiply value at left by the load factor of 1.27. Deflection under the factored loads will be same as shown in the load table.

For Serrated Grating the depth of the grating required will be 1/4" greater than shown in tables.

## BAR SPACING: GW, GW-2, SGW 6.1b

SERIES	GW (19W4)		GW-2 (19W2)		SGW (15W4)		SGW-2 (15W2)	
Bar Spacing								
End View (showing 3/16" thickness, 1/8" thickness also available)								
Bearing Bar Size (height x thickness)	Series No.	#/SF	Series No.	#/SF	Series No.	#/SF	Series No.	#/SF
3/4" x 1/8"	GW-75A	4.1	GW-75A-2	5.0	SGW-75A	5.0	SGW-75A-2	5.9
3/4" x 3/16"	GW-75	5.8	GW-75-2	6.7	SGW-75	7.2	SGW-75-2	8.1
1" x 1/8"	GW-100A	5.2	GW-100A-2	6.1	SGW-100A	6.4	SGW-100A-2	7.3
1" x 3/16"	GW-100	7.5	GW-100-2	8.4	SGW-100	9.3	SGW-100-2	10.2
1-1/4" x 1/8"	GW-125A	6.3	GW-125A-2	7.2	SGW-125A	7.9	SGW-125A-2	8.8
1-1/4" x 3/16"	GW-125	9.1	GW-125-2	10.0	SGW-125	11.3	SGW-125-2	12.2
1-1/2" x 1/8"	GW-150A	7.4	GW-150A-2	8.3	SGW-150A	9.3	SGW-150A-2	10.2
1-1/2" x 3/16"	GW-150	10.8	GW-150-2	11.7	SGW-150	13.5	SGW-150-2	14.4
1-3/4" x 3/16"	GW-175	12.5	GW-175-2	13.4	SGW-175	15.6	SGW-175-2	16.5
2" x 3/16"	GW-200	14.1	GW-200-2	15.0	SGW-200	17.7	SGW-200-2	18.6
2-1/4" x 3/16"	GW-225	15.8	GW-225-2	16.7	SGW-225	19.8	SGW-225-2	20.7
2-1/2" x 3/16"	GW-250	17.4	GW-250-2	18.3	SGW-250	21.9	SGW-250-2	22.8

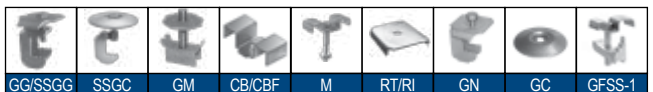
## PANEL WIDTHS: GW, SGW 6.1c

#Bars	GW	SGW	#Bars	GW	SGW	#Bars	GW	SGW
2	1-3/8"	1-1/8"	17	19-3/16"	15-3/16"	32		29-1/4"
3	2-9/16"	2-1/16"	18	20-3/8"	16-1/8"	33		30-3/16"
4	3-3/4"	3"	19	21-9/16"	17-1/16"	34		31-1/8"
5	4-15/16"	3-15/16"	20	22-3/4"	18"	35		32-1/16"
6	6-1/8"	4-7/8"	21	23-15/16"	18-15/16"	36		33"
7	7-5/16"	5-13/16"	22	25-1/8"	19-7/8"	37		33-15/16"
8	8-1/2"	6-3/4"	23	26-5/16"	20-13/16"	38		34-7/8"
9	9-11/16"	7-11/16"	24	27-1/2"	21-3/4"	39		35-13/16"
10	10-7/8"	8-5/8"	25	28-11/16"	22-11/16"	38		
11	12-1/16"	9-9/16"	26	29-7/8"	23-5/8"	39		
12	13-1/4"	10-1/2"	27	31-1/16"	24-9/16"			
13	14-7/16"	11-7/16"	28	32-1/4"	25-1/2"			
14	15-5/8"	12-3/8"	29	33-7/16"	26-7/16"			
15	16-13/16"	13-5/16"	30	34-5/8"	27-3/8"			
16	18"	14-1/4"	31	35-13/16"	28-5/16"			

STANDARD SIZES

## CLIPS &amp; FASTENERS

For a list of clips and fasteners and their purpose please see page 42.



## HEAVY-DUTY WELDED BAR GRATING



GHB SERIES

## GHB SERIES

WEB CODE: GBW2

GHB Series can handle heavier load requirements with a bearing bar thickness of 1/4" and bar heights from 1" to 3". It is ideal for heavy rolling applications, such as bridge floor, highways, airport runways or other high-load trench applications.

Heavy Duty Welded Stair Treads  
page 32

## PRODUCT OPTIONS

Materials:	Plain Steel, Galvanized Steel (Plain Steel available with a standard black painted coat)
Surface:	Smooth or Serrated
Bar Heights:	1" to 3"
Bar Thickness:	1/4"
Standard Sizes:	2' or 3'x20', 2' or 3'x24'

## STEEL LOAD TABLE: GHB, GHB-2

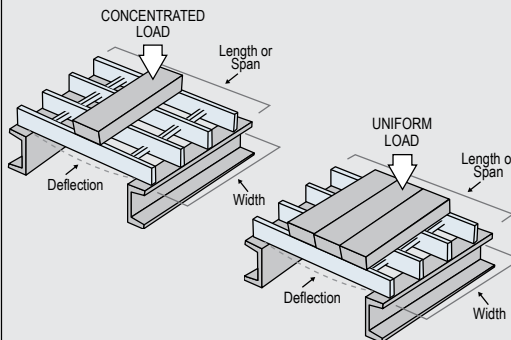
6.2a

		SPAN (1-3/16" Center to Center Bar Spacing)															
Bearing Bar Size		1'-0"	1'-6"	2'-0"	2'-6"	3'-0"	3'-6"	4'-0"	4'-6"	5'-0"	5'-6"	6'-0"	6'-6"	7'-0"	7'-6"	8'-0"	
1" x 1/4"	U	5615	2495	1404	898	624	458	351	277	225	186	156	133	115	100	88	
	D	0.021	0.047	0.083	0.129	0.186	0.253	0.331	0.419	0.518	0.627	0.745	0.875	1.018	1.166	1.329	
	C	2807	1872	1404	1123	936	802	702	624	561	510	468	432	401	374	351	
	D	0.016	0.037	0.066	0.104	0.149	0.203	0.265	0.335	0.414	0.500	0.596	0.700	0.811	0.931	1.060	
1-1/4" x 1/4"	U	8772	3899	2193	1404	975	716	548	433	351	290	244	208	179	156	137	
	D	0.017	0.037	0.066	0.104	0.149	0.203	0.265	0.335	0.414	0.501	0.597	0.701	0.811	0.931	1.059	
	C	4386	2924	2193	1754	1462	1253	1097	975	877	797	731	675	627	585	548	
	D	0.013	0.030	0.053	0.083	0.119	0.162	0.212	0.268	0.331	0.400	0.477	0.560	0.649	0.745	0.847	
1-1/2" x 1/4"	U	12632	5614	3158	2021	1404	1031	790	624	505	418	351	299	258	225	197	
	D	0.014	0.031	0.055	0.086	0.124	0.169	0.221	0.279	0.345	0.418	0.497	0.583	0.676	0.777	0.881	
	C	6316	4211	3158	2526	2105	1805	1579	1404	1263	1148	1053	972	902	842	790	
	D	0.011	0.025	0.044	0.069	0.099	0.135	0.177	0.224	0.276	0.334	0.397	0.466	0.541	0.621	0.707	
1-3/4" x 1/4"	U	17193	7641	4298	2751	1910	1404	1075	849	688	568	478	407	351	306	269	
	D	0.012	0.027	0.047	0.074	0.106	0.145	0.189	0.239	0.296	0.357	0.426	0.500	0.580	0.666	0.758	
	C	8597	5731	4298	3439	2866	2456	2149	1910	1719	1563	1433	1323	1228	1146	1075	
	D	0.010	0.021	0.038	0.059	0.085	0.116	0.151	0.192	0.236	0.286	0.341	0.400	0.463	0.532	0.606	
2" x 1/4"	U	22456	9980	5614	3593	2495	1833	1404	1109	898	742	624	532	458	399	351	
	D	0.010	0.023	0.041	0.065	0.093	0.127	0.166	0.210	0.259	0.313	0.373	0.438	0.507	0.582	0.662	
	C	11228	7485	5614	4491	3743	3208	2807	2495	2246	2041	1871	1727	1604	1497	1404	
	D	0.008	0.019	0.033	0.052	0.075	0.101	0.132	0.168	0.207	0.250	0.298	0.350	0.406	0.466	0.530	
2-1/2" x 1/4"	U	35088	15595	8772	5614	3899	2864	2193	1733	1404	1160	975	830	716	624	548	
	D	0.008	0.019	0.033	0.052	0.075	0.101	0.132	0.168	0.207	0.250	0.298	0.350	0.406	0.466	0.529	
	C	17544	11696	8772	7018	5848	5013	4386	3899	3509	3190	2924	2699	2506	2339	2193	
	D	0.007	0.015	0.027	0.041	0.060	0.081	0.106	0.134	0.166	0.200	0.238	0.280	0.324	0.372	0.424	
3" x 1/4"	U	50527	22456	12632	8084	5614	4125	3158	2495	2021	1670	1404	1196	1031	898	789	
	D	0.007	0.016	0.028	0.043	0.062	0.085	0.110	0.140	0.172	0.209	0.248	0.291	0.338	0.388	0.441	
	C	25263	16842	12632	10105	8421	7218	6316	5614	5053	4593	4211	3887	3609	3368	3158	
	D	0.006	0.012	0.022	0.035	0.050	0.068	0.088	0.112	0.138	0.167	0.199	0.233	0.270	0.310	0.353	
3-1/2" x 1/4"	U	68772	30565	17193	11004	7641	5614	4298	3396	2751	2273	1910	1628	1404	1223	1075	
	D	0.006	0.013	0.024	0.037	0.053	0.072	0.095	0.120	0.148	0.179	0.213	0.250	0.290	0.333	0.379	
	C	34386	22924	17193	13754	11462	9825	8597	7641	6877	6252	5731	5290	4912	4585	4298	
	D	0.005	0.011	0.019	0.030	0.043	0.058	0.076	0.096	0.118	0.143	0.170	0.200	0.232	0.266	0.303	
4" x 1/4"	U	89825	39922	22456	14372	9981	7333	5614	4436	3593	2969	2495	2126	1833	1597	1404	
	D	0.005	0.012	0.021	0.032	0.047	0.063	0.083	0.105	0.129	0.156	0.186	0.219	0.253	0.291	0.331	
	C	44913	29942	22456	17965	14971	12832	11228	9981	8983	8166	7485	6910	6416	5988	5614	
	D	0.004	0.009	0.017	0.026	0.037	0.051	0.066	0.084	0.104	0.125	0.149	0.175	0.203	0.233	0.265	

Theoretical values based on F (Allowable bending stress) = 20,000 psi, E (Modulus of elasticity) = 30,000 psi gross section of bearing bar.  
U - Safe Uniform Load - pounds per sq. ft.; D - Deflection in inches; C - Concentrated Load - pounds per ft. width at mid span

GHB and GHB-2 is welded. This grating is not normally used for standard floor layouts but is usually selected by engineers for rolling or vehicular loads for narrow space work.

This technical information provided is as a reference for evaluation by technically skilled persons only, with any use thereof to be at their independent discretion and risk. McNichols shall have no responsibility or liability for results obtained or damages resulting from improper evaluation or use of grating.



## BAR SPACING: GHB, GHB-2

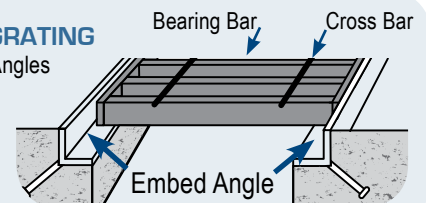
6.2b

SERIES	GHB (19W4)	GHB-2 (19W2)		
Bar Spacing				
End View (showing 1/4" thickness. 3/8" and 5/16" thickness also available)				
Bearing Bar Size (height x thickness)	Series No.	#/SF	Series No.	#/SF
1" x 1/4"	GHB 100	9.8	GHB 100-2	10.7
1-1/4" x 1/4"	GHB 125	12.0	GHB 125-2	12.9
1-1/2" x 1/4"	GHB 150	14.3	GHB 150-2	15.1
1-3/4" x 1/4"	GHB 175	16.5	GHB 175-2	17.4
2" x 1/4"	GHB 200	18.7	GHB 200-2	19.6
2-1/2" x 1/4"	GHB 250	23.2	GHB 250-2	24.0
3" x 1/4"	GHB 300	27.9		

## PANEL WIDTHS: GHB, GHB-2

6.2c

#Bars	Bearing Bar Thickness			#Bars	Bearing Bar Thickness		
	1/4"	5/16"	3/8"		1/4"	5/16"	3/8"
2	1-7/16"	1-1/2"	1-9/16"	17	19-1/4"	19-5/16"	19-3/8"
3	2-5/8"	2-11/16"	2-3/4"	18	20-7/16"	20-1/2"	20-9/16"
4	3-13/16"	3-7/8"	3-15/16"	19	21-5/8"	21-11/16"	21-3/4"
5	5"	5-1/16"	5-1/8"	20	22-13/16"	22-7/8"	22-15/16"
6	6-3/16"	6-1/4"	6-5/16"	21	24"	24-1/16"	24-1/8"
7	7-3/8"	7-7/16"	7-1/2"	22	25-3/16"	25-1/4"	25-5/16"
8	8-9/16"	8-5/8"	8-11/16"	23	26-3/8"	26-7/16"	26-1/2"
9	9-3/4"	9-13/16"	9-7/8"	24	27-9/16"	27-5/8"	27-11/16"
10	10-15/16"	11"	11-1/16"	25	28-3/4"	28-13/16"	28-7/8"
11	12-1/8"	12-3/16"	12-1/4"	26	29-15/16"	30"	30-1/16"
12	13-5/16"	13-3/8"	13-7/16"	27	31-1/8"	31-3/16"	31-1/4"
13	14-1/2"	14-9/16"	14-5/8"	28	32-5/16"	32-3/8"	32-7/16"
14	15-11/16"	15-3/4"	15-13/16"	29	33-1/2"	33-9/16"	33-5/8"
15	16-7/8"	16-15/16"	17"	30	34-11/16"	34-3/4"	34-13/16"
16	18-1/16"	18-1/8"	18-3/16"	31	35-7/8"	35-15/16"	36"

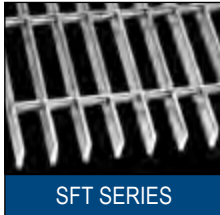
TRENCH GRATING  
with Embed Angles

## LOCKED BY SWAGING BAR GRATING

Locked by Swaging Grating is manufactured using an exclusive swaging (or pinching) and forming process that prevents the cross bars from turning or twisting. Panels are available in rectangular-bar, flush top, I-bar and T-bar styles in a variety of bar heights, offered in aluminum only.



GAL SERIES

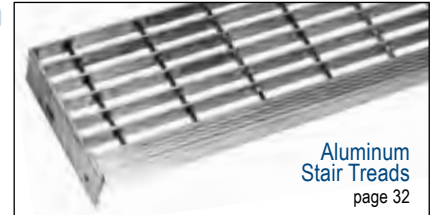


SFT SERIES

**GAL, SFT SERIES** WEB CODE: GBL1

GAL Series is an economical solution for applications requiring high strength and rigidity. GAL Series is lightweight and corrosion-resistant.

SFT Series has cross bars flush with the bearing bars along the top and is the product of choice where standing and walking comfort is a requirement.

Aluminum  
Stair Treads  
page 32**PRODUCT OPTIONS**

**Materials:** Aluminum  
**Surface:** Smooth or Serrated  
**Bar Heights:** 1" to 2"  
**Bar Thickness:** 1/8", 3/16" Rectangular or 1/4" I-Bar  
**Standard Sizes:** 2'x24', 2'x20', 3'x20' or 3'x24'

**ALUMINUM LOAD TABLE: GAL, SFT, SFT-2** 6.3a

Bearing Bar Size	SPAN (1-3/16" Center to Center Bar Spacing)										
	2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	7'	8'
1" x 1/8"	U .421	.269	.187	.137	.105	.83	Theoretical values based on F (Allowable bending stress) = 12,000 psi, E (Modulus of elasticity) = 10,000,000 psi gross section of bearing bar. U - Safe Uniform Load - # per sq. ft. D - Deflection in inches C - Concentrated Load - # per ft. width at mid span				
	D .144	.225	.324	.439	.574	.727					
	C 421	337	281	241	211	187					
	D .115	.180	.259	.353	.462	.583					
1" x 3/16"	U 632	404	281	206	158	125					
	D .144	.225	.324	.440	.576	.730					
	C 632	505	421	361	316	281					
	D .115	.180	.259	.353	.461	.584					
1-1/4" x 1/8"	U 658	421	292	215	164	130	105	87	73		
	D .115	.180	.259	.353	.459	.583	.718	.871	1.035		
	C 658	526	439	376	329	292	263	239	219		
	D .092	.144	.208	.282	.369	.466	.576	.696	.828		
1-1/4" x 3/16"	U 987	632	439	322	247	195	158	130	110	81	
	D .115	.180	.259	.353	.461	.583	.720	.868	1.040	1.419	
	C 987	789	658	564	493	439	395	359	329	282	
	D .092	.144	.207	.282	.368	.467	.576	.697	.830	1.129	
1-1/2" x 1/8"	U 947	606	421	309	237	187	152	125	105	77	59
	D .096	.150	.216	.294	.384	.486	.602	.724	.862	1.171	1.530
	C 947	758	632	541	474	421	379	345	316	271	237
	D .077	.120	.173	.235	.307	.389	.480	.582	.691	.942	1.229
1-1/2" x 3/16"	U 1421	909	626	464	355	281	227	188	158	116	89
	D .096	.150	.216	.294	.384	.487	.599	.726	.865	1.176	1.539
	C 1421	1137	947	812	711	632	568	517	474	406	355
	D .077	.120	.173	.235	.307	.389	.480	.581	.692	.941	1.228
1-3/4" x 3/16"	U 1934	1238	860	632	484	382	309	256	215	158	121
	D .082	.129	.185	.252	.329	.417	.514	.623	.741	1.009	1.318
	C 1934	1547	1289	1105	967	860	774	703	645	553	484
	D .066	.103	.148	.202	.263	.333	.412	.498	.593	.807	1.054
2" x 3/16"	U 2526	1617	1123	825	632	499	404	334	281	206	158
	D .072	.113	.162	.221	.288	.364	.450	.544	.649	.881	1.153
	C 2526	2021	1684	1444	1263	1123	1011	919	842	722	632
	D .058	.090	.130	.176	.230	.292	.360	.436	.518	.706	.922
2-1/4" x 3/16"	U 3197	2046	1421	1044	799	632	512	423	355	261	200
	D .064	.100	.144	.196	.256	.324	.400	.484	.576	.784	1.025
	C 3197	2558	2132	1827	1599	1421	1279	1163	1066	914	799
	D .051	.080	.115	.157	.205	.259	.320	.387	.461	.628	.819
2-1/2" x 3/16"	U 3947	2526	1754	1289	987	780	632	522	439	322	247
	D .058	.090	.130	.176	.230	.292	.360	.436	.519	.705	.923
	C 3947	3158	2632	2256	1974	1754	1579	1435	1316	1128	987
	D .046	.072	.104	.141	.184	.233	.288	.348	.415	.565	.737

Spans shaded in blue produce a deflection of 1/4" or less under a uniform load of 100 lbs. per square foot. This deflection is recommended as the maximum to provide pedestrian comfort. It can be exceeded at the discretion of the engineer.

This technical information provided is as a reference for evaluation by technically skilled persons only, with any use thereof to be at their independent discretion and risk. McNICHOLS shall have no responsibility or liability for results obtained or damages resulting from improper evaluation or use of grating.

Not recommended for wheel traffic or barefoot pedestrian.

**BAR SPACING: GAL, SFT** 6.3b

SERIES	GAL		GAL-2		SFT		SFT-2	
Bar Spacing								
End View (showing 3/16" thickness, 1/8" thickness also available)								
Bearing Bar Size (height x thickness)	Series No.	#/SF	Series No.	#/SF	Series No.	#/SF	Series No.	#/SF
1" x 1/8"	GAL-100A	1.8	GAL-100A-2	2.0	SFT-100A	1.9	SFT-100A-2	2.3
1" x 3/16"	GAL-100	2.6	GAL-100-2	2.8	SFT-100	2.7	SFT-100-2	3.1
1-1/4" x 1/8"	GAL-125A	2.1	GAL-125A-2	2.4	SFT-125A	2.3	SFT-125A-2	2.7
1-1/4" x 3/16"	GAL-125	3.2	GAL-125-2	3.5	SFT-125	3.3	SFT-125-2	3.7
1-1/2" x 1/8"	GAL-150A	2.5	GAL-150A-2	2.8	SFT-150A	2.8	SFT-150A-2	3.2
1-1/2" x 3/16"	GAL-150	3.8	GAL-150-2	3.9	SFT-150	4.4	SFT-150-2	4.4
1-3/4" x 3/16"	GAL-175	4.3	GAL-175-2	4.4	SFT-175	4.6	SFT-175-2	5.0
2" x 3/16"	GAL-200	4.9	GAL-200-2	5.0	SFT-200	5.0	SFT-200-2	5.7
2-1/4" x 3/16"	GAL-225	5.3	GAL-225-2	5.6	SFT-225	5.8	SFT-225-2	6.2
2-1/2" x 3/16"	GAL-250	5.8	GAL-250-2	6.1	SFT-250	6.5	SFT-250-2	6.9

**PANEL WIDTHS: GAL, SFT, SGAL** 6.3c

#Bars	Rectangular			#Bars	Rectangular			#Bars	Rectangular		
	GAL	SFT	SGAL		GAL	SFT	SGAL		GAL	SFT	SGAL
2	1-3/8"	1-1/8"	15	16-13/16"	13-5/16"	28	32-1/4"	25-1/2"	Deduct 1/16" from widths shown for bearing 1/8" bearing bars.		
3	2-9/16"	2-1/16"	16	18"	14-1/4"	29	33-7/16"	26-7/16"			
4	3-3/4"	3"	17	19-3/16"	15-3/16"	30	34-5/8"	27-3/8"			
5	4-15/16"	3-15/16"	18	20-3/8"	16-1/8"	31	35-13/16"	28-5/16"			
6	6-1/8"	4-7/8"	19	21-9/16"	17-1/16"	32		29-1/4"			
7	7-5/16"	5-13/16"	20	22-3/4"	18"	33		30-3/16"			
8	8-1/2"	6-3/4"	21	23-15/16"	18-15/16"	34		31-1/8"			
9	9-11/16"	7-11/16"	22	25-1/8"	19-7/8"	35		32-1/16"			
10	10-7/8"	8-5/8"	23	26-5/16"	20-13/16"	36		33"			
11	12-1/16"	9-9/16"	24	27-1/2"	21-3/4"	37		33-15/16"			
12	13-1/4"	10-1/2"	25	28-11/16"	22-11/16"	38		34-7/8"			
13	14-7/16"	11-7/16"	26	29-7/8"	23-5/8"	39		35-13/16"			
14	15-5/8"	12-3/8"	27	31-1/16"	24-9/16"	40					



## LOCKED BY SWAGING BAR GRATING (Continued)

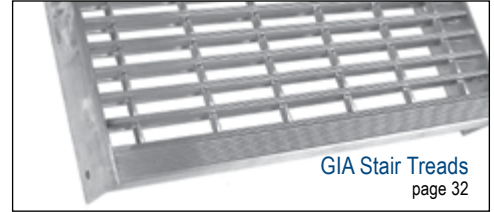


GIA SERIES

## GIA SERIES

WEB CODE: GBL4

I-Bar GIA Series Grating has "I"-shaped bearing bars that are locked in place by swaging the cross bars, making this grating series an economical solution for applications requiring high strength and rigidity and ideal for light pedestrian traffic. Made of aluminum, it is also lightweight and corrosion resistant.

GIA Stair Treads  
page 32

## PRODUCT OPTIONS

Materials: Aluminum  
Surface: Grooved  
Bar Heights: 1" to 2"  
Bar Thickness: 1/4"  
Standard Sizes: 2'x24', 3'x20', 3'x24'

## ALUMINUM LOAD TABLE: GIA, GIA-2

6.4a

Bearing Bar Size		SPAN (1-3/16" Center to Center Bar Spacing)									
		2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	8'
1" I-Bar	U	632	404	281	206	158	125	To determine load for SGIA, SGIA-2, multiply value at left by the load factor of 1.27. Deflection under the factored loads will be same as shown in the load table.			
	D	.144	.225	.324	.440	.576	.730				
	C	632	505	421	361	316	281				
	D	.115	.180	.259	.353	.461	.584				
1-1/4" I-Bar	U	987	632	439	322	247	195	158	130	110	81
	D	.115	.180	.259	.353	.461	.583	.720	.868	1.040	1.419
	C	987	789	658	564	493	439	395	359	329	282
	D	.092	.144	.207	.282	.368	.467	.576	.697	.830	1.129
1-1/2" I-Bar	U	1421	909	632	464	355	281	227	188	158	116
	D	.096	.150	.216	.294	.384	.487	.599	.726	.865	1.176
	C	1421	1137	947	812	711	632	568	517	474	406
	D	.077	.120	.173	.235	.307	.389	.480	.581	.692	.941
1-3/4" I-Bar	U	1934	1238	860	632	484	382	309	256	215	158
	D	.082	.129	.185	.252	.329	.417	.514	.623	.741	1.009
	C	1934	1547	1289	1105	967	860	774	703	645	553
	D	.066	.103	.148	.202	.263	.333	.412	.498	.593	.807
2" I-Bar	U	2526	1617	1123	825	632	499	404	334	281	206
	D	.072	.113	.162	.221	.288	.364	.450	.544	.649	.881
	C	2526	2021	1684	1444	1263	1123	1011	919	842	722
	D	.058	.090	.130	.176	.230	.292	.360	.436	.518	.706
2-1/4" I-Bar	U	3197	2046	1421	1044	799	632	512	423	355	261
	D	.064	.100	.144	.196	.256	.324	.400	.484	.576	.784
	C	3197	2558	2132	1827	1599	1421	1279	1163	1066	914
	D	.051	.080	.115	.157	.205	.259	.320	.387	.461	.628
2-1/2" I-Bar	U	3947	2526	1754	1289	987	780	632	522	439	322
	D	.058	.090	.130	.176	.230	.292	.360	.436	.519	.705
	C	3947	3158	2632	2256	1974	1754	1579	1435	1316	1128
	D	.046	.072	.104	.141	.184	.233	.288	.348	.415	.565

Theoretical values based on F (Allowable bending stress) = 12,000 psi, E (Modulus of elasticity) = 10,000,000 psi gross section of bearing bar. U - Safe Uniform Load - # per sq. ft., D - Deflection in inches, C - Concentrated Load - # per ft. width at mid span

Spans shaded in blue produce a deflection of 1/4" or less under a uniform load of 100 lbs. per square foot. This deflection is recommended as the maximum to provide pedestrian comfort. It can be exceeded at the discretion of the engineer.

This technical information provided is as a reference for evaluation by technically skilled persons only, with any use thereof to be at their independent discretion and risk. McNICHOLS shall have no responsibility or liability for results obtained or damages resulting from improper evaluation or use of grating.

Not recommended for wheel traffic or barefoot pedestrian.

## CLIPS &amp; FASTENERS

For a list of clips and fasteners and their purpose please see page 42.



GM

CB/CBF

GG/SSGG

SSGC

M

RT/RI

GN

GC

GFSS-1

## BAR SPACING: GIA, SGIA

6.4b

SERIES	GIA		GIA-2		SGIA		SGIA-2	
Bar Spacing								
End View (showing 1/4" bearing bars)								
Bearing Bar Size	Series No.	#/SF	Series No.	#/SF	Series No.	#/SF	Series No.	#/SF
1"x1/4"	GIA-100	2.0	GIA-100-2	2.1	SGIA-100	2.3	SGIA-100-2	2.5
1-1/4"x1/4"	GIA-125	2.3	GIA-125-2	2.5	SGIA-125	2.8	SGIA-125-2	2.9
1-1/2"x1/4"	GIA-150	2.6	GIA-150-2	2.8	SGIA-150	3.2	SGIA-150-2	3.4
1-3/4"x1/4"	GIA-175	3.0	GIA-175-2	3.3	SGIA-175	3.7	SGIA-175-2	3.9
2"x1/4"	GIA-200	3.4	GIA-200-2	3.7	SGIA-200	4.2	SGIA-200-2	4.4
2-1/4"x1/4"	GIA-225	3.8	GIA-225-2	4.0	SGIA-225	4.6	SGIA-225-2	4.9
2-1/2"x1/4"	GIA-250	4.0	GIA-250-2	4.2	SGIA-250	4.9	SGIA-250-2	5.1

## PANEL WIDTHS: GIA, SGIA

6.4c

#Bars	GIA	SGIA	#Bars	GIA	SGIA	#Bars	GIA	SGIA
2	1-7/16"	1-3/16"	15	16-7/8"	13-1/16"	28	32-5/16"	25"
3	2-5/8"	2-1/8"	16	18-1/16"	14"	29	33-1/2"	25-15/16"
4	3-13/16"	3"	17	19-1/4"	14-15/16"	30	34-11/16"	26-13/16"
5	5"	3-15/16"	18	20-7/16"	15-13/16"	31	35-7/8"	27-3/4"
6	6-3/16"	4-13/16"	19	21-5/8"	16-3/4"	32		28-11/16"
7	7-3/8"	5-3/4"	20	22-13/16"	17-5/8"	33		29-9/16"
8	8-9/16"	6-11/16"	21	24"	18-9/16"	34		30-1/2"
9	9-3/4"	7-9/16"	22	25-3/16"	19-1/2"	35		31-7/16"
10	10-15/16"	8-1/2"	23	26-3/8"	20-3/8"	36		32-5/16"
11	12-1/8"	9-7/16"	24	27-9/16"	21-5/16"	37		33-1/4"
12	13-5/16"	10-5/16"	25	28-3/4"	22-1/4"	38		34-3/16"
13	14-1/2"	11-1/4"	26	29-15/16"	23-3/16"	39		35-1/16"
14	15-11/16"	12-3/16"	27	31-1/8"	24-1/16"	40		36"

Deduct 1/16" from widths shown for bearing 1/8" bearing bars.



GIA Stair Treads and Grating

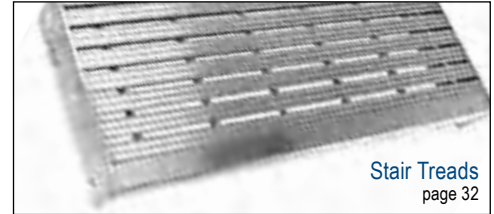
## LOCKED BY SWAGING BAR GRATING (Continued)



SAFE-T-GRID®

**SAFE-T-GRID®** WEB CODE: GPG1

**SAFE-T-GRID®** Grating is configured with extruded T-shaped bearing bars and extruded cross bars that are locked together by swaging for a high strength and rigid construction. The large T-bar surface makes it ideal for pedestrian traffic.

Stair Treads  
page 32**PRODUCT OPTIONS**

<b>Materials:</b>	Aluminum	<b>Widths:</b>	36-1/4" (TB626), 36-9/16" (TB940)
<b>Surface:</b>	Groove (Grip Tight surface available)	<b>Lengths:</b>	24'
<b>Heights:</b>	1", 1-1/4", 1-1/2"		

**ALUMINUM LOAD TABLE: SAFE-T-GRID®**

HEIGHT	TYPE		2'	2' 6"	3'	3' 6"	4'	4' 6"	5'	5' 6"	6'	6' 6"	7'	7' 6"	8'
1"	TB626	U	.990	.634	.440	.323	.248	.196	.158	.131	.110	.94	.81	.70	.62
		D	.136	.212	.305	.415	.544	.688	.846	1.027	1.221	1.437	1.666	1.897	2.175
		C	.990	.792	.660	.566	.495	.440	.396	.360	.330	.305	.283	.264	.248
		D	.109	.170	.244	.333	.434	.549	.678	.821	.977	1.148	1.330	1.526	1.961
1" TB940 6710316324		U	1.051	.673	.467	.343	.263	.208	.168	.139	.117	.100	.86	.75	.66
		D	.125	.195	.281	.382	.500	.633	.779	.944	1.125	1.325	1.532	1.761	2.006
		C	1.051	.841	.701	.601	.526	.467	.420	.382	.350	.323	.300	.280	.263
		D	.100	.156	.225	.306	.400	.505	.623	.755	.898	1.053	1.222	1.403	1.599
1-1/4"	TB626	U	1.516	.970	.674	.495	.379	.299	.243	.200	.168	.144	.124	.108	.95
		D	.108	.169	.243	.331	.432	.546	.676	.815	.969	1.145	1.326	1.522	1.733
		C	1.516	1.213	1.011	.866	.758	.674	.606	.551	.505	.466	.433	.404	.379
		D	.086	.135	.194	.265	.346	.438	.540	.653	.777	.912	1.058	1.214	1.382
1-1/4" TB940 6704209034		U	1.738	1.112	.772	.568	.435	.343	.278	.230	.193	.165	.142	.124	.109
		D	.097	.151	.218	.297	.387	.489	.605	.732	.870	1.025	1.186	1.365	1.553
		C	1.738	1.391	1.159	.993	.869	.773	.695	.632	.579	.535	.497	.464	.435
		D	.077	.121	.174	.237	.310	.392	.484	.585	.696	.817	.949	1.090	1.240
1-1/2"	TB626	U	2.021	1.293	.898	.660	.505	.399	.323	.267	.225	.191	.165	.144	.126
		D	.091	.142	.205	.279	.364	.461	.569	.689	.822	.961	1.117	1.284	1.455
		C	2.021	1.617	1.347	1.155	1.011	.898	.808	.735	.674	.622	.577	.539	.505
		D	.073	.114	.164	.223	.292	.369	.455	.551	.657	.770	.892	1.025	1.166
1-1/4" TB940 6715316324		U	2.344	1.500	1.042	.766	.586	.463	.375	.310	.260	.222	.191	.167	.147
		D	.082	.128	.184	.251	.327	.414	.512	.619	.736	.865	1.001	1.153	1.314
		C	2.344	1.876	1.563	1.340	1.172	1.042	.938	.853	.781	.721	.670	.625	.586
		D	.065	.102	.147	.200	.262	.332	.410	.496	.589	.692	.803	.921	1.048
2"	TB626	U	3.173	2.031	1.410	1.036	.793	.627	.508	.420	.353	.300	.259	.226	.198
		D	.069	.108	.156	.212	.277	.351	.434	.525	.625	.731	.849	.977	1.108
		C	3.173	2.538	2.115	1.813	1.587	1.410	1.269	1.154	1.058	.976	.907	.846	.793
		D	.055	.087	.125	.170	.222	.281	.347	.420	.499	.586	.680	.780	.887
2"	TB940	U	3.719	2.380	1.653	1.214	.930	.735	.595	.492	.413	.352	.304	.264	.232
		D	.063	.098	.141	.192	.251	.318	.392	.475	.565	.663	.770	.881	1.003
		C	3.719	2.975	2.479	2.125	1.859	1.653	1.488	1.352	1.240	1.144	1.063	.992	.930
		D	.050	.078	.113	.154	.201	.254	.314	.380	.452	.530	.616	.707	.804

Spans shaded in blue produce a deflection of 1/4" or less under a uniform load of 100 lbs. per square foot. This deflection is recommended as the maximum to provide pedestrian comfort. It can be exceeded at the discretion of the engineer.

Theoretical values based on F (Allowable bending stress) = 12,000 psi, E (Modulus of elasticity) = 10,000,000 psi gross section of bearing bar. U - Safe Uniform Load - pounds per sq. ft.; D - Deflection in Inches; C - Safe Concentrated Load - pounds per ft. width at mid span

Not recommended for wheel traffic or barefoot pedestrian.

**McNICHOLS® FABRICATION SERVICES**

Our nationwide service centers are equipped with AWS (American Welding Standard) Certified Tread Fabricators and a variety of specialized processing equipment, so that your job can be cut-to-size quickly and accurately!

See page 56 for a list of our Fabrication Services.



SAFE-T-GRID® Grating used in this entryway



Unique stairway has SAFE-T-GRID® stairs and perforated risers

## PRESS-LOCKED/CLOSE MESH BAR GRATING

Press-Locked Grating cross bars and bearing bars are notched and pressed together through a high pressure manufacturing process. The result is a bidirectional flush surface that assures a firm, rigid connection and makes it aesthetically appealing for architectural applications.



GAA SERIES



GCM SERIES

## GAA &amp; GCM SERIES

WEB CODE: GBL1

Press-Locked GAA Series grating is formed by pressing the cross bars into the bearing bars flush top under tremendous pressure, laterally displacing 1/16" of cross bar material into the dovetail slot.

GCM Series is formed by pressing the cross bars and bearing bars together through a high pressure process. The GCM Series has bearing bars that are 7/16" apart offering ADA compliance.

## PRODUCT OPTIONS

**Materials:** Aluminum, Plain Steel, Stainless Steel, (GAA also available in Galvanized Steel)  
**Surface:** Smooth or Serrated  
**Bar Heights:** 3/4" to 2-1/2"  
**Bar Thickness:** 3/16"  
**Standard Sizes:** 3'x12', 3'x20' (GAA is also available at 3'x24')

## STEEL LOAD TABLE: GAA

6.6a

Bearing Bar Size		SPAN (1-3/16" Center to Center Bar Spacing)											
		2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	7'	8'	
3/4" x 1/8"	U	355	227	158	116	89	70	<b>Unit Stress 18,000 psi</b> U - Uniform Load - # per sq. ft. D - Deflection in inches C - Concentrated Load - # per ft. width at mid span  To determine load for GCM, multiply value at left by the load factor of 2.70. GCM-2 use 2.35, GCM-4 use 1.72. Deflection under the factored loads will be same as shown in the load table.					
	D	.099	.155	.223	.304	.397	.503						
	C	355	284	237	174	178	158						
	D	.079	.124	.179	.243	.319	.402						
3/4" x 3/16"	U	533	341	237	174	133	105						
	D	.099	.155	.223	.304	.397	.502						
	C	533	426	355	305	266	237						
	D	.079	.124	.179	.244	.318	.403						
1" x 1/8"	U	632	404	281	206	158	125	101	84	70			
	D	.075	.116	.168	.228	.298	.378	.466	.563	.670			
	C	632	505	421	361	316	281	253	230	211			
	D	.060	.093	.134	.183	.239	.302	.372	.451	.536			
1" x 3/16"	U	947	606	421	309	237	187	152	125	105			
	D	.074	.116	.168	.228	.298	.377	.467	.563	.670			
	C	947	758	632	541	474	421	379	344	316			
	D	.060	.093	.134	.182	.239	.302	.372	.451	.536			
1-1/4" x 1/8"	U	987	632	439	322	247	195	158	130	110	81		
	D	.060	.093	.134	.182	.239	.302	.372	.451	.538	.730		
	C	987	789	658	564	493	439	395	359	329	282		
	D	.048	.074	.107	.146	.191	.241	.298	.360	.429	.584		
1-1/4" x 3/16"	U	1480	947	658	483	370	292	237	196	164	121		
	D	.060	.093	.134	.182	.238	.302	.373	.451	.536	.731		
	C	1480	1184	987	846	740	658	592	538	493	423		
	D	.048	.074	.107	.146	.191	.241	.298	.360	.429	.584		
1-1/2" x 1/8"	U	1421	909	632	464	355	281	227	188	158	116	89	
	D	.050	.078	.112	.152	.199	.252	.310	.376	.447	.608	.794	
	C	1421	1137	947	812	711	632	568	517	474	406	355	
	D	.040	.062	.089	.122	.159	.201	.248	.300	.358	.487	.636	
1-1/2" x 3/16"	U	2132	1364	947	696	533	421	341	282	237	174	133	
	D	.050	.078	.112	.152	.199	.251	.310	.376	.447	.608	.794	
	C	2132	1705	1421	1218	1066	947	853	775	711	609	533	
	D	.040	.062	.089	.122	.159	.201	.248	.300	.358	.487	.636	
1-3/4" x 3/16"	U	2901	1857	1289	947	725	573	464	384	322	237	181	
	D	.043	.067	.096	.130	.170	.215	.266	.322	.383	.521	.681	
	C	2901	2321	1934	1658	1451	1289	1161	1055	967	829	725	
	D	.034	.053	.077	.104	.136	.172	.213	.257	.306	.417	.545	
2" x 3/16"	U	3789	2425	1684	1237	947	749	606	501	421	309	237	
	D	.037	.058	.084	.114	.149	.189	.233	.282	.335	.456	.596	
	C	3789	3032	2526	2165	1895	1684	1516	1378	1263	1083	947	
	D	.030	.047	.067	.091	.119	.151	.186	.225	.268	.365	.477	
2-1/4" x 3/16"	U	4796	3069	2132	1566	1199	947	767	634	533	392	300	
	D	.033	.052	.074	.101	.132	.168	.207	.250	.298	.406	.530	
	C	4796	3837	3197	2741	2398	2132	1918	1744	1599	1370	1199	
	D	.026	.041	.060	.081	.106	.134	.166	.200	.238	.324	.424	
2-1/2" x 3/16"	U	5921	3789	2632	1933	1480	1170	947	783	658	483	370	
	D	.030	.047	.067	.091	.119	.151	.186	.225	.268	.365	.477	
	C	5921	4737	3947	3383	2961	2632	2368	2153	1974	1692	1480	
	D	.024	.037	.054	.073	.095	.121	.149	.180	.215	.292	.381	

Spans shaded in blue produce a deflection of 1/4" or less under a uniform load of 100 lbs. per square foot. This deflection is recommended as the maximum to provide pedestrian comfort. It can be exceeded at the discretion of the engineer.

This technical information provided is as a reference for evaluation by technically skilled persons only, with any use thereof to be at their independent discretion and risk. McNichols shall have no responsibility or liability for results obtained or damages resulting from improper evaluation or use of grating.

Not recommended for wheel traffic or barefoot pedestrian.

## BAR SPACING: GAA, GCM

6.6b

SERIES	GAA (19P4)	GCM (7P4)	GCM-2 (8P4)	GCM-4 (11P4)				
Bar Spacing								
End View (showing 3/16" thickness. 1/8" thickness also available)								
Bearing Bar Size (height x thickness)	Series No.	#/SF	Series No.	#/SF	Series No.	#/SF	Series No.	#/SF
3/4" x 1/8"	GAA-75A	4.4	--	--	GCM-2-75A	8.6	--	--
3/4" x 3/16"	GAA-75	5.7	GCM-1-75	13.7	GCM-2-75	12.3	GCM-4-75	9.0
1" x 1/8"	GAA-100A	5.2	--	--	GCM-2-100A	11.5	--	--
1" x 3/16"	GAA-100	7.5	GCM-1-100	18.1	GCM-2-100	16.5	GCM-4-100	11.9
1-1/4" x 1/8"	GAA-125A	6.3	--	--	GCM-2-125A	14.2	--	--
1-1/4" x 3/16"	GAA-125	9.1	GCM-1-125	22.6	GCM-2-125	20.7	GCM-4-125	14.8
1-1/2" x 1/8"	GAA-150A	7.6	--	--	GCM-2-150A	17.2	--	--
1-1/2" x 3/16"	GAA-150	11.0	GCM-1-150	27.2	GCM-2-150	25.0	GCM-4-150	17.8
1-3/4" x 3/16"	GAA-175	12.7	GCM-1-175	31.6	GCM-2-175	29.4	GCM-4-175	20.8
2" x 3/16"	GAA-200	14.3	GCM-1-200	36.2	GCM-2-200	33.2	GCM-4-200	23.8
2-1/4" x 3/16"	GAA-225	16.0	GCM-1-225	40.1	GCM-2-225	37.3	GCM-4-225	26.5
2-1/2" x 3/16"	GAA-250	17.7	--	--	GCM-2-250	41.4	GCM-4-250	29.3

## PANEL WIDTHS: GAA, GCM

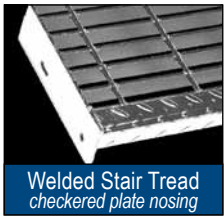
6.6c

#Bars	GAA	GCM	GCM-2	GCM-4	#Bars	GAA	GCM	GCM-2	GCM-4	
2	1-3/8"	GCM also available in widths up to 83 bars, GCM-2 available in widths up to 72 bars, GCM-4 available in widths up to 52 bars.  Wider areas will be made in two or more panels. Panels are available up to 48" by special order. All other widths are cut-to-size. Deduct 1/16" from width for 1/8" bearing bars.  <b>NOTE:</b> Width and length tolerance $\pm 1/4"$				18	20-3/8"	7-5/8"	8-11/16"	11-5/8"
3	2-9/16"					19	21-9/16"	8-1/16"	9-3/16"	12-9/16"
4	3-3/4"					20	22-3/4"	8-1/2"	9-11/16"	13-1/4"
5	4-15/16"					21	23-15/16"	8-5/16"	10-3/16"	13-15/16"
6	6-1/8"					22	25-1/8"	9-3/8"	10-11/16"	14-5/8"
7	7-5/16"	23	26-5/16"	9-13/16"	11-3/16"	15-5/16"				
8	8-1/2"	24	27-1/2"	10-1/4"	11-11/16"	16"				
9	9-11/16"	25	28-11/16"	10-11/16"	12-3/16"	16-11/16"				
10	10-7/8"	4-1/8"	4-11/16"	6-3/8"	26	29-7/8"	11-1/8"	12-11/16"	17-3/8"	
11	12-1/16"	4-9/16"	5-3/16"	7-1/16"	27	31-1/16"	11-9/16"	13-3/16"	18-1/16"	
12	13-1/4"	5"	5-11/16"	7-3/4"	28	32-1/4"	12"	13-11/16"	18-3/4"	
13	14-7/16"	5-7/16"	6-3/16"	8-7/16"	29	33-7/16"	12-7/16"	14-3/16"	19-7/16"	
14	15-5/8"	5-7/8"	6-11/16"	9-1/8"	30	34-5/8"	12-7/8"	14-11/16"	20-1/8"	
15	16-13/16"	6-5/16"	7-3/16"	9-13/16"	31	35-13/16"	13-5/16"	15-3/16"	20-13/16"	
16	18"	6-3/4"	7-11/16"	10-1/2"	32	--	13-3/4"	15-11/16"	21-1/2"	
17	19-3/16"	7-3/16"	8-3/16"	11-3/16"						



## BAR GRATING STAIR TREADS

McNICHOLS® Bar Grating Stair Treads are a top choice for strength, safety, and long-term cost savings. Below are some of the most popular selections.



Welded Stair Tread  
checkered plate nosing

## GW SERIES

GW Series Grating will handle most moderate loads and light wheel traffic with its standard bearing bar centers of 1-3/16".

For more details on GW Series Grating please see page 26.

## PRODUCT OPTIONS

<b>Materials:</b>	Plain, Galvanized and Stainless Steel, (Plain Steel available with standard black painted coat)
<b>Surface:</b>	Smooth or Serrated
<b>Bar Heights:</b>	3/4", 1", 1-1/2", 1-3/4", 2", 2-1/2"
<b>Bar Thickness:</b>	1/8", 3/16"
<b>Depths:</b>	8-9/16", 9-3/4", 10-15/16", 12-1/8"
<b>Widths:</b>	30", 36", 48" (other sizes available)



Welded Stair Tread  
cast abrasive nosing

## GHB SERIES

GHB Series can handle heavier load requirements with a bearing bar thickness of 1/4" and bar heights from 1" to 3".

For more details on GHB Series Grating please see page 27.

## PRODUCT OPTIONS

<b>Materials:</b>	Plain and Galvanized Steel, (Plain Steel available with standard black painted coat)
<b>Surface:</b>	Smooth or Serrated
<b>Bar Heights:</b>	3/4", 1", 1-1/2", 1-3/4", 2", 2-1/2"
<b>Bar Thickness:</b>	1/4"
<b>Depths:</b>	8-9/16", 9-3/4", 10-15/16", 12-1/8"
<b>Widths:</b>	30", 36", 48" (other sizes available)



Swaged Stair Tread  
corrugated angled nosing

## GAL SERIES

GAL Series is an economical solution for applications requiring high strength and rigidity. GAL Series is lightweight and corrosion-resistant.

For more details on GAL Series Grating please see page 28.

## PRODUCT OPTIONS

<b>Materials:</b>	Aluminum
<b>Surface:</b>	Smooth or Serrated
<b>Bar Heights:</b>	3/4", 1", 1-1/2", 1-3/4", 2", 2-1/2"
<b>Bar Thickness:</b>	1/8", 3/16"
<b>Depths:</b>	8-9/16", 9-3/4", 10-15/16", 12-1/8"
<b>Widths:</b>	See max tread width in chart 6.Ta below



I-Bar Stair Tread  
corrugated angled nosing

## GIA SERIES

I-Bar GIA Series Grating is an economical solution for applications requiring high strength and rigidity and is ideal for light pedestrian traffic. Its properties are lightweight and corrosion resistant.

For more details on GIA Series Grating please see page 29.

## PRODUCT OPTIONS

<b>Materials:</b>	Aluminum
<b>Surface:</b>	Grooved
<b>Bar Heights:</b>	1", 1-1/4", 1-1/2", 1-3/4", 2"
<b>Bar Thickness:</b>	1/4"
<b>Depths:</b>	8-9/16", 9-3/4", 10-15/16", 12-1/8"
<b>Widths:</b>	See max tread width in chart 6.Ta below



SAFE-T-GRID®  
Stair Tread

## SAFE-T-GRID®

SAFE-T-GRID® Stair Treads provide a measure of safety and a comfortable, affordable and corrosion resistant walking surface ideal for water and waste water treatment plants, pedestrian bridges, walkways and similar uses.

For more details on SAFE-T-GRID® Grating please see page 30.

## PRODUCT OPTIONS

<b>Materials:</b>	Aluminum
<b>Surface:</b>	Grooved (Grip Tight surface available)
<b>Bar Heights:</b>	1", 1-1/4", 1-1/2"
<b>Bar Thickness:</b>	See page 30, table 6.5b
<b>Depths:</b>	8-1/8", 10", 10-1/2", 11-11/16", 12-7/8"
<b>Widths:</b>	Cut-to-length

## RECOMMENDED BEARING BAR SIZES

6.Ta

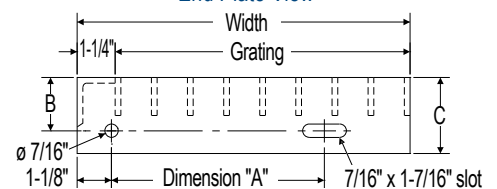
	RECTANGULAR BAR 1-3/16" CTC BB		I-BAR 1-3/16" CTC BB	
	Bearing Bar Size	Maximum Tread Width*	Bearing Bar Size	Max. Tread Width*
ALUMINUM	1" x 3/16"	2'-4"	1" x 1/4"	2'-4"
	1-1/4" x 3/16"	2'-10"	1-1/4" x 1/4"	2'-10"
	1-1/2" x 3/16"	3'-6"	1-1/2" x 1/4"	3'-6"
	1-3/4" x 3/16"	4'-3"	1-3/4" x 1/4"	4'-3"
STEEL	3/4" x 3/16"	2'-4"		
	1" x 3/16"	3'-5"		
	1-1/4" x 3/16"	4'-8"		
	1-1/2" x 3/16"	5'-6"		

\*Maximum tread width based on 300 lb. concentrated load on front 5 inch of tread at center of tread length.

## ENDPLATE DIMENSIONS

GW/GAA/GAL		GIA	
1-3/16" CTC BB		1-3/16" CTC BB	
Width	A	Width	A
5"	2-1/2"	5-1/16"	2-1/2"
6-3/16"	2-1/2"	6-1/4"	2-1/2"
7-3/8"	4-1/2"	7-7/16"	4-1/2"
8-9/16"	4-1/2"	8-5/8"	4-1/2"
9-3/4"	7"	9-13/16"	7"
10-15/16"	7"	11"	7"
12-1/8"	7"	12-3/16"	7"

## End Plate View



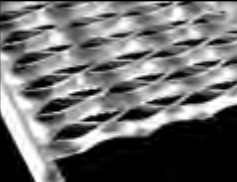
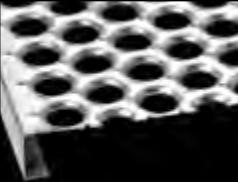



Aluminum:	Use 3" End Plate;	B = 2-1/4"	C = 3"
Steel:	Use 2-1/2" or 3" End Plate		
	For BB up to 1-1/4"	B = 1-3/4"	C = 2-1/2"
	For BB 1-1/2" or more	B = 2-1/4"	C = 3"

# PLANK GRATING


**McNICHOLS®** Quality Plank Grating includes a variety of channel configuration choices and walkway styles.

Plank Grating is a one-piece construction product that is lightweight and offers significantly high slip resistance surfaces. In addition to low material cost and nominal installation cost, Plank Grating also provides long-term value with rust-resisting materials and finishes.

## PRODUCT OPTIONS

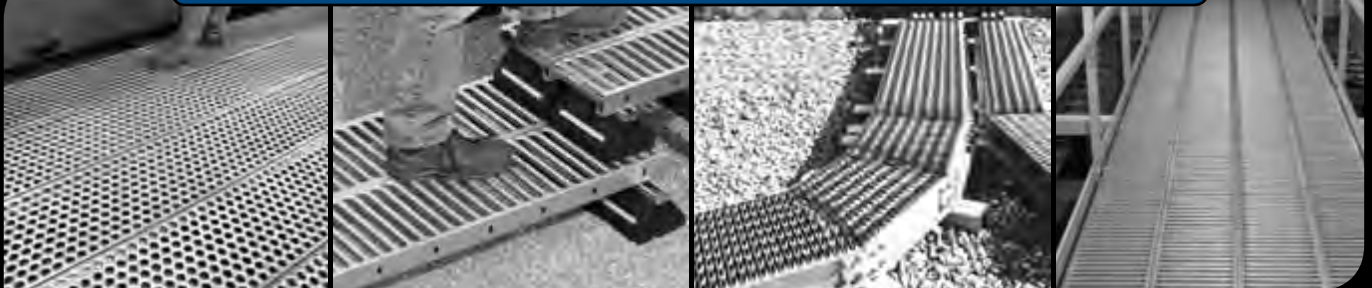
	GRIP STRUT®	PERF-O GRIP®	GRATE-LOCK®	DIAMONDBACK®	HEAVY-DUTY PLANK
Pattern Types					
	pg. 34 / webcode: GPS1	pg. 37 / webcode: GPP3	pg. 39 / webcode: GPL1	pg. 40 / webcode: GPB1	pg. 40 / webcode: GPR1

## PRODUCT SPECIFICATIONS

Styles	GRIP STRUT® Plank & Walkway, Heavy-Duty Plank & Walkway	PERF-O GRIP® Plank & Walkway, TRACTION TREAD™ Planks	GRATE-LOCK® Plank with Grip or Smooth Surface	DIAMONDBACK® Solid or Vented	Aluminum Plank HD Series Grooved Surface
Materials	Plain, Galvanized and Stainless Steel, Aluminum	Plain and Galvanized Steel, Aluminum	Galvanized Steel	Aluminum 6061-T6	Aluminum
Heights/Depths	Plank: 1-1/2", 2", 2-1/2", 3" HD Plank: 2" Walkway: 4-1/2" HD Walkway: 5"	Plank: 1-1/2", 2" Walkway: 5"	1-1/2", 2-1/2", 3", 4"	1", 1-1/2", 2"	3/4", 1", 1-1/2"
Widths	Plank: 4-3/4", 7", 9-1/2", 11", 18-3/4", 24" Walkway: 24" HD Plank: 9-1/4" HD Walkway: 30"	Plank: 5", 7", 10", 12", 18" Walkway: 24, 30", 36"	9", 12"	6", 12"	6"
Lengths	10' or 12' stock (longer by special order)	10', 12' (longer by special order)	12', 20', 24' (2-1/2" Ht.), 12' (1-1/2" Ht.), 24' (3", 4" Ht.)	12'	20', 26'
QR Code (Scan using a QR Reader on your smart phone)					

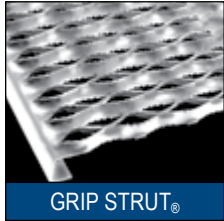
Not all product combinations are available. See [mcnichols.com](http://mcnichols.com) for availability.

## PLANK GRATING APPLICATIONS



## GRIP STRUT® PLANK &amp; WALKWAY

GRIP STRUT® has a non-slip diamond surface that is ideal for safety applications where mud, ice, snow, oil and detergents can create hazardous walking conditions. In addition to low material cost and nominal installation cost, GRIP STRUT® provides long-term value with rust-resisting materials and choices.



## GRIP STRUT® PLANK

WEB CODE: GPS1

The surface of the planks have diamond-shaped openings with serrated edges, making them slip resistant in every direction under practically all conditions. GRIP STRUT® is also available in stair treads and ladder rungs. See page 42 for more details on our ladder rungs.

GRIP STRUT®

## PRODUCT OPTIONS

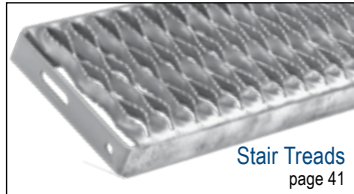
Materials: Plain Steel, Galvanized Steel, Stainless Steel, Aluminum

Gauges: 12, 14, 16 (Stainless), .080, .100 (Alum.)

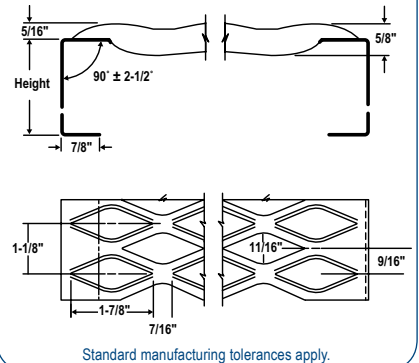
Heights: 1-1/2", 2", 2-1/2", 3"

Widths: 4-3/4", 7", 9-1/2", 11", 18-3/4", 24"

Lengths: 10' or 12' stock, cut-to-size

ACA-15, 2"  
ACA-25, 3"Diamond  
AnchorStair Treads  
page 41

## End &amp; Top Views



Standard manufacturing tolerances apply.

## LOAD TABLE: 2-DIAMOND PLANK (4-3/4" Width) 2.2

Item Number	Ht. (mm)	#/LF (kg/m)	Clear Span																	
			2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	6'6"	7'	7'6"	8'	9'	10'	11'	12'	
GALVANIZED STEEL 14 GAUGE																				
24021514	1-1/2" (38.1)	2.3" (3.42)	U	1324	849	591	435	334	265	215	179	151	10' and 12' lengths available for most sizes. Galvanized available in 14 gauge and 12 gauge. Visit <a href="http://mcnichols.com">mcnichols.com</a> for more information.							
			D	.06	.10	.14	.20	.26	.32	.40	.49	.58								
			C	524	420	351	301	265	236	213	195	179								
			D	.05	.08	.11	.16	.20	.26	.32	.39	.47								
24022014	2" (50.8)	2.6" (3.87)	U	2198	1409	980	721	553	438	356	295	248	212	184	161	142	113	93		
			D	.06	.09	.13	.17	.23	.29	.35	.43	.51	.60	.70	.81	.92	1.18	1.47		
			C	870	697	582	499	438	390	352	321	295	273	255	239	225	201	183		
			D	.04	.07	.10	.14	.18	.23	.28	.34	.41	.48	.56	.65	.74	.94	1.18		
GALVANIZED STEEL 12 GAUGE																				
24021512	1-1/2" (38.1)	3.2" (4.76)	U	1751	1123	782	576	443	351	286	237	200	172	149	131	116	U - Uniform Load (lbs/SF) C - Concentrated Load (lb) D - Deflection (inches)			
			D	.07	.11	.15	.21	.27	.35	.43	.52	.62	.74	.86	.99	1.14				
			C	693	556	464	399	350	313	283	258	238	221	206	194	183				
			D	.05	.08	.12	.17	.22	.28	.34	.42	.50	.59	.69	.79	.91				
24021512	2" (50.8)	3.6" (5.36)	U	2792	1790	1245	917	703	557	453	375	317	271	235	205	181	145	119	99	85
			D	.05	.08	.11	.16	.20	.26	.32	.39	.46	.55	.64	.73	.84	1.07	1.34	1.64	1.98
			C	1105	886	739	635	557	496	448	409	376	348	325	305	287	258	235	216	201
			D	.04	.06	.09	.12	.16	.21	.26	.31	.37	.44	.51	.59	.67	.86	1.07	1.31	1.58
ALUMINUM ALLOY 5052 12 GAUGE .080"																				
270220-A10	2" (50.8)	.92" (1.37)	U	1463	937	650	478	366	289	234	194	162	138	119	Spans in blue shaded area produce deflection of 1/4" or less under uniform load of 100 lbs/SF.					
			D	.08	.13	.18	.25	.33	.42	.52	.63	.74	.87	1.02						
			C	579	463	386	331	290	257	232	211	192	177	165						
			D	.06	.10	.15	.20	.27	.34	.42	.51	.59	.69	.80						

## LOAD TABLE: 3-DIAMOND PLANK (7" Width) 2.3

Item Number	Ht. (mm)	#/LF (kg/m)	Clear Span																	
			2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	6'6"	7'	7'6"	8'	9'	10'	11'	12'	
GALVANIZED STEEL 14 GAUGE																				
24031514	1-1/2" (38.1)	3.0" (4.6)	U	899	577	402	269	227	180	147	122	103	10' and 12' lengths available for most sizes. Galvanized available in 14 gauge and 12 gauge. Visit <a href="http://mcnichols.com">mcnichols.com</a> for more information.							
			D	.06	.10	.14	.20	.26	.33	.40	.49	.59								
			C	524	421	351	302	265	237	214	196	180								
			D	.05	.08	.11	.16	.21	.26	.32	.39	.47								
24032014	2" (50.8)	3.2" (4.76)	U	1492	957	665	490	376	298	242	201	169	145	125	110	97	77	63		
			D	.06	.09	.13	.17	.23	.29	.35	.43	.51	.61	.71	.81	.93	1.19	1.49		
			C	871	697	582	500	439	391	353	322	296	275	256	240	226	203	185		
			D	.04	.07	.10	.14	.18	.23	.28	.34	.41	.48	.56	.65	.74	.95	1.19		
GALVANIZED STEEL 12 GAUGE																				
24031512	1-1/2" (38.1)	4.1" (6.10)	U	1189	763	532	392	301	239	195	162	137	118	102	90	79	U - Uniform Load (#/SF) C - Concentrated Load (lb) D - Deflection (inches)			
			D	.07	.11	.15	.21	.27	.35	.43	.52	.63	.74	.87	1.00	1.15				
			C	694	556	465	400	352	314	284	260	240	223	208	196	185				
			D	.05	.08	.12	.17	.22	.28	.34	.42	.50	.59	.69	.80	.92				
ALUMINUM ALLOY 5052 12 GAUGE .080"																				
270320-A10	2" (50.8)	1.15" (1.71)	U	993	636	441	324	248	196	159	131	110	93	80	Spans in blue shaded area produce deflection of 1/4" or less under uniform load of 100 lbs/SF.					
			D	.08	.13	.18	.25	.33	.42	.52	.63	.74	.86	1.00						
			C	579	463	386	331	290	257	232	211	192	177	165						
			D	.06	.10	.15	.20	.27	.34	.42	.51	.59	.69	.80						

## LOAD TABLE: 4-DIAMOND PLANK (9-1/2" Width) 2.4

Item Number	Ht. (mm)	#/LF (kg/m)	Clear Span																					
			2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	6'6"	7'	7'6"	8'	9'	10'	11'	12'					
GALVANIZED STEEL 14 GAUGE																								
24041514	1-1/2" (38.1)	3.6" (5.36)	U	663	426	296	219	168	134	109	90	77	10' and 12' lengths available for most sizes. Galvanized available in 14 gauge and 12 gauge.  Visit <a href="http://mcnichols.com">mcnichols.com</a> for more information.											
			D	.06	.10	.14	.20	.26	.33	.41	.50	.59												
			C	525	421	352	303	266	238	215	197	182												
			D	.05	.08	.11	.16	.21	.26	.33	.40	.47												
GALVANIZED STEEL 12 GAUGE																								
24041512	1-1/2" (38.1)	5.0" (7.44)	U	906	581	405	298	229	182	148	123	104	89	77	67	60	U - Uniform Load (lbs/SF) C - Concentrated Load D - Deflection (inches)							
			D	.07	.11	.16	.21	.28	.36	.44	.54	.64	.76	.89	1.02	1.17								
			C	718	575	481	413	363	324	292	267	246	228	213	200	189								
			D	.06	.09	.13	.17	.23	.29	.35	.43	.52	.61	.71	.82	.94								
24042012	2" (50.8)	5.4" (8.04)	U	1398	896	624	460	353	280	228	189	160	137	119	104	92	74	61	51	43				
			D	.05	.08	.11	.16	.20	.26	.32	.39	.47	.55	.65	.75	.85	1.10	1.38	1.69	2.03				
			C	1107	887	741	637	559	499	451	412	380	353	329	309	292	264	241	222	206				
			D	.04	.06	.09	.12	.16	.21	.26	.31	.37	.44	.52	.60	.68	.88	1.10	1.35	1.63				
STAINLESS STEEL 16 GAUGE																								
28042016	2" (50.8)	3.2" (4.76)	U	720	462	322	238	183	145	118	98	83	71	59	Spans in blue shaded area produce deflection of 1/4" or less under uniform load of 100 lbs/SF.									
			D	.05	.08	.11	.16	.20	.26	.32	.39	.47	.55	.61										
			C	570	457	382	329	289	258	234	214	197	184	165										
			D	.04	.06	.09	.12	.16	.21	.26	.31	.38	.44	.49										
STAINLESS STEEL 5052 12 GAUGE .080																								
270415	1-1/2" (38.1)	1.28" (1.90)	U	499	319	222	163	124	98	This technical information provided is a reference for evaluation by technically skilled persons only, with any use thereof to be at their independent discretion and risk.  <b>McNICHOLS</b> shall have no responsibility or liability for results obtained or damages resulting from improper evaluation or use of grating.														
			D	.10	.15	.22	.31	.40	.51															
			C	395	316	263	226	197	175															
			D	.08	.12	.18	.25	.32	.41															
270420	2" (50.8)	1.37" (2.03)	U	732	468	325	239	183	145	117	97	81	69											
			D	.08	.13	.18	.25	.33	.42	.52	.63	.74	.87											
			C	568	463	386	331	290	257	232	211	192	177											
			D	.06	.10	.15	.20	.27	.34	.42	.51	.59	.69											



## GRIP STRUT® PLANK &amp; WALKWAY (Continued)

LOAD TABLE: 5-DIAMOND PLANK (11-3/4" Width) 2.5

Item Number	Ht. (mm)	#/LF (kg/m)	Clear Span															
			2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	6'6"	7'	7'6"	8'	9'	10'	11'
STEEL 14 GAUGE																		
24051514	1-1/2" (38.1)	4.2" (6.25)	U	536	344	240	177	136	108	88	74	62	10' and 12' lengths available for most sizes. Galvanized available in 14 gauge and 12 gauge. Visit <a href="http://mcnichols.com">mcnichols.com</a> for more information.					
			D	.06	.10	.14	.20	.26	.33	.41	.50	.60						
			C	525	422	353	304	267	239	216	198	183						
			D	.05	.08	.12	.16	.21	.26	.33	.40	.48						
24052014	2" (50.8)	4.4" (6.55)	U	890	571	397	293	225	178	145	120	102	87	76	66	59	47	
			D	.06	.09	.13	.17	.23	.29	.36	.43	.52	.61	.71	.83	.95	1.21	
			C	707	699	584	502	440	393	355	324	299	277	259	243	230	207	
			D	.04	.07	.10	.14	.18	.23	.29	.35	.42	.49	.57	.66	.76	.97	
24052514	2-1/2" (63.5)	4.7" (6.99)	U	1021	655	456	336	258	204	166	138	116	100	86	76	67	54	44
			D	.04	.06	.08	.11	.14	.18	.23	.28	.33	.39	.45	.52	.60	.77	.96
			C	707	707	669	575	505	450	407	371	342	317	296	278	262	236	216
			D	.02	.04	.06	.09	.12	.15	.18	.22	.26	.31	.36	.42	.48	.62	.77

STEEL 12 GAUGE																				
24051512	1-1/2" (38.1)	5.9" (8.78)	U	710	456	318	235	181	144	117	98	83	71	62	55	49	U - Uniform Load (lbs/SF) C - concentrated load D - deflection (inches)			
			D	.07	.11	.15	.21	.28	.35	.44	.53	.64	.76	.89	1.03	1.18				
			C	695	558	467	402	354	317	287	263	244	227	213	201	190				
			D	.05	.08	.12	.17	.22	.28	.35	.43	.51	.60	.71	.82	.95				
24052012	2" (50.8)	6.2" (9.23)	U	1131	725	505	372	286	227	185	154	130	111	97	85	75	60	50	42	
			D	.05	.08	.11	.16	.20	.26	.32	.39	.47	.56	.65	.75	.86	1.11	1.39	1.70	
			C	1107	888	742	638	561	501	453	414	382	355	332	312	295	266	243	224	
			D	.04	.06	.09	.12	.16	.21	.26	.31	.38	.44	.52	.60	.69	.89	1.11	1.36	
24052512	2-1/2" (63.5)	6.6" (9.82)	U	1691	1083	753	554	425	337	273	226	151	141	123	109	87	71	59	50	50
			D	.04	.06	.09	.13	.17	.21	.26	.32	.38	.45	.52	.60	.68	.87	1.09	1.33	
			C	1115	1115	1106	950	833	742	669	610	561	519	484	453	426	382	347	319	
			D	.02	.04	.07	.10	.13	.17	.21	.25	.30	.36	.41	.48	.55	.70	.87	1.06	

STAINLESS STEEL 16 GAUGE																				
28052016	2" (50.8)	3.7" (5.51)	U	583	374	261	192	148	118	96	80	68	58	48	Spans in blue shaded area produce deflection of 1/4" or less under uniform load of 100 lbs/SF.					
			D	.05	.08	.11	.16	.20	.26	.32	.39	.47	.56	.61						
			C	464	458	323	330	290	259	235	215	199	185	165						
			D	.03	.06	.09	.12	.16	.21	.26	.32	.38	.45	.49						

ALUMINUM ALLOY 5052 12 GAUGE .080"																				
270515-A12	1-1/2" (38.1)	1.49" (2.22)	U	403	255	179	132	100												
			D	.10	.15	.22	.31	.40												
			C	395	316	263	226	197												
			D	.08	.12	.18	.25	.32												
270520	2" (50.8)	1.59" (2.36)	U	592	379	263	193	148	117	95	78									
			D	.08	.13	.18	.25	.33	.42	.52	.63									
			C	466	466	386	331	290	257	232	211									
			D	.05	.10	.15	.20	.27	.34	.42	.51									

LOAD TABLE: 8-DIAMOND PLANK (18-3/4" Width) 2.8

Item Number	Ht. (mm)	#/LF (kg/m)	Clear Span																	
			2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	6'6"	7'	7'6"	8'	9'	10'	11'	12'	
STEEL 14 GAUGE																				
24082014	2" (50.8)	6.3" (9.4)	U	540	358	250	184	142	113	92	76	65	55	48	42	Spans in shaded area produce deflection of 1/4" or less under uniform load of 100 lbs/SF.				
			D	.48	.37	.34	.32	.34	.38	.43	.50	.58	.66	.77	.87					
			C	437	349	292	251	220	198	179	164	152	141	132	124					
			D	.24	.21	.20	.19	.20	.21	.23	.26	.29	.32	.36	.40					

STEEL 12 GAUGE																				
24081512	1-1/2" (38.1)	8.5" (12.6)	U	446	287	201	148	115	91	75	63	53	46	40	U - Uniform Load (lbs/SF) C - Concentrated Load D - deflection (inches)					
			D	.27	.22	.22	.26	.32	.39	.47	.56	.67	.80	.92						
			C	359	280	235	203	179	161	146	135	125	117	110						
			D	.12	.12	.12	.14	.16	.19	.22	.26	.30	.35	.40						

24082012	2" (50.8)	8.9" (13.2)	U	710	456	318	235	181	144	117	98	83	71	62	54	48				
			D	.31	.25	.23	.25	.28	.31	.37	.44	.51	.60	.68	.79	.90				
			C	554	444	371	319	282	253	229	210	194	181	169	160	151				
			D	.17	.15	.14	.15	.16	.17	.19	.22	.25	.28	.32	.36	.40				

ALUMINUM ALLOY 5052 12 GAUGE .080"																				
270820-A10	2" (50.8)	2.20" (3.27)	U	308	237	165	121	93	73	59	49	10' and 12' lengths available for most sizes. Galvanized available in 14 gauge and 12 gauge. Visit <a href="http://mcnichols.com">mcnichols.com</a> for more information.								
			D	.54	.50	.44	.44	.47	.53	.61	.71									
			C	290	232	193	166	145	129	116	106									
			D	.32	.28	.27	.27	.28	.30	.32	.36									

LOAD TABLE: 10-DIAMOND PLANK (24" Width) 2.10

Item Number	Ht. (mm)	#/LF (kg/m)	Clear Span															
			2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	6'6"	7'	7'6"	8'	9'	10'	11'
STEEL 14 GAUGE																		
24102014	2" (50.8)	7.4" (11.0)	U	300	300	228	168	128	102	82	68	57	49	42	10' and 12' lengths available for most sizes. Galvanized available in 14 gauge and 12 gauge. Visit <a href="http://mcnichols.com">mcnichols.com</a> for more information.			
			D	48	42	38	38	41	44	49	55	62	70					
			C	400	400	343	294	257	229	206	187	172	158	147				
			D	34	35	32	30	29	29	30	31	33	35	37				

## GRIP STRUT® HEAVY-DUTY PLANK &amp; WALKWAY



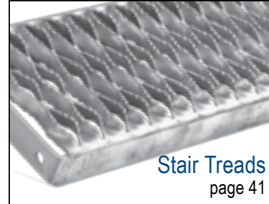
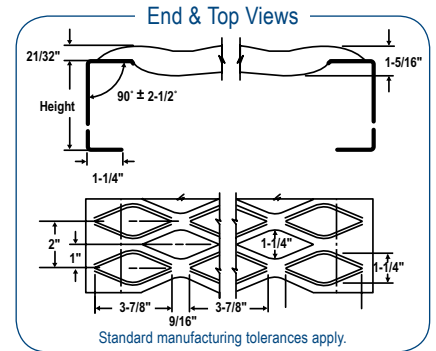
## GRIP STRUT® HEAVY-DUTY PLANK

WEB CODE: GPP5

Heavy-Duty GRIP STRUT® Planks are designed for larger loads and longer spans with its heavy 10 gauge construction. Diamond openings are larger than standard planks.

## PRODUCT OPTIONS

**Materials:** Galvanized Steel      **Widths:** 9-1/4", 13-3/4", 23-1/4", 36"  
**Gauges:** 10      **Heights:** 2", 2-1/2", 3", 4"  
**Lengths:** 12'

Stair Treads  
page 41

Standard manufacturing tolerances apply.

## LOAD TABLE: 2-DIAMOND HD PLANK (9-1/4" Width) 2.2H

Item Number	Ht (mm)	#/LF (kg/m)	Clear Span																	
			2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	6'6"	7'	7'6"	8'	9'	10'	11'	12'	
GALVANIZED STEEL 10 GAUGE																				
24H22010	2" (50.8)	7.4 (11.0)	U	2681	1716	1141	876	699	529	428	354	300	253	218	191	167	132	109	90	74
			D	.05	.08	.11	.15	.19	.24	.30	.35	.41	.47	.54	.62	.69	.85	1.04	1.24	1.43
			C	2067	1653	1378	1181	1033	919	827	752	689	636	590	551	517	459	413	376	344
			D	.04	.06	.09	.12	.15	.19	.24	.28	.33	.38	.44	.51	.55	.68	.81	.96	1.16

## LOAD TABLE: 3-DIAMOND HD PLANK (13-3/4" Width) 2.3H

Item Number	Ht. (mm)	#/LF (kg/m)	Clear Span																	
			2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	6'6"	7'	7'6"	8'	9'	10'	11'	12'	
GALVANIZED STEEL 10 GAUGE																				
24H32510	2-1/2" (63.5)	10.0 (14.9)	U	2733	1794	1214	893	683	539	437	361	304	259	223	194	170	136	110	92	76
			D	.05	.07	.10	.14	.18	.23	.27	.32	.36	.42	.49	.55	.62	.79	.96	1.15	1.38
			C	3133	2507	2089	1790	1567	1393	1253	1139	1044	964	895	836	783	696	627	570	522
			D	.03	.05	.07	.09	.12	.15	.17	.21	.24	.28	.31	.35	.39	.47	.55	.64	

## GRIP STRUT® HD STAIR TREADS

	2'	2'6"	3'	4'
U	2412	1544	1026	629
C	1860	1487	1240	929

**Material:** Steel 10 ga.      **Widths:** 9-1/4"  
**Height:** 2"      **Lengths:** 24' to 48"  
**#/LF:** 7.4

## LOAD TABLE: 5-DIAMOND HD PLANK (23-1/4" Width) 2.5H

Item Number	Ht. (mm)	#/LF (kg/m)	Clear Span																	
			2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	6'6"	7'	7'6"	8'	9'	10'	11'	12'	
GALVANIZED STEEL 10 GAUGE																				
24H52010	2" (60.8)	14.4 (21.4)	U	1034	661	459	337	258	204	165	136	116	97	84	73	65	51	42	34	29
			D	.04	.06	.08	.11	.14	.18	.22	.25	.29	.34	.39	.44	.50	.63	.76	.91	1.08
			C	2067	1653	1378	1181	1033	919	827	752	689	636	590	551	517	459	413	376	344
			D	.04	.06	.09	.12	.15	.19	.24	.28	.33	.38	.44	.49	.55	.68	.81	.96	1.16
24H52510	2-1/2" (63.5)	14.8 (22.0)	U	1617	1034	718	528	404	319	259	214	180	153	132	115	101	81	65	54	45
			D	.05	.07	.10	.14	.18	.23	.27	.32	.36	.42	.49	.55	.62	.79	.96	1.15	1.35
			C	3133	2507	2089	1790	1567	1393	1253	1139	1044	964	895	836	783	696	627	570	522
			D	.03	.05	.07	.09	.11	.12	.17	.21	.24	.28	.31	.35	.39	.47	.55	.64	.76

## LOAD TABLE: 8-DIAMOND HD PLANK (36" Width) 2.8H

Item Number	Ht. (mm)	#/LF (kg/m)	Clear Span																	
			2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	6'6"	7'	7'6"	8'	9'	10'	11'	12'	
GALVANIZED STEEL 10 GAUGE																				
24H82010	2" (50.8)	19.9 (29.6)	U	689	441	306	225	172	136	110	91	77	65	56	49	43	34	28	23	19
			D	.05	.08	.11	.15	.19	.24	.30	.35	.41	.47	.54	.62	.69	.85	1.04	1.24	1.45
			C	2067	1653	1378	1181	1033	919	827	752	689	636	590	551	517	459	413	376	344
			D	.04	.06	.09	.12	.15	.19	.24	.28	.33	.38	.44	.49	.55	.68	.81	.98	1.16

U - Uniform Load (lbs/SF) C - Concentrated Load D - Deflection (inches)



## GRIP STRUT® HEAVY-DUTY WALKWAY

WEB CODE: GPP5

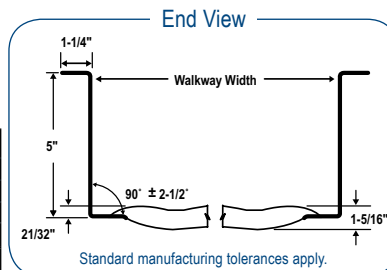
Heavy-Duty GRIP STRUT® Walkway is designed for larger loads and longer spans due to its heavy 10 gauge construction. Diamond openings are larger than standard planks. Heavy-Duty GRIP STRUT® Walkway is commonly used on rooftops.

## LOAD TABLE: 5-DIAMOND HD WALKWAY (24" Width) 2.5HW

Item Number	Depth (mm)	#/LF (kg/m)	Clear Span																		
			4'	5'	6'	7'	8'	9'	10'	11'	12'	13'	14'	15'	16'	18'	20'	22'	24'		
GALVANIZED STEEL 10 GAUGE																					
24H55010	5" (127)	17.5" (26.0)	U	937	600	417	306	234	185	150	124	104	89	77	67	59	46	38	31	25	
			D	.38	.39	.42	.38	.38	.38	.39	.47	.56	.66	.77	88	1.01	1.26	1.59	1.89	2.23	
			C	3750	3000	2500	2143	1875	1667	1500	1364	1250	1153	1071	1000	938	833	750	682	621	561
			D	.30	.31	.34	.31	.30	.30	.31	.36	.45	.53	.61	70	.80	1.01	1.25	1.51	1.81	2.14

## LOAD TABLE: 6-DIAMOND HD WALKWAY (30" Width) 2.6HW

Item Number	Ht (mm)	#/LF (kg/m)	Clear Span																													
			4'	5'	6'	7'	8'	9'	10'	11'	12'	13'	14'	15'	16'	18'	20'	22'	24'													
GALVANIZED STEEL 10 GAUGE																																
24H65010	5" (127)	19.9" (29.6)	U	916	586	407	299	229	182	146	121	102	87	75	65	57	45	36	30	25	21	18	15	13	11	9	7	5	3	2		
			D	.37	.43	.40	.40	.46	.42	.41	.41	.49	.57	.66	.75	.86	1.09	1.33	1.62	1.92	2.22	2.52	2.82	3.12	3.42	3.72	4.02	4.32	4.62	4.92	5.22	
			C	4584	3666	3056	2619	2291	2037	1834	1667	1528	1410	1309	1222	1146	1071	1006	941	876	811	746	681	616	551	486	421	356	291	226	161	96
			D	.30	.34	.32	.32	.37	.34	.33	.33	.39	.45	.53	.61	.69	.77	1.08	1.30	1.53	1.75	1.98	2.20	2.43	2.65	2.88	3.10	3.33	3.55	3.78	4.00	4.22



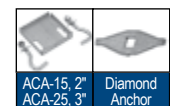
Standard manufacturing tolerances apply.

## PRODUCT OPTIONS

**Materials:** Galvanized Steel  
**Gauges:** 10  
**Widths:** 24", 30", 36"  
**Lengths:** 12'  
**Depths:** 5"

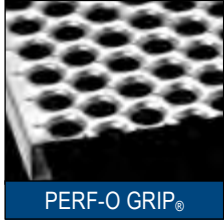
## CLIPS &amp; FASTENERS

For a list of clips and fasteners and their purpose please see page 42.



## PERF-O GRIP® PLANK & WALKWAY

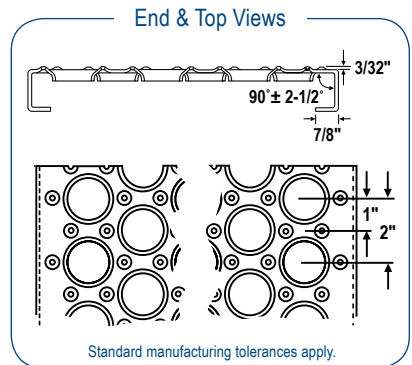
**PERF-O GRIP®** is made up of large debossed holes and perforated buttons that provide slip resistance and performance in every direction. The holes allow fluids, mud, chips, snow and other accident-causing debris to fall through openings.



# PERF-O GRIP® PLANK

WEB CODE: GPP3

**PERF-O GRIP®** Planks offer a high load capacity, long life and high strength-to-weight performance. The high grip surface provides safety as well as lessens worker fatigue. Applications include walkways, ramps, catwalks, and more.



Standard manufacturing tolerances apply.

SEE A LIST OF OUR  
**FABRICATION SERVICES**  
ON PAGE 56.



Stair Treads  
page 41

## PRODUCT OPTIONS

**Materials:** Plain Steel, Galvanized Steel, Aluminum

Gauges: 11, 13, .125 (Aluminum)

Heights: 1-1/2", 2"

Widths: 5", 7", 10", 12", 18"

Lengths: 10' or 12'

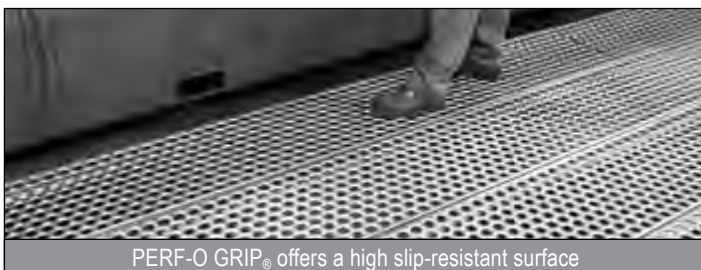
LOAD TABLE: 2-HOLE PLANK (5" Width)																			P.2
Item Number	#/LF	Ht.		Clear Span															
				2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	7'	8'	9'	10'	11'	12'	
GALVANIZED STEEL 13 GAUGE																			
M4051513	2.6	1-1/2"	U	2008	1287	895	659	505	400	325	269	227	168	130	103	85	70	60	
			D	0.05	0.08	0.11	0.15	0.20	0.25	0.31	0.38	0.45	0.62	0.82	1.04	1.30	1.57	1.90	
			C	836	670	559	481	421	375	338	308	284	244	216	194	176	162	150	
			D	0.04	0.06	0.09	0.12	0.16	0.20	0.25	0.30	0.35	0.49	0.65	0.83	1.04	1.27	1.52	

LOAD TABLE: 3-HOLE PLANK (7" Width)																P.3		
Item Number	#/LF	Ht.		Clear Span														
				2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	7'	8'	9'	10'	11'	12'
STEEL 13 GAUGE																		
M4071513	3.0	1-1/2"	U	1536	984	685	504	387	306	249	206	174	129	100	79	65	55	46
			D	0.05	0.07	0.11	0.14	0.19	0.24	0.29	0.36	0.43	0.58	0.77	0.98	1.22	1.51	1.81
			C	914	731	609	522	457	406	366	332	305	263	232	208	190	174	162
			C	0.04	0.06	0.08	0.12	0.15	0.19	0.24	0.29	0.34	0.47	0.61	0.78	0.98	1.20	1.44
M4072013	3.3	2"	U	1965	1473	1024	754	578	458	371	307	259	192	147	118	96	80	66
			D	0.03	0.06	0.08	0.11	0.14	0.18	0.23	0.27	0.33	0.44	0.58	0.74	0.92	1.13	1.36
			C	1369	1096	913	781	685	609	548	498	456	391	344	308	279	257	238
			C	0.03	0.05	0.07	0.09	0.12	0.15	0.18	0.22	0.26	0.35	0.47	0.59	0.74	0.90	1.08

LOAD TABLE: 5-HOLE PLANK (10" Width)																	P.5			
Item Number	#/LF	Ht.	Clear Span																	
			2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	7'	8'	9'	10'	11'	12'			
STEEL 13 GAUGE																				
M4101513 (Galvanized)	3.5	1-1/2"	U	963	745	517	380	291	230	187	154	129	95	73	58	46	38	32		
			D	0.04	0.08	0.11	0.15	0.19	0.24	0.30	0.36	0.43	0.59	0.77	0.98	1.20	1.44	1.71		
			C	855	684	645	554	485	431	388	353	323	277	242	216	191	176	167		
			D	0.03	0.05	0.09	0.12	0.15	0.19	0.24	0.29	0.35	0.47	0.61	0.78	0.95	1.16	1.35		
MCE02013 (Plain Steel)	3.9	2"	U	1735	1110	771	568	435	344	281	232	196	144	110	88	70	60	50		
			D	0.04	0.06	0.08	0.11	0.15	0.18	0.23	0.28	0.33	0.45	0.59	0.75	0.91	1.14	1.34		
M4102013 (Galvanized)					C	1297	1038	865	741	648	645	584	532	489	422	368	327	297	267	245
					D	0.02	0.04	0.05	0.08	0.10	0.15	0.18	0.22	0.26	0.36	0.47	0.60	0.79	0.89	1.06
ALUMINUM .125 GAUGE																				
M7102012	1.8	2"	U	1048	1022	710	522	400	316	256	212	178	131	101	80	65	54	46		
			D	.05	.12	.18	.24	.31	.40	.49	.59	.71	.96	1.26	1.59	1.96	2.37	2.83		
			C	1431	1145	954	818	715	636	572	520	477	409	358	318	286	260	238		
			D	.06	.09	.13	.19	.25	.32	.39	.47	.57	.77	1.00	1.27	1.57	1.90	2.26		

LOAD TABLE: 6-HOLE PLANK (12" Width)																	P.6	
Item Number	#/LF	Ht.	Clear Span															
			2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	7'	8'	9'	10'	11'	12'	
GALVANIZED STEEL 1 5 GAUGE																		
M4121513	4.3	1-1/2"	U	669	655	456	336	258	204	166	138	117	87	67	54	44	37	31
			D	0.03	0.07	0.10	0.13	0.17	0.22	0.27	0.33	0.40	0.55	0.72	0.92	1.16	1.43	1.68
			C	960	819	684	588	516	460	416	380	349	303	268	241	218	198	182
			D	0.03	0.05	0.08	0.11	0.14	0.18	0.22	0.26	0.32	0.44	0.58	0.74	0.91	1.11	1.32
M4122013	4.6	2"	U	1510	966	671	493	378	299	243	201	170	126	97	77	63	53	45
			D	0.03	0.05	0.07	0.10	0.13	0.16	0.20	0.25	0.40	0.53	0.68	0.85	1.03	1.25	
			C	1442	1154	961	862	756	673	608	555	509	440	388	349	317	291	270
			D	0.02	0.04	0.06	0.08	0.10	0.13	0.16	0.20	0.23	0.32	0.42	0.54	0.67	0.82	0.99
STEEL 11 GAUGE																		
M4122011	5.5	2"	U	1937	1240	861	633	486	385	312	259	218	161	124	99	80	67	57
			D	0.03	0.05	0.07	0.10	0.13	0.16	0.20	0.24	0.29	0.40	0.52	0.67	0.83	1.01	1.22
			C	1881	1505	1292	1109	971	865	781	712	654	563	496	444	403	369	341
			D	0.02	0.04	0.06	0.08	0.10	0.13	0.16	0.20	0.23	0.32	0.42	0.54	0.67	0.81	0.98
ALUMINUM .125 GAUGE																		
M7122012	2.1	2"	U	1463	936	650	478	366	290	235	194	163	120	93	73	60	49	41
			D	.08	.12	.17	.23	.30	.30	.47	.57	.68	.92	1.20	1.52	1.88	2.27	2.70
			C	1612	1290	1075	921	806	716	645	586	537	461	403	358	322	293	269
			D	.06	.09	.14	.18	.24	.30	.38	.45	.54	.74	.96	1.22	1.50	1.82	2.16

LOAD TABLE: 10-HOLE PLANK (18" Width)																			P.10
Item Number	#/LF	Ht.	Clear Span																
			2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	7'	8'	9'	10'	11'	12'		
GALVANIZED STEEL 13 GAUGE																			
M4181513	5.7	1-1/2"	U	714	457	317	233	179	142	116	96	82	60	45	36	29	24	21	
			D	0.04	0.07	0.10	0.13	0.17	0.21	0.26	0.32	0.39	0.52	0.68	0.86	1.05	1.27	1.56	
			C	964	771	642	551	495	481	434	397	366	314	274	243	220	199	183	
			D	0.03	0.04	0.07	0.09	0.12	0.17	0.21	0.26	0.31	0.42	0.55	0.69	0.85	1.03	1.23	
M4182013	6.0	2"	U	1072	686	476	350	268	212	173	143	121	90	69	55	44	36	31	
			D	0.03	0.05	0.07	0.10	0.13	0.16	0.20	0.24	0.29	0.40	0.53	0.67	0.82	0.98	1.19	
			C	1452	1162	968	830	726	645	581	528	509	470	411	366	329	299	274	
			D	0.02	0.03	0.05	0.06	0.09	0.12	0.14	0.17	0.22	0.32	0.42	0.53	0.65	0.79	0.94	
ALUMINUM .125 GAUGE																			
M7182012	2.8	2"	U	992	635	441	324	248	196	158	131	110	81	62	49	40	33	27	
			D	.07	.10	.16	.21	.28	.35	.44	.53	.63	.86	1.12	1.42	1.75	2.11	2.52	
			C	1652	1322	1102	944	826	734	661	601	551	472	413	367	330	300	275	
			D	.05	.08	.13	.17	.22	.28	.35	.42	.50	.69	.89	1.13	1.40	1.69	2.01	



PERF-O GRIP® offers a high slip-resistant surface

## CLIPS & FASTENERS

For a list of clips and fasteners and their purpose please see page 42.

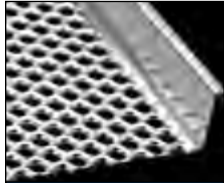


## PRODUCT SAMPLES

Please call **800.237.3820** to request a sample of any of our hole products. We look forward to serving you!



## PERF-O GRIP® PLANK &amp; WALKWAY (Continued)

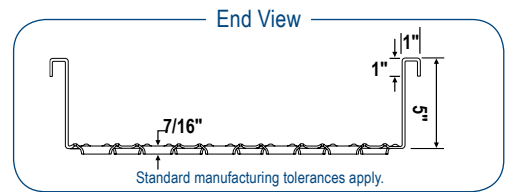


PERF-O GRIP®

## PERF-O GRIP® WALKWAY

WEB CODE: GPP3

PERF-O GRIP® Walkway surface helps lessen worker fatigue and has a high load capacity, long life and a high strength-to-weight performance. The Large Open Area (38% of surface area depending on product size) permits free flow of air, heat and light.



LOAD TABLE: 13-HOLE PLANK (24" Width, 5" Height)																P.13W		
Item Number	#/LF	Depth		Clear Span														
				2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	7'	8'	9'	10'	11'	12'
STEEL 11 GAUGE																		
MC245011 (Plain Steel) M4245011 (Galvanized)	11.8	5"	U	5751	3681	2556	1878	1438	1136	920	760	639	469	359	284	230	190	160
			D	0.02	0.02	0.04	0.05	0.06	0.08	0.10	0.12	0.14	0.19	0.25	0.31	0.39	0.47	0.56
			C	9504	7603	6336	5431	4752	4224	3802	3456	3168	2715	2376	2112	1901	1728	1584
			D	0.01	0.01	0.02	0.03	0.04	0.05	0.06	0.07	0.08	0.11	0.15	0.19	0.23	0.28	0.34

LOAD TABLE: 16-HOLE PLANK (30" Width, 5" Height)																	P.16W	
Item Number	#/LF	Depth		Clear Span														
				2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	7'	8'	9'	10'	11'	12'
STEEL 11 GAUGE																		
M4305011 (Galvanized)	13.6	5"	U	3868	2475	1719	1263	967	764	619	511	430	316	242	191	155	128	107
			D	0.01	0.02	0.03	0.04	0.05	0.06	0.08	0.10	0.12	0.16	0.20	0.26	0.32	0.39	0.46
			C	9534	7627	6356	5448	4767	4237	3813	3467	3178	2724	2383	2119	1907	1733	1589
			D	0.01	0.01	0.02	0.03	0.04	0.05	0.06	0.07	0.08	0.11	0.15	0.19	0.23	0.28	0.33

Walkway also available in 36" width. Please contact us for loading information.



Stairway made of PERF-O GRIP®

## PRODUCT OPTIONS

Materials: Plain Steel, Galvanized Steel

Gauges: 11, 13

Depth: 5"

Widths: 24", 30", 36"

Lengths: 10'

## CLIPS &amp; FASTENERS

For a list of clips and fasteners and their purpose please see page 42.



PERF-O GRIP® is used in farming industry

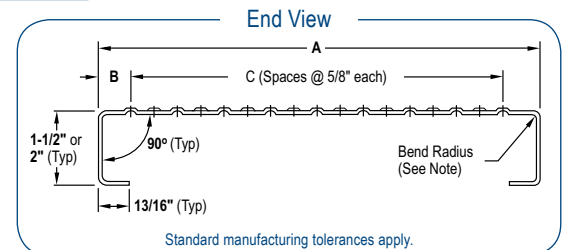


TRACTION TREAD™

## TRACTION TREAD™ PLANK

WEB CODE: GPT1

TRACTION TREAD™ Planks feature a surface of hundreds of raised perforated buttons with debossed holes that provide slip-resistance in all directions. TRACTION TREAD™ Planks are well suited for ADA compliant applications.



## PRODUCT OPTIONS

Materials: Galvanized Steel, Aluminum

Gauges: 11, 13, .125 (Aluminum)

Depth: 1-1/2", 2"

Widths: 7", 10", 12"

Lengths: 10' or 12'



TRACTION TREAD™ surface

## TRACTION TREAD™ PLANK DETAILS

Item Number	Width	A	B	C
M207201312	7"	6-7/8"	15/16"	8
M210101310	10"	9-7/8"	7/8"	13
M212201310	12"	11-7/8"	15/16"	16

## GRATE-LOCK® PLANK

**GRATE-LOCK®** Plank Grating is an easy-to-install system of interlocking grating planks, treads and accessories. It provides safe, sturdy footing for mezzanine floors, platforms, walkways and other applications where non-slip performance is required. Increased load performance can be realized through this design of interlocking, ventilated planks.

**GRATE-LOCK®** WEB CODE: GPL1

**GRATE-LOCK®** Plank has a surface of long round end-slots that provide an impressive open area of 45% that permits water passage from ceiling sprinklers, air and light. Planks are easy to install with interlocking side channels that lock together.

**PRODUCT OPTIONS**

<b>Materials:</b>	Galvanized Steel	<b>Widths:</b>	9", 12"
<b>Gauges:</b>	18, 14	<b>Lengths:</b>	12', 20', 24' (2-1/2" Ht), 12' (1-1/2" Ht), 24' (3" Ht)
<b>Heights:</b>	1-1/2", 2-1/2", 3", 4"	<b>Flanges:</b>	Male to Male, Female to Female, Female to Male

**STEEL LOAD TABLE: GRATE-LOCK® PLANK**

G.1

Gauge	Item Number	Width	% O/A	#/LF	1-1/2" HEIGHT CLEAR SPAN (LF)																	
					2'	3'	3'6"	4'	4'6"	5'	5'6"	6'	6'6"	7'	7'6"	8'	8'6"	9'	10'	11'	12'	
18	121518	12"	45%	2.9	U	443	196	144	110	87	70	58	49	41	36	31	27	24	21	17	14	12
					D	0.10	0.14	0.18	0.22	0.27	0.33	0.40	0.48	0.56	0.65	0.74	0.84	0.95	1.06	1.31	1.59	1.89
	91518	9"	43%	2.3	U	591	263	193	147	116	94	78	65	56	48	42	37	32	29	23	19	16
					D	0.10	0.14	0.18	0.22	0.27	0.33	0.40	0.48	0.56	0.65	0.74	0.84	0.95	1.06	1.31	1.59	1.89
					C	440	293	251	220	195	176	160	146	135	125	117	110	103	97	88	80	73
					D	0.04	0.10	0.13	0.17	0.21	0.26	0.32	0.38	0.45	0.52	0.60	0.68	0.77	0.86	1.06	1.28	1.54
14	121514	12"	40%	4.2	U	667	296	217	166	131	106	88	74	63	54	47	41	36	32	26	22	18
					D	0.10	0.14	0.18	0.22	0.27	0.33	0.40	0.48	0.56	0.65	0.74	0.84	0.95	1.06	1.31	1.59	1.89
	91514	9"	38%	3.5	U	891	396	291	222	176	142	117	99	84	72	63	55	49	44	35	29	24
					D	0.10	0.14	0.18	0.22	0.27	0.33	0.40	0.48	0.56	0.65	0.74	0.84	0.95	1.06	1.31	1.59	1.89
					C	663	442	379	331	295	265	241	221	204	189	177	165	156	147	132	120	110
					D	0.04	0.10	0.13	0.17	0.21	0.26	0.32	0.38	0.45	0.52	0.60	0.68	0.77	0.86	1.06	1.28	1.54

Gauge	Item Number	Width	% Open	#/LF	2-1/2" HEIGHT CLEAR SPAN (LF)																	
					2'	3'	3'6"	4'	4'6"	5'	5'6"	6'	6'6"	7'	7'6"	8'	8'6"	9'	10'	11'	12'	
18	122518	12"	45%	3.5	U	1057	552	312	200	140	103	80	64	52	43	36	31	27	23	20	18	16
					D	0.03	0.10	0.17	0.27	0.39	0.54	0.71	0.90	1.13	1.38	1.61	1.91	2.23	2.47	2.83	3.20	3.60
					C	529	529	529	501	420	362	319	286	260	239	217	207	194	184	175	167	160
					D	0.01	0.05	0.12	0.22	0.31	0.43	0.57	0.72	0.90	1.09	1.33	1.57	1.85	2.15	2.48	2.85	3.24
	92518	9"	43%	3.0	U	1552	691	390	251	175	129	100	79	65	54	46	40	35	30	27	24	21
					D	0.05	0.10	0.18	0.28	0.41	0.56	0.74	0.95	1.18	1.44	1.73	2.05	2.41	2.80	3.22	3.69	4.01
C					705	705	585	470	394	339	299	268	243	223	207	193	181	171	163	153	145	
D					0.02	0.07	0.14	0.23	0.33	0.45	0.59	0.76	0.94	1.15	1.38	1.64	1.93	2.24	2.58	2.91	3.27	
14	122514	12"	40%	5.2	U	1276	783	442	284	199	147	113	90	74	62	52	44	38	35	29	28	25
					D	0.03	0.10	0.17	0.27	0.39	0.54	0.71	0.91	1.13	1.38	1.63	1.94	2.20	2.70	2.92	3.58	4.08
					C	730	730	730	711	596	514	454	407	370	338	310	286	266	248	233	219	207
					D	0.01	0.05	0.12	0.22	0.31	0.43	0.57	0.72	0.90	1.09	1.31	1.53	1.77	2.04	2.33	2.63	2.96
	92514	9"	38%	4.4	U	2357	1050	593	381	266	196	151	121	98	82	70	58	50	45	40	36	32
					D	0.04	0.10	0.18	0.28	0.41	0.56	0.74	0.94	1.17	1.43	1.72	1.88	2.21	2.57	2.96	3.39	3.85
C					974	974	889	714	598	516	454	407	369	339	314	282	265	250	238	227	218	
D					0.02	0.07	0.14	0.23	0.33	0.45	0.59	0.75	0.94	1.14	1.38	1.50	1.77	2.05	2.37	2.71	3.08	

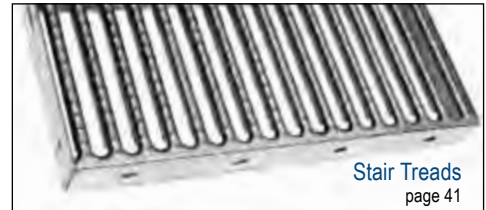
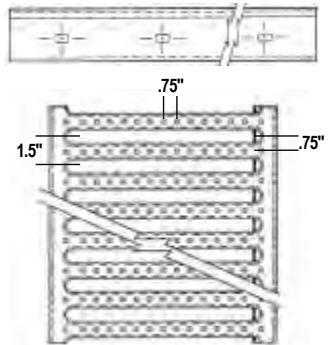
**ALLOWABLE LOADS AND DEFLECTIONS:** U = Uniform Load (lb./ft.<sup>2</sup>) C = Concentrated Load (lb.) D = Deflection (in.)

These tables are prepared based on test conducted in accordance with the 1980 edition, section 6.2 of the American Iron and Steel Institute Specification for the design of cold-rolled steel structural members with results checked and adjusted where required by calculations in accordance with section 2 of the same specification.

Safe Allowable Loads with deflections equal to or less than L/120

Safe Allowable Loads with deflections equal to or less than L/240

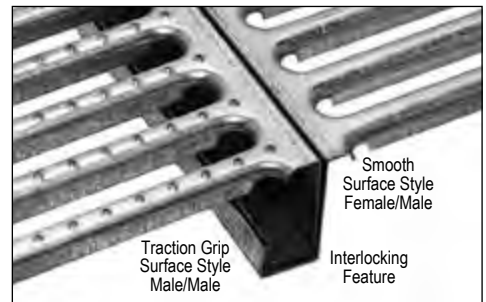
## End &amp; Top Views



Stair Treads  
page 41

## CLIPS &amp; FASTENERS

For a list of clips and fasteners and their purpose please see page 42.



## Flange Options End Views

MM Male/Male  
1-1/2" Height  
Also available as FM & FF  
Leg configuration differs from 2-1/2", 3" or 4" Heights

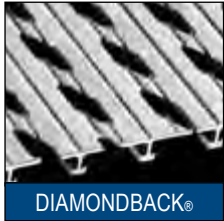
MM Male/Male  
2-1/2", 3" or 4" Heights

FM Female/Male  
1-1/2", 2-1/2", 3" or 4" Heights

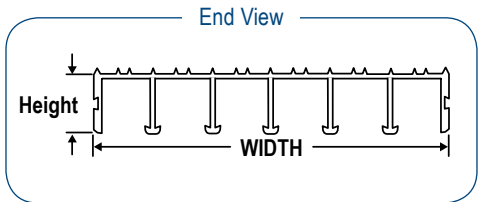
FF Female/Female  
2-1/2", 3" or 4" Heights

## DIAMONDBACK® DECKPLATE

**DIAMONDBACK®** Deckplate offers excellent strength and stability for walkways, platforms, mezzanines, catwalks and other unsupported structures. The ventilated design prevents the build-up of dirt, grease and snow. When slip resistance is important, our serrated vented plank is the answer.

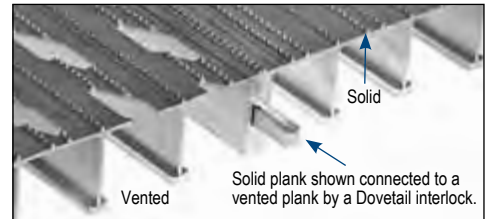
**DIAMONDBACK®** WEB CODE: GPB1

**DIAMONDBACK®** Deckplate Planks are made using an aluminum extrusion process. The surface of the plank is vented with angled diamond-shaped openings along with lines of raised serrations running parallel to the plank length.



## PRODUCT OPTIONS

**Materials:** Aluminum 6061-T6  
**Surfaces:** Vented or Solid  
**Heights:** 1", 1-1/2", 2"  
**Widths:** 6", 12"  
**Lengths:** 12'



ALUMINUM LOAD TABLE: DIAMONDBACK® DECKPLATE															D.1				
Item Number	#/LF	Width	Height	SPAN												U - Uniform Load - # per sq. ft. D - Deflection in Inches C - Concentrated Load - # per ft. grating width			
					2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	6'6"	7'		7'6"	8'	8'6"
T706100212 (vented)	1.45	6"	1"	U	1328	850	590	433	332	262	212	175	147						
T712100112 (solid)	3.06	12"		D	.199	.312	.448	.610	.797	1.008	1.299	1.502	1.787						
T712100212 (solid)	2.68	12"	1-1/2"	C	1328	1062	885	759	664	590	531	483	442						
				D	.182	.249	.359	.489	.638	.807	.996	1.206	1.433						
T712151212 (solid)	3.67	12"	1-1/2"	U	2612	1671	1161	853	653	516	418	345	290	247	213	185	163		
				D	.184	.214	.318	.485	.547	.692	.855	1.033	1.230	1.443	1.673	1.915	2.184		
				C	2612	2089	1741	1492	1306	1161	1044	949	870	803	746	696	653		
				D	.109	.171	.246	.335	.438	.554	.683	.827	.984	1.154	1.340	1.537	1.750		
T712200112 (solid)	4.30	12"	2"	U	4193	2683	1863	1369	1048	828	671	554	466	397	342	298	262	232	
				D	.187	.197	.251	.320	.418	.529	.653	.789	.940	1.104	1.279	1.468	1.671	1.886	
T712200212 (vented)	3.91			C	4193	3354	2795	2396	2096	1863	1677	1524	1397	1290	1198	1118	1048	986	
				D	.084	.131	.188	.256	.334	.423	.522	.632	.752	.883	1.024	1.181	1.337	1.505	
Loads and deflections in this table are theoretical and based on blending stress of 19,000 psi. The specifier is responsible for verifying conformance of this product with applicable codes associated with its intended use. Spans in the blue shaded area will give deflection less than 1/4" for a uniform load of 100 pounds per sq. foot.																			

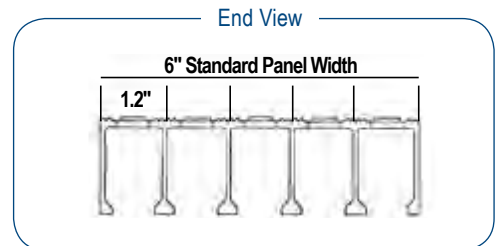
Loads and deflections in this table are theoretical and based on blending stress of 19,000 psi. The specifier is responsible for verifying conformance of this product with applicable codes associated with its intended use. Spans in the blue shaded area will give deflection less than 1/4" for a uniform load of 100 pounds per sq. foot.

## HEAVY-DUTY PLANK

An alternative to bar grating, Aluminum Plank is structurally sound and cosmetically attractive. Heavy Duty Series Aluminum Planks are made using an extrusion process. The interconnecting webs offer a flush top walking surface.

**HEAVY-DUTY PLANK** WEB CODE: GPR1

The surface on standard HD Series plank is vented with rectangular-shaped openings with long raised grooves running parallel to the plank length and additional short raised grooves perpendicular to the slot width.



LOAD TABLE: ALUMINUM PLANK (6"WIDTH)															6.7H	
Series	Height	#/ LF	Ped Span Inches	SPAN												
				2'	2'6"	3'	3'6"	4'	4'6"	5'	5'6"	6'	6'6"	7'	8'	
HD20	3/4"	1.8	39"	U	435	278	193	142	108	85	69	Theoretical values based on unit stress of 12,000 psi. U - Safe Uniform Load - # per sq. ft. D - Deflection in Inches C - Safe Concentrated Load - # per ft. width at mid span				
				D	.121	.237	.342	.465	.608	.770	.950					
				C	435	348	290	248	217	193	174					
				D	.121	.190	.273	.371	.485	.614	.760					
HD30	1"	2.2	49"	U	833	533	370	272	208	164	133	110	92	Theoretical values based on unit stress of 12,000 psi. U - Safe Uniform Load - # per sq. ft. D - Deflection in Inches C - Safe Concentrated Load - # per ft. width at mid span		
				D	.124	.193	.279	.380	.496	.628	.775	.938	1.117			
				C	833	666	555	476	416	370	333	302	277			
				D	.099	.155	.223	.304	.396	.502	.620	.748	.891			
HD50	1-1/2"	3.4	67"	U	2167	1387	963	707	541	428	346	286	240	205	176	135
				D	.090	.141	.203	.277	.362	.458	.566	.684	.815	.956	1.109	1.449
				C	2167	1734	1445	1238	1083	963	867	788	722	666	619	541
				D	.072	.113	.163	.221	.289	.366	.452	.547	.651	.764	.887	1.157

## PRODUCT OPTIONS

**Materials:** Aluminum  
**Heights:** 3/4", 1", 1-1/2", 2"  
**Widths:** 6"  
**Lengths:** 20', 26'





## PLANK STAIR TREADS

**McNICHOLS®** Plank Grating Treads are a one-piece construction from formed and punched sheet metal. Most plank grating treads are lightweight and offer significantly higher slip resistance surfaces than bar grating treads. Plank treads have a variety of surface openings that are diamond, slotted, or round shaped. They are available in plain steel, galvanized steel, stainless steel or aluminum in a variety of heights, widths and lengths.

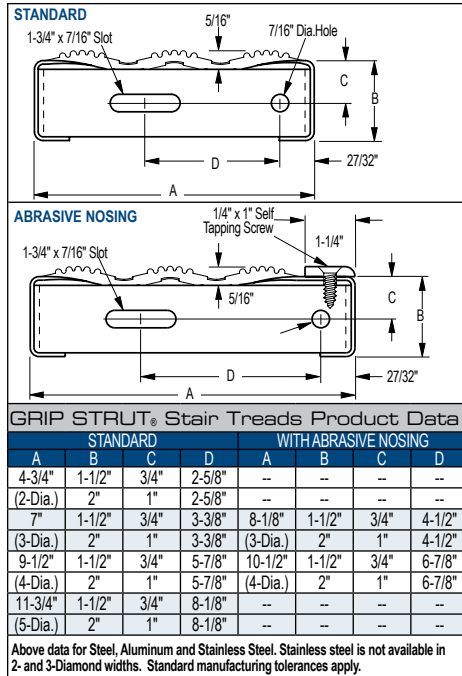


With Cast Abrasive Nosing

**GRIP STRUT®** WEB CODE: ST01

**GRIP STRUT®** Plank Grating Stair Treads offer one of the most slip-resistant surfaces in the industry. The tread's surface has diamond-shaped openings with serrated edges, making them slip resistant in every direction. Planks have a high strength-to-weight performance that offers a high load capacity and long life.

For more details on **GRIP STRUT®** Plank Grating please see page 34.



STANDARD SIZES & RECOMMENDED SPANS			
SPAN	HEIGHT	STANDARD - DEPTH	WITH ABRASIVE NOSING - WIDTH
STEEL 14 Ga.			
UP to 42"	1-1/2"	2-Diamond - 4-3/4"	--
		3-Diamond - 7"	3-Diamond - 8-1/8"
		4-Diamond - 9-1/2"	4-Diamond - 10-1/2"
		5-Diamond - 11-3/4"	--
UP to 48"	2"	2-Diamond - 4-3/4"	--
		3-Diamond - 7"	3-Diamond - 8-1/8"
		4-Diamond - 9-1/2"	4-Diamond - 10-1/2"
		5-Diamond - 11-3/4"	--
ALUMINUM .080"			
UP to 42"	2"	2-Diamond - 4-3/4"	--
		3-Diamond - 7"	3-Diamond - 8-1/8"
		4-Diamond - 9-1/2"	4-Diamond - 10-1/2"
		5-Diamond - 11-3/4"	--
STAINLESS STEEL Type 304 16 ga.			
UP to 36"	2"	4-Diamond - 9-1/2"	--
		5-Diamond - 11-3/4"	--

## PRODUCT OPTIONS

**Materials:** Plain Steel, Galvanized Steel, Aluminum or Stainless Steel  
**Gauges:** 12, 14, .080 (Aluminum), 16 (Stainless)  
**Heights:** 1-1/2", 2"  
**Depths:** 4-3/4" to 11-3/4"  
**Widths:** 24", 36", 48" or custom

## LOAD TABLE: GRIP STRUT® TREADS

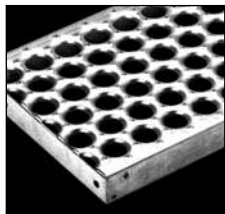
Load table data below takes eccentric loads into consideration. Although load values include allowances for normal impact conditions and usual pedestrian traffic, be sure to make provisions in the structural design for special uses and load involving unusual impact forces or vibratory forces. Load-carrying capacity of stair treads increases as side channel height and gauge of material increases.

		2-DIAMOND		3-DIAMOND		4-DIAMOND		5-DIAMOND	
		14		14		14		14	
Steel Gauge		U	C	U	C	U	C	U	C
20"	1-1/2"	1191	472	761	443	549	435	434	425
	2"	1978	783	1262	737	911	604	721	573
26"	1-1/2"	764	378	488	356	355	349	278	342
	2"	1268	611	810	590	584	578	463	566
30"	1-1/2"	532	315	340	300	245	300	194	300
	2"	882	524	563	492	407	483	322	473
40"*	2"	498	394	318	372	230	364	182	356

		2-DIAMOND		3-DIAMOND		4-DIAMOND		5-DIAMOND	
		.080"		.080"		.080"		.080"	
Material		Alum.	Alum.	Alum.	Stainless	Alum.	Stainless	Alum.	Stainless
Gauge		U	C	U	C	U	C	U	C
20"	2"	1328	526	862	503	607	481	610	483
	2"	850	420	551	402	388	392	390	387
26"	2"	850	420	551	402	388	392	390	387
	2"	590	350	383	335	270	327	271	323
30"	2"	590	350	383	335	270	327	271	323
	2"	332	263	215	252	152	245	152	244
40"	2"	332	263	215	252	152	245	99	241

\* Intermediate stringer is recommended for spans over 4'.

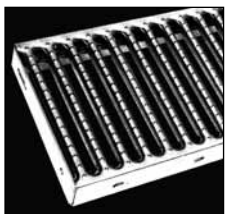
**PERF-O GRIP®** WEB CODE: ST01

**PERF-O GRIP®** Plank Grating Stair Treads can help prevent injuries by providing a slip resistant surface of large debossed holes and smaller embossed button holes. The tread's surface has a high load capacity, long life and high strength-to-weight performance.

For more details on **PERF-O GRIP®** Plank Grating please see page 37.

## PRODUCT OPTIONS

**Materials:** Plain Steel, Galvanized Steel, Aluminum  
**Gauges:** 13  
**Heights:** 1-1/2", 2"  
**Depths:** 5", 7", 10", 12"  
**Widths:** 24", 30", 36"

**GRATE-LOCK®** WEB CODE: ST01

**GRATE-LOCK®** Plank Grating Stair Treads have a surface of long, round-end slots that run across the tread width that results in an impressive open area of 45%. The large opening permits air and light to pass through and has drainage properties.

For more details on **GRATE-LOCK®** Plank Grating please see page 39.

## PRODUCT OPTIONS

**Materials:** Galvanized Steel  
**Gauges:** 14, 18  
**Surfaces:** Non-skid or Smooth  
**Heights:** 1-1/2", 2-1/2"  
**Depths:** 9"  
**Widths:** 24", 30", 36", 48"

**TRACTION TREAD™** WEB CODE: ST01

**TRACTION TREAD™** Plank Treads feature a surface of hundreds of raised perforated buttons with debossed holes that provide slip-resistance in all directions. The treads are perfectly suited for ADA compliant applications.

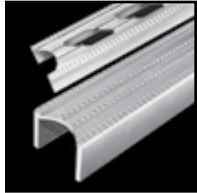
For more details on **TRACTION TREAD™** Plank Grating please see page 38.

## PRODUCT OPTIONS

**Materials:** Galvanized Steel or Aluminum  
**Gauges:** 11, 13, .125 (Aluminum)  
**Heights:** 2"  
**Depths:** 7", 10", 12"  
**Widths:** 24", 30", 36", 48"

## LADDER RUNGS

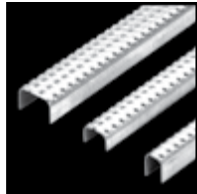
When strength, safety and weight are considerations **McNICHOLS®** Ladder Rungs are the product of choice. All styles have varying degrees of slip resistance to provide dependable footing indoors and out. [WEB CODE: LR01](#)

**DIAMONDBACK® RUNGS**

**DIAMONDBACK®** Ladder Rungs are offered in .109" aluminum, available in solid or vented. Ladder Rungs are 1.39" high x 1.75" wide and available in 12' lengths or cut-to-size. Radius end cut available by special order. Solid serrated surface also available.

**PRODUCT OPTIONS**

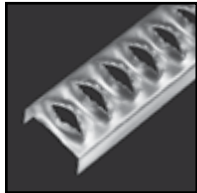
Material:	6061-T6 Aluminum
Gauges:	.109
Channel Depth:	1.39"
Widths:	1.75"
Lengths:	144"
Item Number:	T7LR517012 - Diamondback Solid

**TRACTION TREAD™ RUNGS**

**TRACTION TREAD™** Ladder Rungs are available in plain steel, stainless steel, galvanized steel or aluminum. They are available in 1-1/4" to 2-1/4" widths, 48.75" or 60" lengths, and range from 1-1/8" to 1-1/2" high. **TRACTION TREAD™** Ladder Rungs come in 2, 3 or 4 button rows.

**PRODUCT OPTIONS**

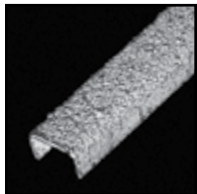
Materials:	Plain Steel, Galvanized Steel, Aluminum, Stainless Steel
Gauges:	13, 14, 16, .125
Channel Depth:	1.125", 1.50",
Widths:	1.75"
Lengths:	144"
Item Number:	M6L6ST4460 - 2 Row, 11 Ga. Plain Steel

**GRIP STRUT® RUNGS**

**GRIP STRUT®** Ladder Rungs have channels of diamonds that provide high traction footing in all directions. These aggressively treated rungs come in plain steel or galvanized and are 1.125" high. Standard length is 10' or cut-to-size, standard width is 2.5". Diamonds can run the opposite direction by special order.

**PRODUCT OPTIONS**

Materials:	Pre-Galvanized, Plain Steel
Gauge:	14
Depth:	1.25"
Widths:	2.50"
Lengths:	120"
Item Number:	2601101410 - 1 Diamond Plain Steel

**LADDER RUNG COVERS**

**GRIP TIGHT®** Rung Covers are constructed with slip resistant aluminum oxide grit over 16 gauge pre-galvanized metal. Where open area is not a concern, **GRIP TIGHT®** Covers are a great option. These rungs are stocked in 3/4" or 1" heights, in 10' lengths or cut-to-size.

**PRODUCT OPTIONS**

Material:	Aluminum Grit on Galvanized Steel
Gauge:	16
Channel Depth:	.75", 1"
Widths:	.75", 1"
Lengths:	120"
Item Number:	6MLR347010 - .75" x .75" x 120"

## CLIPS &amp; FASTENERS



<b>TYPE FSSGF</b> - Stainless Steel fastener has specially formed G-Clip bottom with a flat, bearing pad area facing up to Fiberglass structural members, protecting surfaces.
<b>TYPE Z/J</b> - Stainless 316 or 304 (1", 1-1/2" or 2") Molded Fiberglass; secures planks to support frames. <b>No hardware. For fastener and hardware specify Type J.</b>
<b>TYPE F</b> - Stainless 316 (1", 1-1/2" or 2") For Molded Fiberglass end planks to join side bars that are butted end to end.
<b>TYPE MT</b> - Stainless Steel 316 (1", 1-1/2", or 2") Pultruded Fiberglass T-Bar Grating; to secure planks to support frame using two adjacent bars for support. Specify bar spacing, height.
<b>TYPE GM</b> - Galvanized Carbon Steel. For mounting other devices to grating surface. 1/2" x 3" stud with patented base includes 1/2" nut and plate which sits above the grating and is tightened down. Available in Stainless 316.
<b>TYPE CB</b> - Galvanized Steel, Aluminum, or Stainless Steel (specify). Saddle Clip is a positive fastener for welded, press-locked, locked by swaging gratings with bearing bar spacing of 15/16" (CA) or 1-3/16" (CB). U-shaped fastener is placed over two main bearing bars and screwed to grating support. (Screw, nut, washer, etc. NOT included.)
<b>TYPE GG</b> - Galvanized, Stainless Steel or Aluminum (for 1" to 5" bar height; 1/4" to 6" flange or structural member thickness—specify). Hold Down Fastener attaches grating to structural shape in a horizontal plane. Standard GG fasteners are for grating with 7/8" to 1" gap between bearing bars (inquire for closer spacing).





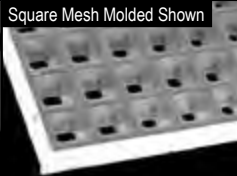


<b>TYPE SSGC</b> - Stainless Steel 316 grating fastener used to fasten close-mesh bar grating to structural shapes, where the structural flange is in a horizontal plane. Unique narrow width accommodates very narrow (3/8") grating slots. (Special order.)
<b>TYPE M</b> - Stainless 316 (1", 1-1/2" or 2") Molded Fiberglass; secures planks to support frame using two adjacent bars for support.
<b>TYPE RT/RI</b> - Stainless Steel 316 (any height) hold down fastener for Pultruded Fiberglass T-Bar or I-Bar that slides between two bars and holds the bottom flange down to support frame. Fastener is below walking surface. Specify bar spacing, type.
<b>TYPE GN</b> - Narrow Galvanized Carbon Steel fastens 15/16" spacing bar grating to structural shapes where structural flange is in a horizontal plane. (Special order.)
<b>TYPE GC</b> - Galvanized or Stainless Steel. Hold Down Fastener for smaller openings between two adjacent bars or plate to existing structure/frame. (Cap screw not included.)
<b>TYPE GFSS-1</b> Has stainless steel investment casting body. Bracket of 14 gauge 304 Stainless. One offset wing fits spacing between bars 5/8" to 1-3/8". 302 Stainless screw accommodates up to 1-3/4" of grating depth.
<b>TYPE GFS (Not shown)</b> Cast malleable iron body galvanized. Designed to fit bearing bar thicknesses 1/4", 3/16", and 1/8" at 1-3/16" centers. Stepped tail allows fastener to fit various bearing bar heights to 2-1/4" and beam flanges from 1/8"-3/4". (Screw included.)

# FIBERGLASS GRATING






**McNICHOLS®** Quality Fiberglass Grating offers a variety of styles, strengths, resins and colors.

Pultruded and Molded Fiberglass Grating are lightweight, corrosion-resistant, fire retardant and can be used like traditional metal grates but have the inherent benefits of fiberglass. They are ideal alternatives for steel gratings in corrosive environments or anywhere frequent grating and walkway replacement costs are prohibitive.

## PRODUCT OPTIONS

	PULTRUDED T-BAR	PULTRUDED I-BAR	SQUARE MOLDED	RECTANGULAR MOLDED	PLATE, PLANK & DECK
Pattern Types	MS T-5020 Shown 	MS I-6015 Shown 	Square Mesh Molded Shown 		SAFPLANK® Shown 
	pg. 44 / webcode: GPLT1	pg. 46 / webcode: GPLI1	pg. 47 / webcode: GMS1	pg. 48 / webcode: GMR1	pg. 49 / webcode: MFD1

## PRODUCT SPECIFICATIONS

Styles/Class	DURAGRID® MS T-1720, DURADEK® MS T-5020, DURAGRID® MS T-1810, DURAGRID® MS T-1210, DURAGRID® MS T-3810	DURADEK® MS I-6000, Phenolic MS I-6015, DURAGRID® MS I-4000	Square Mesh, MINI-GRID™	Rectangular Mesh	SAFPLANK®, SAFPLATE®, SAFDECK®
Surface	Grit or Non-Grit	Grit	Grit or Non-Grit	Grit or Non-Grit	Grit or Non-Grit, Punched or Solid (Plank)
Heights	1", 1-1/2", 2"	1", 1-1/2"	1", 1-1/2", 2"	1", 1-1/2"	PLANK: 2" PLATE: .125", .25" DECK: 1.125"
Widths	3', 4'	3', 4'	3', 4', 5'	8', 10', 12'	PLANK: 12", 24" DECK: 24"
Lengths	12', 18', 20'	10', 12', 20'	8', 10', 12'	3', 4', 12'	PLANK: 20', 24' PLATE: 4'x8' DECK: 20', 24'
Resins	Polyester, Vinyl ester	Polyester, Vinyl ester, Phenolic - Special Order	Polyester, Vinyl ester	Polyester, Vinyl ester	Polyester
QR Code (Scan using a QR Reader on your smart phone)					

Not all product combinations are available. See [mcnichols.com](http://mcnichols.com) for availability.

## FIBERGLASS GRATING APPLICATIONS





## FIBERGLASS PULTRUDED T-BAR

Combining corrosion resistance, long life and a maintenance free design, our Fiberglass Pultruded T-Bar grating is an alternative choice to metal. T-Bar Grating is significantly lighter than steel and easy to fabricate, reducing installation expense.



MS T-1720

**MS T-1720** WEB CODE: GPLT1

**DURAGRID® MS T-1720 Series** have comfortable walking surfaces attained through the wide-surface bearing bar. Grating is corrosion and slip resistant and is made in a fire retardant vinyl ester resin. MS T-1720 has a small open area of 16%.

**FIBERGLASS LOAD TABLE: MS T-1720**

F.1a

SPAN	LOAD	100	200	300	400	500	750	1000	2000	SAFE LOAD
12"	Δ U	.000	.000	.001	.001	.001	.002	.002	.004	18888
	Δ C	.000	.001	.001	.001	.002	.003	.003	.007	9444
18"	Δ U	.001	.002	.003	.004	.005	.008	.010	.021	12560
	Δ C	.020	.040	.060	.080	.100	.150	.200	.399	9444
24"	Δ U	.003	.006	.010	.013	.016	.024	.032	.064	9444
	Δ C	.003	.005	.008	.010	.013	.019	.026	.051	9444
30"	Δ U	.008	.015	.023	.031	.038	.058	.077	.154	6044
	Δ C	.005	.010	.015	.020	.025	.037	.049	.098	7556
36"	Δ U	.016	.031	.047	.062	.078	.117	.156	.312	4198
	Δ C	.008	.017	.025	.033	.042	.062	.083	.167	6296
42"	Δ U	.028	.057	.085	.114	.142	.213	.284	.569	3084
	Δ C	.013	.026	.039	.052	.065	.098	.130	.260	5396
48"	Δ U	.048	.095	.143	.190	.238	.356	.475		2361
	Δ C	.019	.038	.057	.076	.095	.143	.190	.380	4723

Δ U - Deflection Under Uniform Load

Δ C - Deflection Under Concentrated Load

Safe Load 2:1  
Safety Factor

MS T-5020

**MS T-5020** WEB CODE: GPLT1

**DURAGRID® MS T-5020 Series** is known for its comfortable walking surface attained through the wide-surface bearing bar. MS T-5020 has a larger open area of 50%.

**FIBERGLASS LOAD TABLE: MS T-5020**

F.2a

SPAN	LOAD	100	200	300	400	500	750	1000	2000	3000	4000	5000	6000	7000	8000	SAFE LOAD
12"	Δ U	.000	.001	.001	.001	.002	.003	.004	.007	.011	.014	.018	.021	.025	.028	11333
	Δ C	.001	.001	.002	.002	.003	.004	.006	.011	.017	.023	.028	.034	.040	.045	5666
18"	Δ U	.002	.003	.005	.007	.009	.013	.017	.035	.052	.070	.087	.104	.122	.139	7536
	Δ C	.002	.004	.006	.007	.009	.014	.019	.037	.056	.074	.093	.111	.130	.148	5666
24"	Δ U	.005	.011	.016	.021	.027	.040	.054	.107	.161	.214	.268	.321	.375	.429	5666
	Δ C	.004	.009	.013	.017	.021	.032	.043	.086	.129	.171	.214	.257	.300	.343	5666
30"	Δ U	.013	.026	.038	.051	.064	.096	.128	.256	.384	.512	.640				3626
	Δ C	.008	.016	.025	.033	.041	.061	.082	.164	.246	.327	.409	.491	.573	.655	4534
36"	Δ U	.026	.052	.078	.104	.130	.195	.260	.520							2519
	Δ C	.014	.028	.042	.055	.069	.104	.139	.277	.416	.555	.694				3778
42"	Δ U	.047	.095	.142	.190	.237	.356	.474								1850
	Δ C	.022	.043	.065	.087	.108	.163	.217	.433	.650						3238
48"	Δ U	.079	.158	.238	.317	.396	.594									1417
	Δ C	.032	.063	.095	.127	.158	.238	.317	.634							2834
54"	Δ U	.125	.250	.374	.499	.624										1120
	Δ C	.044	.089	.133	.178	.222	.333	.444								2519
60"	Δ U	.188	.375	.563	.751											907
	Δ C	.060	.120	.180	.240	.300	.450	.601								2267
66"	Δ U	.272	.544													749
	Δ C	.079	.158	.237	.316	.395	.593									2060

Δ U - Deflection Under Uniform Load

Δ C - Deflection Under Concentrated Load

Safe Load 2:1  
Safety Factor**PRODUCT DETAILS: T-BAR SERIES**

F.1b

End View						
	Bearing Bar Size (height x width)	Series No.	#/SF	A	B	C
2"x1"	MS T-1720	4.8	1.25"	.20"	.60"	17%
2"x1"	MS T-5020	3.0	2"	1"	1.40"	50%

**A** - Center to center of bearing bar

**B** - Spacing between bearing bar top flanges

**C** - Spacing between bearing bar bottom flanges

A - Center to center of bearing bar

B - Spacing between bearing bar top flanges

C - Spacing between bearing bar bottom flanges

**PRODUCT OPTIONS**

<b>Materials:</b>	Pultruded Fiberglass from polyester or vinyl ester
<b>Surface:</b>	Grit or Non-Grit
<b>Colors:</b>	Polyester - Yellow, Gray, White Vinyl ester - Yellow, Gray
<b>Bar Heights:</b>	1-1/2", 2"
<b>Widths:</b>	3', 4'
<b>Lengths:</b>	12', 18', 20'

**RESIN CHARACTERISTICS**

RESIN	TYPE	CHARACTERISTICS
SPF	POLYESTER	Fire Retardant, Class 1 Flame Rating of 25 or less per ASTM E-84
SVF	VINYL ESTER	Fire Retardant, Class 1 Flame Rating of 25 or less per ASTM E-84
SGF	POLYESTER	Orthoophthalic Polyester Architectural Grade: Fire Retardant, Class 1 Flame Rating of 25 or less per ASTM E-84
SFF	POLYESTER	Food Grade: Fire Retardant, Class 2 Flame Rating of 30 or less per ASTM E-84
SPH	PHENOLIC	Fire Retardant, Class 1 Flame Rating of 25 or less per ASTM E-84. Flame Spread 10, Smoke Index 10
NFR	VARIOUS COMPOSITES	Non-Fire Retardant

**FIBERGLASS PULTRUDED STAIR TREADS**

	Material	Pultruded Fiberglass
	Resin	SFF - Yellow or Gray
	Surface	Grit
	Span	40", 47" (1/8" Deflection or less) 52", 59" (1/4" Deflection or less)
	% O/A	50%
	Heights	1", 1-1/2", 2"
	Depths	19", 36", 48"
	Widths	Cut-to-size

MS T-5020

## FIBERGLASS PULTRUDED WIDE T-BAR

Wide T-Bar Fiberglass Grating panels are corrosion, slip resistant and fire retardant. With a wider T-Bar it also meets the requirements for the Virginia Graeme Baker Act.



MS T-1210

**MS T-1210** WEB CODE: GPLT1

**DURAGRID® MS T-1210 Series** is available with a 1" bearing bar height in gray polyester resin with medium grit in a 12" length. This grating has a tight bar spacing and a small open area of 12%.

FIBERGLASS LOAD TABLE: MS T-1210													F.3a
SPAN	LOAD	100	200	300	400	500	750	1000	2000	2500	3000	4000	SAFE LOAD
12"	Δ U	.002	.004	.006	.008	.010	.016	.021	.042	.052	.062	.083	11546
	Δ C	.003	.007	.010	.013	.017	.025	.033	.067	.083	.100	.133	5773
18"	Δ U	.010	.019	.029	.038	.048	.072	.096	.192	.240	.288	.383	5131
	Δ C	.010	.020	.031	.041	.051	.077	.102	.204	.256	.307	.409	3849
24"	Δ U	.029	.057	.086	.114	.143	.215	.286	.572				2887
	Δ C	.023	.046	.069	.092	.114	.172	.229	.458	.572			2887
30"	Δ U	.066	.133	.199	.266	.332	.498	.664					1830
	Δ C	.042	.085	.127	.170	.212	.319	.425					2288
36"	Δ U	.134	.267	.401	.535	.668							1251
	Δ C	.071	.143	.214	.285	.356							1877
42"	Δ U	.238	.476										901
	Δ C	.109	.217	.326	.435	.543							1576
48"	Δ U	.398											676
	Δ C	.159	.319	.478	.637								1351

Δ U - Deflection Under Uniform Load

Δ C - Deflection Under Concentrated Load

Safe Load 2:1  
Safety Factor



MS T-1810

**MS T-1810** WEB CODE: GPLT1

**DURAGRID® MS T-1810 Series Grating** is available with a 1" bearing bar height in gray or white polyester with a fine or medium grit. This grating has a small open area of 18%.

FIBERGLASS LOAD TABLE: MS T-1810													F.4a
SPAN	LOAD	100	200	300	400	500	750	1000	2000	2500	3000	4000	SAFE LOAD
12"	Δ U	.002	.004	.007	.009	.011	.017	.022	.045	.056	.067	.090	10680
	Δ C	.004	.007	.011	.014	.018	.027	.036	.072	.090	.108	.144	5340
18"	Δ U	.010	.021	.031	.041	.052	.078	.104	.207	.259	.311	.415	4746
	Δ C	.011	.022	.033	.044	.055	.083	.111	.221	.277	.332	.442	3560
24"	Δ U	.031	.062	.093	.124	.155	.232	.310	.619				2670
	Δ C	.025	.050	.074	.099	.124	.186	.248	.495	.619			2670
30"	Δ U	.072	.144	.215	.287	.359	.539	.718					1693
	Δ C	.046	.092	.138	.184	.230	.345	.460					2116
36"	Δ U	.145	.289	.434	.578	.723							1157
	Δ C	.077	.154	.231	.308	.385	.578						1736
42"	Δ U	.257	.514										833
	Δ C	.118	.235	.353	.470	.588							1458
48"	Δ U	.431											625
	Δ C	.172	.345	.517	.689								1250

Δ U - Deflection Under Uniform Load

Δ C - Deflection Under Concentrated Load

Safe Load 2:1  
Safety Factor

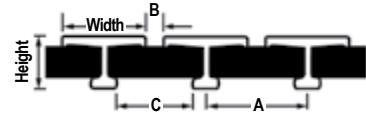
**CLIPS & FASTENERS**

For a list of clips and fasteners and their purpose please see page 42.

**PRODUCT DETAILS: WIDE T-BAR SERIES**

F.2b

End View



Bearing Bar Size	Series No.	#/SF	A	B	C	Open Area
1"x1.625"	MS T-1210	2.79	1.85"	.225"	1.35"	12%
1"x1.625"	MS T-1810	2.60	2"	.375"	1.5"	18%
1"x1.625"	MS T-3810	2.10	2.62"	.995"	1.62"	38%

A - Center to center of bearing bar

B - Spacing between bearing bar top flanges

C - Spacing between bearing bar bottom flanges

**PRODUCT OPTIONS**

<b>Materials:</b>	Pultruded Fiberglass from polyester or vinyl ester
<b>Surface:</b>	Grit or Non-Grit
<b>Colors:</b>	Polyester - Yellow, Gray, White Vinyl ester - Yellow, Gray
<b>Bar Heights:</b>	1"
<b>Widths:</b>	3', 4'
<b>Lengths:</b>	12', 20'



MS T-3810

**MS T-3810** WEB CODE: GPLT1

**DURAGRID® MS T-3810 Series** is available with a 1" bearing bar height in gray polyester resin with medium grit. This grating has an open area of 38%.

LOAD TABLE: MS T-3810 SERIES													F.5a
SPAN	LOAD	100	200	300	400	500	750	1000	2000	2500	3000	4000	SAFE LOAD
12"	Δ U	.003	.006	.009	.012	.015	.022	.029	.059	.074	.088	.118	8137
	Δ C	.005	.009	.014	.019	.024	.035	.047	.094	.118	.141	.188	4069
18"	Δ U	.014	.027	.041	.054	.068	.102	.136	.271	.339	.407	.542	3616
	Δ C	.014	.029	.043	.058	.072	.108	.145	.289	.362	.434	.579	2712
24"	Δ U	.040	.081	.121	.162	.202	.304	.405					2034
	Δ C	.032	.065	.097	.130	.162	.243	.324	.648				2034
30"	Δ U	.094	.188	.282	.376	.470							1290
	Δ C	.060	.120	.180	.240	.300	.451	.601					1612
36"	Δ U	.189	.378	.567									882
	Δ C	.101	.202	.302	.403	.504							1323
42"	Δ U	.336	.672										635
	Δ C	.154	.308	.461	.615								1111
48"	Δ U	.563											476
	Δ C	.225	.451	.676									952

Δ U - Deflection Under Uniform Load

Δ C - Deflection Under Concentrated Load

Safe Load 2:1  
Safety Factor



## FIBERGLASS PULTRUDED I-BAR

Combining corrosion resistance, long life and a maintenance free design, our Fiberglass Pultruded I-Bar Grating has I-Bar shaped bearing bars with perpendicular cross bar rods placed every 6".



MS I-6010

**MS I-6000** WEB CODE: GPLI1

MS I-6000 is our most popular stocked fiberglass product. The polyester resin panel bearing bars and cross bar colors may vary from each other. MS I-6000 Series has an open area of 60%.



MS I-6015

**MS I-6015** WEB CODE: GPLI1

MS I-6015 Pultruded Grating features the traditional I-bar shape that provides maximum flexibility in design. Product shown in phenolic resin, special order. MS I-6015 Series has an open area of 60%.

## PRODUCT OPTIONS

<b>Materials:</b>	Pultruded Fiberglass from polyester or vinyl ester (Phenolic resin by special order)	<b>Surface:</b>	Grit
<b>Colors:</b>	SPF - Gray, White, Yellow, SVF - Yellow, Gray	<b>Bar Heights:</b>	1", 1-1/2", 1.71"
		<b>Widths:</b>	3', 4'
		<b>Lengths:</b>	10', 12', 20'

FIBERGLASS LOAD TABLE: MS I-6010													F.6a
SPAN	LOAD	100	200	300	400	500	750	1000	2000	3000	4000	5000	SAFE LOAD
12"	Δ U	.002	.004	.005	.007	.009	.014	.018	.036	.054	.073	.091	10401
	Δ C	.003	.006	.009	.012	.015	.022	.029	.058	.087	.116	.145	5200
18"	Δ U	.008	.017	.025	.033	.042	.063	.084	.167	.251	.335	.418	4954
	Δ C	.009	.018	.027	.036	.045	.067	.089	.179	.268	.357	.446	3716
24"	Δ U	.025	.050	.075	.100	.124	.187	.249	.498				2900
	Δ C	.020	.040	.060	.080	.100	.149	.199	.398	.597			2900
30"	Δ U	.058	.116	.174	.231	.289	.434	.579					1856
	Δ C	.037	.074	.111	.148	.185	.278	.370					2320
36"	Δ U	.115	.230	.345	.460	.575							1289
	Δ C	.061	.123	.184	.245	.307	.460	.614					1933
42"	Δ U	.211	.422	.633									943
	Δ C	.096	.193	.289	.386	.482							1649
48"	Δ U	.353	.705										719
	Δ C	.141	.282	.423	.564								1437
54"	Δ U	.563											566
	Δ C	.200	.400	.600									1274

FIBERGLASS LOAD TABLE: MS I-6015															F.7a
SPAN	LOAD	100	200	300	400	500	750	1000	2000	3000	4000	5000	6000	7000	SAFE LOAD
12"	Δ U	.001	.001	.002	.003	.003	.005	.006	.013	.019	.026	.032	.038	.045	17601
	Δ C	.001	.002	.003	.004	.005	.008	.010	.020	.031	.041	.051	.061	.072	8800
18"	Δ U	.003	.006	.009	.012	.015	.023	.030	.061	.091	.121	.152	.182	.212	7823
	Δ C	.003	.006	.010	.013	.016	.024	.032	.065	.097	.129	.162	.194	.226	5867
24"	Δ U	.009	.018	.027	.037	.046	.069	.091	.183	.274	.366	.457	.549	.640	4400
	Δ C	.007	.015	.022	.029	.037	.055	.073	.146	.220	.293	.366	.439	.512	4400
30"	Δ U	.022	.043	.065	.086	.108	.161	.215	.430	.646					2773
	Δ C	.014	.028	.041	.055	.069	.103	.138	.276	.413	.551				3467
36"	Δ U	.044	.087	.131	.175	.218	.327	.436							1896
	Δ C	.023	.047	.070	.093	.116	.175	.233	.466						2845
42"	Δ U	.079	.159	.238	.317	.396	.595								1361
	Δ C	.036	.072	.109	.145	.181	.272	.362							2381
48"	Δ U	.133	.266	.400	.533	.666									1017
	Δ C	.053	.107	.160	.213	.266	.400	.533							2033
54"	Δ U	.211	.422	.633											777
	Δ C	.075	.150	.225	.300	.375	.563								1748

Δ U - Deflection Under Uniform Load  
Δ C - Deflection Under Concentrated Load

Safe Load 2:1  
Safety Factor

PRODUCT DETAILS: I-BAR SERIES							F.3b
End View							
Bearing Bar Size	Series No.	#/SF	A	B	C	Open Area	
MS I-4000 SERIES							
1"x.6"	MS I-4010	3.4	1"	.40"	.40"	40%	
1.5"x.6"	MS I-4015	4.2	1"	.40"	.40"	40%	
MS I-6000 SERIES							
1"x.6"	MS I-6010	2.4	1.5"	.90"	.90"	60%	
1.5"x.6"	MS I-6015	3.0	1.5"	.90"	.90"	60%	
1.5"x.6"	MS I-6515*	2.7	1.71"	1.11"	1.11"	65%	
A - Center to center of bearing bar B - Spacing between bearing bar top flanges C - Spacing between bearing bar bottom flanges *Has 8" Cross Bar Spacing							



MS I-4010

**MS I-4000** WEB CODE: GPLI1

**DURAGRID®** MS I-4000 Series is similar to the I-6000 and includes many options that are VGB (Virginia Graeme Baker Act) compliant. MS I-4000 Series has an 40% open area.

FIBERGLASS LOAD TABLE: MS I-4010															F.8a
SPAN	LOAD	100	200	300	400	500	750	1000	2000	2500	3000	4000	5000	6000	SAFE LOAD
12"	Δ U	.001	.002	.004	.005	.006	.009	.012	.024	.030	.036	.048	.060	.073	15600
	Δ C	.002	.004	.006	.008	.010	.015	.019	.039	.048	.058	.077	.097	.116	7800
18"	Δ U	.006	.011	.017	.022	.028	.042	.056	.112	.139	.167	.223	.279	.335	7431
	Δ C	.006	.012	.018	.024	.030	.045	.060	.119	.149	.179	.238	.298	.357	5573
24"	Δ U	.017	.033	.050	.066	.083	.124	.166	.332	.415	.498	.664			4350
	Δ C	.013	.027	.040	.053	.066	.100	.133	.265	.332	.398	.531	.664		4350
30"	Δ U	.039	.077	.116	.154	.193	.289	.386							2784
	Δ C	.025	.049	.074	.099	.123	.185	.247	.494	.617					3480
36"	Δ U	.077	.153	.230	.307	.383	.575								1933
	Δ C	.041	.082	.123	.164	.205	.307	.409							2900
42"	Δ U	.141	.281	.422	.563	.703									1414
	Δ C	.064	.129	.193	.257	.321	.482	.643							2474
48"	Δ U	.235	.470	.705											1078
	Δ C	.094	.188	.282	.376	.470									2155

FIBERGLASS LOAD TABLE: MS I-4015																	F.8a
SPAN	LOAD	100	200	300	400	500	750	1000	2000	3000	4000	5000	6000	7000	8000	9000	SAFE LOAD
12"	Δ U	.000	.001	.001	.002	.002	.003	.004	.009	.013	.017	.021	.026	.030	.034	.038	26400
	Δ C	.001	.001	.002	.003	.003	.005	.007	.014	.020	.027	.034	.041	.048	.055	.061	13200
18"	Δ U	.002	.004	.006	.008	.010	.015	.020	.040	.061	.081	.101	.121	.141	.162	.182	11734
	Δ C	.002	.004	.006	.009	.011	.016	.022	.043	.065	.086	.108	.129	.151	.172	.194	8800
24"	Δ U	.006	.012	.018	.024	.030	.046	.061	.122	.183	.244	.305	.366	.427	.488	.549	6600
	Δ C	.005	.010	.015	.020	.024	.037	.049	.098	.146	.195	.244	.293	.342	.390	.439	6600
30"	Δ U	.014	.029	.043	.057	.072	.108	.143	.287	.430	.574	.717					4160
	Δ C	.009	.018	.028	.037	.046	.069	.092	.184	.276	.367	.459	.551	.643			5200
36"	Δ U	.029	.058	.087	.116	.145	.218	.291	.582								2844
	Δ C	.016	.031	.047	.062	.078	.116	.155	.310	.466	.621						4267
42"	Δ U	.053	.106	.159	.211	.264	.396	.528									2041
	Δ C	.024	.048	.072	.097	.121	.181	.242	.483	.725							3571
48"	Δ U	.089	.178	.266	.355	.444	.666										1525
	Δ C	.036	.071	.107	.142	.178	.266	.355									3050

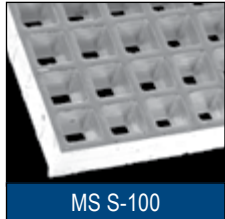
Δ U - Deflection Under Uniform Load  
Δ C - Deflection Under Concentrated Load

Safe Load 2:1  
Safety Factor



## FIBERGLASS SQUARE MOLDED

Square Molded Fiberglass Grating is an economical product of choice where corrosion resistance or fire retardancy is paramount and high impact resistance is desired. When compared to steel, this product is very lightweight but still retains the ability to support heavy loads.

**SQUARE MESH** WEB CODE: GMS1

Square Molded Fiberglass Grating panels are corrosion and fire retardant. An optional gritted surface provides additional slip resistant properties. Square Molded Grating has an open area of 70% to 72%, depending on the Mesh size.

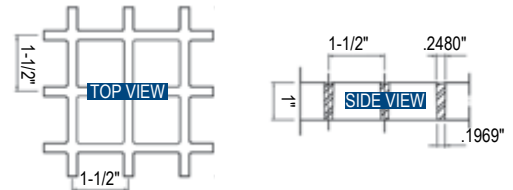
**PRODUCT OPTIONS**

<b>Materials:</b> Polyester or vinyl ester resin matrix	<b>Surface:</b> Concave or with Grit or Non-Grit
<b>Colors:</b> SPF - Gray, White, Yellow, SVF - Yellow, Gray	<b>Mesh:</b> 1-1/2"x1-1/2", 2"x2"
	<b>Heights:</b> 1", 1-1/2", 2"
	<b>Widths:</b> 3', 4', 5'
	<b>Lengths:</b> 8', 10', 12'

**PRODUCT DETAILS: SQUARE MESH**

F2.b

Side and End Views (MS S-100 shown at right)



Mesh	Series No.	#/SF	Height	Open Area	Resin/Colors
1-1/2"x1-1/2"	MS S-100	2.6	1"	70%	SPF - Green or Yellow SVF - Orange or Dark Gray
1-1/2"x1-1/2"	MS S-150	3.8	1-1/2"	70%	SGF - Yellow, Green or Dark Gray
2"x2"	MS S-200	4.0	2"	72%	SFF - Light Gray (For Resin Chart see page 44)

**FIBERGLASS LOAD TABLE: MS S-100**

F2.a

SPAN	LOAD	50	100	150	200	250	300	400	500	SAFE LOAD
12"	Δ U	<0.010	<0.010	0.013	0.017	0.021	0.025	0.034	0.042	1360
	Δ C	<0.010	0.014	0.020	0.027	0.034	0.041	0.054	0.068	680
18"	Δ U	0.021	0.041	0.062	0.082	0.103	0.123	0.164	0.205	666
	Δ C	0.022	0.044	0.066	0.088	0.110	0.131	0.175	0.219	500
24"	Δ U	0.064	0.128	0.192	0.256	0.320	0.384	0.512	0.640	380
	Δ C	0.051	0.102	0.154	0.205	0.256	0.307	0.409	0.512	380
30"	Δ U	0.155	0.309	0.464	0.619					240
	Δ C	0.099	0.198	0.297	0.396	0.495	0.594			300
36"	Δ U	0.318	0.635							160
	Δ C	0.169	0.339	0.508	0.677					240

**FIBERGLASS LOAD TABLE: MS S-150**

F2.c

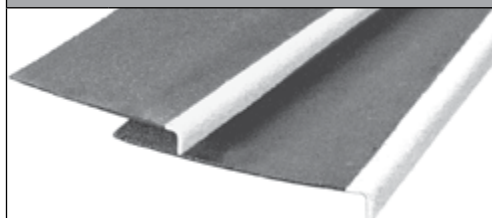
SPAN	LOAD	50	100	150	200	250	300	400	500	SAFE LOAD
12"	Δ U	<0.010	<0.010	<0.010	<0.010	<0.010	0.011	0.014	0.018	3120
	Δ C	<0.010	<0.010	<0.010	0.011	0.014	0.017	0.023	0.028	1560
18"	Δ U	<0.010	0.014	0.021	0.028	0.036	0.043	0.057	0.071	1386
	Δ C	<0.010	0.015	0.023	0.030	0.038	0.046	0.061	0.076	1040
24"	Δ U	0.021	0.042	0.063	0.084	0.104	0.125	0.167	0.209	780
	Δ C	0.017	0.033	0.050	0.067	0.084	0.100	0.134	0.167	780
30"	Δ U	0.047	0.094	0.141	0.188	0.235	0.283	0.377	0.471	496
	Δ C	0.030	0.060	0.090	0.121	0.151	0.181	0.241	0.301	620
36"	Δ U	0.096	0.192	0.288	0.384	0.480	0.576			347
	Δ C	0.051	0.102	0.154	0.205	0.256	0.307	0.410	0.512	520
42"	Δ U	0.175	0.350	0.525						251
	Δ C	0.080	0.160	0.240	0.320	0.400	0.480	0.641	0.801	440
48"	Δ U	0.287	0.573							170
	Δ C	0.115	0.229	0.344	0.459	0.573				340

Δ U - Deflection Under Uniform Load

Δ C - Deflection Under Concentrated Load

Safe Load 5:1

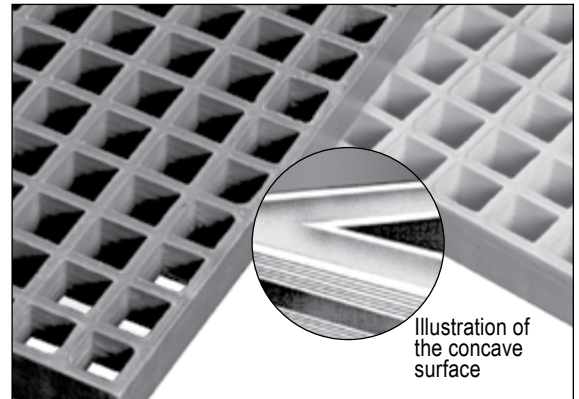
Safety Factor

**MOLDED FIBERGLASS STAIR TREAD COVERS**

Material	Molded Fiberglass Mat
Widths	9" (Item No. F209116C12), 10" (Item No. F210116C12)
Thickness	1/8"
Lengths	12"
Resin/Color	SGF - Gray with yellow nosing
Surface	Grit

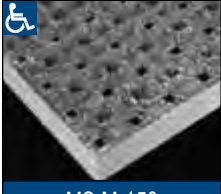


Fabrication of Fiberglass Grating



Concave surface of the Square Molded Fiberglass Grating

## FIBERGLASS SQUARE MOLDED (Continued)



MS M-150

**MINI-GRID™**

WEB CODE: GMM1

MINI-GRID™ grating has a grid surface of 3/4" squares, while the bottom grid is 1-1/2" squares. The small surface openings make it ideal for special applications. Panels are ADA compliant. MINI-GRID™ has an open area of 44%.

**PRODUCT OPTIONS**

<b>Materials:</b>	Polyester resin matrix	<b>Mesh:</b>	Top sq.: 3/4"x3/4", Bottom sq.: 1-1/2"x1-1/2"
<b>Surface:</b>	Grit	<b>Heights:</b>	1-1/2"
<b>Resin/Colors:</b>	SVF - Orange or Dk. Gray, SGF - Yellow, Green or Dk. Gray, SFF - Lt. Gray or Green	<b>Widths:</b>	4'
		<b>Lengths:</b>	12'

**FIBERGLASS LOAD TABLE: MS M-150**

SPAN	LOAD	50	100	150	200	250	300	400	500	F2.a SAFE LOAD
12"	Δ U	<.010	<.010	.011	.014	.017	.021	.028	.035	3860
	Δ C	<.010	.011	.017	.022	.028	.034	.045	.056	1930
18"	Δ U	.013	.026	.039	.052	.065	.078	.104	.130	1776
	Δ C	.014	.028	.042	.056	.070	.084	.112	.139	1332
24"	Δ U	.025	.050	.075	.100	.126	.151	.201	.251	1052
	Δ C	.020	.040	.060	.080	.101	.121	.161	.201	1052
30"	Δ U	.055	.110	.165	.219	.274	.329	.439	.548	632
	Δ C	.035	.070	.105	.140	.176	.211	.281	.351	790
36"	Δ U	.087	.173	.260	.346	.433	.520	.692		456
	Δ C	.046	.092	.139	.185	.231	.277	.370	.462	684
42"	Δ U	.150	.300	.450	.600					332
	Δ C	.069	.138	.207	.276					582
48"	Δ U	.245	.490	.735						215
	Δ C	.098	.196	.294						430

Δ U - Deflection Under Uniform Load

Δ C - Deflection Under Concentrated Load

Safe Load 5:1

Safety Factor

**PRODUCT DETAILS: SQUARE MESH**

F2.b

Top and Side Views					
	Mesh	Series No.	#SF	Height	Open Area
	Top: 3/4"x3/4" Bottom: 1-1/2"x1-1/2"	MS M-150	4.4	1-1/2"	44%
					Resin/Colors
					SGF - Green or Dark Gray (For Resin Chart see page 44)

## FIBERGLASS RECTANGULAR MOLDED



MS R-100

**RECTANGULAR MESH**

WEB CODE: GPA1

Rectangular Mesh Molded Fiberglass Grating Panels has 1"x4" or 1-1/2"x6" rectangular mesh and are corrosion and fire retardant. The panel surface is available with a smooth top or with grit for added slip resistance. Rectangular Mesh has an open area of 67% to 69% depending on the Mesh size.

**PRODUCT OPTIONS**

<b>Materials:</b>	Polyester or vinyl ester resin matrix	<b>Surface:</b>	Concave or Smooth
<b>Resin/Colors:</b>	SVF - Orange or Dk. Gray, SGF - Yellow, Green or Dk. Gray, SFF - Lt. Gray or Green	<b>Mesh:</b>	1"x4", 1-1/2"x6"
		<b>Heights:</b>	1", 1-1/2"
		<b>Widths:</b>	8', 10', 12'
		<b>Lengths:</b>	3', 4', 12'

**FIBERGLASS LOAD TABLE: MS R-100**

SPAN	LOAD	50	100	150	200	250	300	400	500	F2.c SAFE LOAD
12"	Δ U	<.010	<.010	<.010	.011	.014	.017	.022	.028	1960
	Δ C	<.010	<.010	.013	.018	.022	.027	.035	.044	980
18"	Δ U	.012	.025	.037	.049	.062	.074	.099	.123	960
	Δ C	.013	.026	.039	.053	.066	.079	.105	.131	720
24"	Δ U	.037	.074	.112	.149	.186	.223	.298	.372	560
	Δ C	.030	.060	.089	.119	.149	.179	.238	.298	560
30"	Δ U	.088	.176	.264	.352	.440	.528			336
	Δ C	.056	.113	.169	.225	.282	.338	.451	.563	420
36"	Δ U	.176	.353	.529						240
	Δ C	.094	.188	.282	.376	.470	.564			360
42"	Δ U	.316	.632							183
	Δ C	.144	.289	.433	.577					320

**FIBERGLASS LOAD TABLE: MS R-150**

SPAN	LOAD	50	100	150	200	250	300	400	500	F2.d SAFE LOAD
12"	Δ U	<.010	<.010	<.010	<.010	.011	.014	.018	.023	4272
	Δ C	<.010	<.010	.011	.015	.018	.022	.029	.037	2136
18"	Δ U	<.010	.018	.027	.035	.044	.053	.071	.089	1712
	Δ C	.010	.019	.028	.038	.047	.057	.076	.095	1284
24"	Δ U	.019	.038	.056	.075	.094	.112	.150	.188	956
	Δ C	.015	.030	.045	.060	.075	.090	.120	.150	956
30"	Δ U	.039	.078	.117	.156	.195	.233	.311	.389	587
	Δ C	.025	.050	.075	.100	.125	.150	.200	.250	734
36"	Δ U	.071	.143	.214	.285	.357	.428			385
	Δ C	.038	.076	.114	.152	.190	.228	.304	.381	578
42"	Δ U	.126	.252	.378	.504	.630				370
	Δ C	.058	.115	.173	.230	.288	.346	.461		472
48"	Δ U	.207	.414	.621						184
	Δ C	.083	.160	.248	.331	.414	.497			368

1-1/2" x 6"  
Rectangular MeshΔ U - Deflection Under Uniform Load  
Δ C - Deflection Under Concentrated LoadSafe Load 5:1  
Safety Factor**PRODUCT DETAILS: SQUARE MESH**

F2.e

Side and End Views (MS R-100 shown at right)					
	Mesh	Series No.	#SF	Height	Open Area
	1"x4"	MS R-100	2.8	1"	69%
	1-1/2"x6"	MS R-150	3.75	1-1/2"	67%
					Resin/Colors
					SPF - Green or Yellow SVF - Orange or Dark Gray SGF - Yellow, Green or Dark Gray SFF - Light Gray (For Resin Chart see page 44)

## FIBERGLASS MOLDED STAIR TREADS

	<b>Material</b>	Molded Polyester
	<b>Resin</b>	SFF - Green, SGF - Gray
	<b>Surface</b>	Grit
	<b>Mesh</b>	1-1/2"x6"
	<b>Span</b>	31" (1/8" Deflection or less) 38" (1/4" Deflection or less)
	<b>% O/A</b>	67%
	<b>Height</b>	1-1/2"
	<b>Depths</b>	7-5/8", 9-1/8", 10-5/8"
	<b>Widths</b>	Cut-to-size

## FIBERGLASS PLATE, PLANK &amp; DECK

McNICHOLS® Fiberglass Plate, Plank and Deck are lightweight and corrosion-resistant. Fiberglass plate and deck flooring are used in a variety of applications, such as trench covers to contain vapors and fumes or pedestrian bridge walkways for sure footing.

**SAFPLANK®** WEB CODE: MFD1

**SAFPLANK®** is an ADA compliant, high strength system of interlocking planks made from fiberglass composite that are ideal for dry or wet environments in addition to certain chemical environments.

**SAFPLATE®** WEB CODE: MFP1

**SAFPLATE®** is ideal for both wet and dry environments. ADA compliant plate is pultruded fiberglass with a textured slip resistant surface. This plate is a tough, corrosion resistant, lightweight, maintenance-free alternative to steel plate.

## PRODUCT OPTIONS

Materials:	Polyester Pultruded Composite	Heights:	2"
Resin/Color:	SPF - Slate Gray	Widths:	12", 24"
Surface:	Grit or Smooth, Punched or Solid	Lengths:	20', 24'

## PRODUCT OPTIONS

Materials:	Pultruded Polyester	Thickness:	.125", .25"
Resin/Color:	SPF-Gray	Standard Size:	4'x8' panels
Surface:	Grit		

## LOAD TABLE: SAFPLANK®

F2.f

12" WIDTH							
SPAN	LOAD	50	100	200	300	500	1000
24"	Δ U	.006	.011	.023	.034	.057	.113
	Δ C	<.005	.009	.018	.027	.045	.091
36"	Δ U	.022	.043	.087	.130	.217	—
	Δ C	.012	.023	.046	.070	.116	.232
48"	Δ U	.062	.123	.247	.370	—	—
	Δ C	.025	.049	.099	.148	.247	.494
60"	Δ U	.140	.281	.562	—	—	—
	Δ C	.045	.090	.180	.270	.450	—
72"	Δ U	.291	.583	—	—	—	—
	Δ C	.078	.155	.311	.466	—	—
24" WIDTH							
24"	Δ U	—	.015	.030	.045	.075	.151
	Δ C	—	.012	.024	.036	.060	.121
36"	Δ U	—	.046	.092	.138	.231	—
	Δ C	—	.024	.049	.074	.123	.246
48"	Δ U	—	.133	.265	.398	—	—
	Δ C	—	.053	.106	.159	.265	—
60"	Δ U	—	.302	.605	—	—	—
	Δ C	—	.097	.193	.290	.484	—
72"	Δ U	—	.627	—	—	—	—
	Δ C	—	.167	.334	.501	—	—

Δ U - Deflection Under Uniform Load

Δ C - Deflection Under Concentrated Load

## LOAD TABLE: SAFPLATE® FLOOR PLATE

F2.g

THICK	SPAN									
	LOAD	12"	18"	24"	30"	36"	42"	48"	54"	60"
1/4"	U	167	34	11						
	Δ U	.120	.125	.125			For allowable loads when sheet is spanning in crosswise direction multiply table values by .55 for 1/4" and .70 for all other thicknesses shown here. <b>NOTE:</b> All table values are typical.			
	C	104	32	14						
	Δ C	.120	.125	.125						
3/8"	U	562	167	55	23	11				
	Δ U	.120	.180	.188	.188	.188				
	C	351	156	69	35	20				
	Δ C	.120	.180	.188	.188	.188				
1/2"	U	1333	370	167	71	34	18	11		
	Δ U	.120	.180	.240	.250	.250	.250	.250		
	C	833	370	209	111	65	40	27		
	Δ C	.120	.180	.240	.250	.250	.250	.250		
5/8"	U	2600	768	326	167	84	45	27	17	11
	Δ U	.120	.180	.240	.300	.312	.312	.312	.312	.312
	C	1622	723	407	260	157	99	66	47	34
	Δ C	.120	.180	.240	.300	.312	.312	.312	.312	.312
3/4"	U	4499	1333	563	288	167	94	55	34	22
	Δ U	.120	.180	.240	.300	.360	.375	.375	.375	.375
	C	2804	1250	702	450	313	205	138	97	71
	Δ C	.120	.180	.240	.300	.360	.375	.375	.375	.375
1"	U	10,677	3158	1333	682	396	248	167	108	71
	Δ U	.120	.180	.240	.300	.360	.420	.480	.500	.500
	C	6667	2956	1667	1068	740	544	416	305	222
	Δ C	.120	.180	.240	.300	.360	.420	.480	.500	.500

U - Uniform Load lbs/ft² Δ U - Deflection Under Uniform Load

C - Concentrated Load lbs/ft² Δ C - Deflection Under Concentrated Load

**SAFDECK®** WEB CODE: MFD1

**SAFDECK®** is a system of 24" wide fiberglass planks designed to overlap for a continuous solid surface. It is an alternative to wood, aluminum or steel decking in environments where corrosion or rotting can occur. It is ADA compliant.

## PRODUCT OPTIONS

Materials:	Pultruded Polyester Composite
Resin/Color:	SPF - Slate Gray
Surface:	Grit or Non-Grit
Heights:	1.125"
Widths:	24"
Lengths:	20', 24'

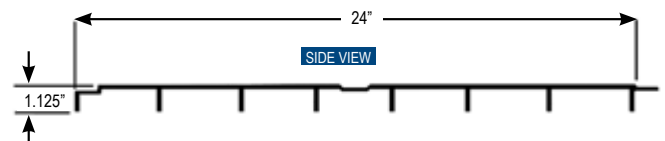
## LOAD TABLE: SAFDECK®

F2.h

24" WIDTH								
SPAN	LOAD	25	50	60	75	100	200	300
24"	Δ U	.015	.030	.036	.044	.059	.119	.179
	Δ C	.012	.023	.029	.036	.048	.096	.143
36"	Δ U	.063	.126	.151	.189	.252	—	—
	Δ C	.032	.064	.081	.101	.134	.269	—
48"	Δ U	.215	.430	—	—	—	—	—
	Δ C	.073	.147	.206	.257	.343	—	—

Δ U - Deflection Under Uniform Load

Δ C - Deflection Under Concentrated Load





## CHEMICAL RESISTANCE GUIDE

Chemical Environment	Vinyl Ester SV	Poly-ester SP	Chemical Environment	Vinyl Ester SV	Poly-ester SP	Chemical Environment	Vinyl Ester SV	Poly-ester SP	Chemical Environment	Vinyl Ester SV	Poly-ester SP
Acetic Acid 0-50%	160	74	Copper Sulfate	160	150	Levulinic Acid	160	74*	Sodium Chromate	160	74*
Alcohol, Butyl	74	NR	Corn Oil	160	74	Linseed Oil	160	150*	Sodium Cyanide	160	74
Alcohol, Ethyl 10%	150	NR	Corn Starch-Slurry	160	74	Lithium Bromide	160	150*	Sodium Dichromate	160	150
Alcohol, Isopropyl 10%	150	-	Corn Sugar	160	74	Lithium Sulfate	160	150*	Sodium Di-Phosphate	160	150
Alcohol, Isopropyl 100%	74	NR	Cottonseed Oil	160	74	Magnesium Bisulfite	160	74*	Sodium Ferricyanide	160	150
Alcohol, Methyl 10%	150	NR	Crude Oil, Sour	160	74	Magnesium Chloride	160	150+	Sodium Fluoride	120	NR*
Alcohol, Methyl Isobutyl	150	NR	Crude Oil, Sweet	160	74	Magnesium Hydroxide	140	NR*	Sodium Fluoro Silicate	120	NR*
Alcohol, Secondary Butyl	150	NR	Cyclohexane	120	74	Magnesium Nitrate	160	74+	Sodium Hexametaphosphates	100	NR*
Alum	160	150	Detergents, Sulfonated	160	74	Magnesium Sulfate	160	150*	Sodium Hydroxide 0-5%	150	NR
Aluminum Chloride	160	150	Di-Ammonium Phosphate	160	NR	Maleic Acid	160	150*	Sodium Hydroxide 5-50%	150	NR
Aluminum Hydroxide 5%	120	NR	Dibutyl Ether	120	NR	Mercuric Chloride	160	ASK	Sodium Hydrosulfide	160	74
Aluminum Nitrate	160	150*	Diesel Fuel	160	74	Mercurous Chloride	160	ASK	Sodium Hypochlorite 5%	-	-
Aluminum Potassium Sulfate	160	150	Diethylene Glycol	160	74	Methanol (See Alcohol)	160	74*	Sodium Lauryl Sulfate	160	150
Ammonia, Aqueous 0-10%	100	-	Dimethyl Phthalate	160	NR	Mineral Oils	160	150	Sodium Mono-Phosphate	160	150
Ammonia, Gas	100	-	Diethyl Phthalate	160	NR	Molybdenum Disulfide	160	NR*	Sodium Nitrate	160	150
Ammonium Bicarbonate	120	74	Dipropylene Glycol	160	74	Motor Oil	160	150	Sodium Silicate	160	74
Ammonium Bisulfite	120	-	Dodecyl Alcohol	160	NR*	Myristic Acid	160	ASK	Sodium Sulfate	160	150
Ammonium Carbonate 10%	120	-	Esters, Fatty Acids	160	150*	Naphtha	160	150	Sodium Sulfide	160	74
Ammonium Citrate	120	74*	Ethylene Glycol	160	150	Naphthalene	160	74	Sodium Sulfite	160	74
Ammonium Hydroxide 5%	120	74	Fatty Acids	160	150	Nickel Chloride	160	74	Sodium TetraBorate	160	150
Ammonium Hydroxide 10%	120	NR	Ferric Chloride	160	150	Nickel Nitrate	160	150	Sodium Thiocyanate	160	NR*
Ammonium Hydroxide 20%	120	NR	Ferric Nitrate	160	150	Nickel Sulfate	160	150	Sodium Thiosulfate	160	74
Ammonium Nitrate 50%	160	150	Ferric Sulfate	160	150	Nitric Acid 0-5%	160	150	Sodium Tripolyphosphate	160	74
Ammonium Persulfate 20%	120	NR	Ferrous Chloride	160	150	Nitric Acid 20%	120	NR*	Sodium Xylene Sulfonate	160	74
Ammonium Phosphate	120	NR	Ferrous Nitrate	160	150	Nitric Acid Fumes	NR	NR*	Sodium Solutions	160	74
Ammonium Sulfate	160	150	Ferrous Sulfate	160	150	Octanoic Acid	160	74	Sodium Crude Oil	160	150
Arsenious Acid	160	74*	8-8-8 Fertilizer	160	74	Oil, Sour Crude	160	150	Soya Oil	160	150
Barium Acetate	160	NR	Fertilizer: Urea Ammon. Nitrate	120	NR*	Oil, Sweet Crude	160	150	Stannic Chloride	160	150
Barium Carbonate	160	NR	Flue Gas	160	NR*	Oleic Acid	160	150	Stannous Chloride	160	150
Barium Chloride	160	74	Fluosilicic Acid 0-20%	160	NR	Olive Oil	160	150	Stearic Acid	160	150
Barium Hydroxide	120	-	Formaldehyde	160	74	Oxalic Acid	160	150	Sugar, Beet and Cane Liquor	160	74
Barium Sulfate	160	150	Formic Acid 10%	160	74	Phosphoric Acid	160	150	Sugar, Sucrose	160	150
Barium Sulfide	160	NR	Fuel Oil	160	74	Phosphoric Acid Fumes	160	150	Sulfamic Acid	160	74
Beer	120	74	Gas, Natural	160	74	Phosphorous Pentoxide	160	150	Sulfanilic Acid	160	74*
5% Benzene in Kerosene	160	74*	Gasoline, Auto	160	74	Phthalic Acid	160	150	Sulfated Detergents	160	74
Benzene Sulfonic Acid 30%	160	150	Gasoline Aviation	160	74	Pickling Acids	160	150	Sulfur Dioxide, Dry or Wet	160	NR*
Benzoic Acid	160	74	Gasoline, Ethyl	160	74	(Sulfuric and Hydrochloric)			Sulfur, Trioxide/Air	160	NR*
O-Benzoyl Benzoic Acid	160	74*	Gasoline, Sour	160	74	Picric Acid, Alcoholic	160	150	Sulfuric Acid 25%	160	150
Butylene Glycol	160	150	Glyconic, Acid	160	74	Polyvinyl Acetate Latex	160	74	Sulfuric Acid 30-50%	160	NR
Butyric Acid 0-50%	160	74	Glucose	160	150	Polyvinyl Alcohol	100	74	Sulfuric Acid 50-70%	120	NR
Cadmium Chloride	160	74	Glycerine	160	150	Polyvinyl Chloride Latex (35)	120	NR*	Sulfurous Acid 10%	100	NR
Calcium Bisulfate	160	150	Glycol, Propylene	160	150	Potassium Aluminum Sulfate	160	150	Superphosphoric Acid (76% P2 O5)	160	74
Calcium Chlorate	160	150	Glycolic Acid 70%	160	74	Potassium Bicarbonate	140	74	Tall Oil	150	74
Calcium Chloride	160	150	Heptane	160	74	Potassium Bromide	100	74*	Tannic Acid	120	74
Calcium Hypochlorite	120	74	Hexane	160	74	Potassium Carbonate	-	-	Tartaric Acid	160	150
Calcium Nitrate	160	150	Hexalene Glycol	160	150	Potassium Chloride	160	150	Trichloro Acetic Acid 50%	160	74
Calcium Sulfate	160	150	Hydraulic Fluid	160	74	Potassium Dichromate	140	74*	Tricresyl Phosphate	120	NR*
Calcium Sulfite	160	150	Hydrobromic Acid 0-25%	160	74	Potassium Ferricyanide	160	150	Tridecylbenzene Sulfonate	160	74*
Caprylic Acid	160	74	Hydrochloric Acid 15%	160	NR*	Potassium Ferrocyanide	160	150	Trisodium Phosphate	160	74
Carbon Dioxide	160	150	Hydrocyanic Acid	160	74	Potassium Nitrate	160	150	Turpentine	160	NR*
Carbon Monoxide	160	150	Hydrofluosilicic Acid 10%	160	NR	Potassium Permanganate	140	74	Urea	140	74
Carbon Tetrachloride	100	NR*	Hydrogen Bromide, Wet Gas	160	NR*	Potassium Persulfate	160	74	Vegetable Oils	160	150
Carbonic Acid	160	150	Hydrogen Chloride, Dry Gas	160	NR*	Potassium Sulfate	160	150	Vinegar	160	150
Carbon Methyl Cellulose	120	NR*	Hydrogen Chloride, Wet Gas	160	NR	Propionic Acid 1-50%	120	NR*	Water;		
Castor Oil	160	150*	Hydrogen Fluoride, Vapor	74	95	Pulp Paper Mill Effluent	160	74	Deionized	160	150
Chlorinated Wax	160	NR*	Hydrogen Peroxide 35%	120	ASK	Sebacic Acid	160	NR*	Deminerlized	160	150
Chlorine Dioxide/Air	160	74	Hydrogen Sulfide Dry	160	74*	Selenious Acid	160	NR*	Distilled	160	150
Chlorine Dioxide, Wet Gas	160	NR*	Hydrogen Sulfide, Aqueous	160	74*	Silver Nitrate	160	150	Fresh	160	150
Chlorine, Dry Gas	160	74	Hydrosulfite Bleach	120	NR*	Soaps	160	74	Salt	160	150
Chlorine, Wet Gas	160	NR	Hypochlorous Acid 0-10%	160	ASK	Sodium Acetate	160	74	Sea	160	150
Chlorine, Water	160	NR	Isopropyl Amine	100	NR*	Sodium Benzoate	160	74	White Liquor (Pulp Mill)	160	74
Chloroacetic Acid 0-50%	100	NR	Isopropyl Palmitate	160	150	Sodium Bicarbonate	160	74*	Xylene	NR	NR
Chromic Acid 20%	120	NR*	Jet Fuel	160	74*	Sodium Bifluoride	120	74	Zinc Chlorate	160	150
Chromium Sulfate	160	150	Kerosene	160	74*	Sodium Bisulfate	160	150	Zinc Nitrate	160	150
Citric Acid	160	150	Lactic Acid	160	ASK	Sodium Bisulfite	160	150	Zinc Sulfate	160	150
Coconut Oil	160	74	Lauroyl Chloride	160	NR*	Sodium Bromate	140	74*			
Copper Chloride	160	150	Lauric Acid	160	NR*	Sodium Bromide	160	150			
Copper Cyanide	160	NR	Lead Acetate	160	ASK	Sodium Chlorate	160	74			
Copper Fluoride	160	NR	Lead Chloride	160	74*	Sodium Chloride	160	74			
Copper Nitrate	74	150	Lead Nitrate	160	74*	Sodium Chlorite 25%	160	74			

Consult **McNICHOLS** for corrosion recommendations at concentrations, temperatures or chemicals not listed in this guide. The information in this guide is correct to the best of our knowledge. It is based on extensive experience with fiberglass grating in corrosive applications. Because actual use conditions differ and mixtures of corrosives will occur in service, the end user must test for use under actual conditions. Most of the information in this guide is based on laboratory tests and extrapolated values supplied by resin manufacturers. There are no warranties, expressed or implied, including warranties of merchantability or fitness for any particular purpose. In no event will **McNICHOLS** be liable for incidental or consequential damages, whether arising from alleged negligence, strict liability or otherwise.

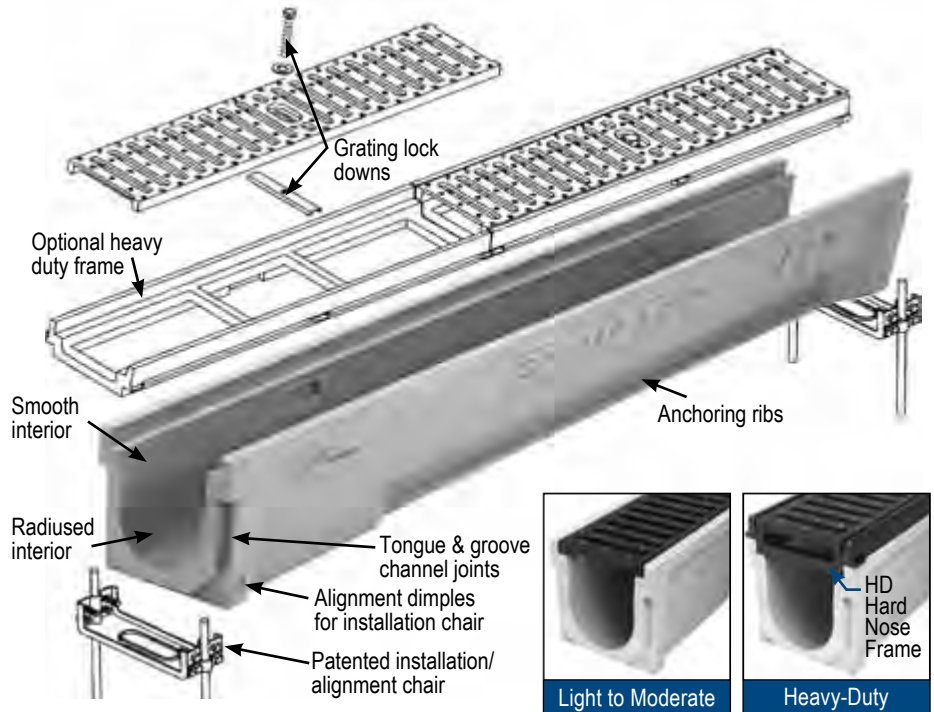
The following definitions will aid readers using this Chemical Resistance Guide: AMB - Ambient or room temperature exposure; NR - Not Resistant; - No Data. Temperature data may not be maximum, but rather upper temperature at which a resin has been tested. This is intended for general use only. This chart does not contain chemical information for pultruded floor plate.

\*Applies to SAFPLANK® & SAFDECK® only.

## POLYCAST® PRESLOPED TRENCH DRAIN SYSTEM

**McNICHOLS** Series 600 Presloped Trench Drain Systems are designed to have flow rates equal to or greater than most larger poured-in-place trench drain grates.

Made of a high-strength, precast polyester polymer concrete composite, which is stronger than concrete, Trench Drains are designed for a variety of applications, both indoors and out, commercial and industrial. The drain channels are easy to install, durable, resistant to many chemicals and ideal for freeze and thaw applications.



#### KIT 1 - SERIES 600

(Item Number: F38888820)  
20' Run (450#) Includes:

Qty.	Item Description
5	48" Presloped Channel Sections
10	Slotted Cast Iron Grates - 24"
10	Grating Locking Devices
7	Installation Alignment Chairs
1	Outlet End Cap
1	Inlet End Cap

#### KIT 2 - SERIES 600

(Item Number: F38888840)  
40' Run (900#) Includes:

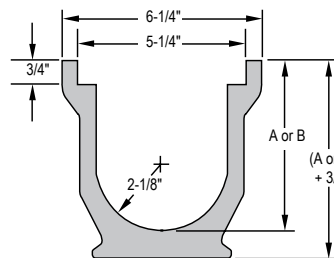
Qty.	Item Description
10	48" Presloped Channel Sections
20	Slotted Cast Iron Grates - 24"
20	Grating Locking Devices
12	Installation Alignment Chairs
1	Outlet End Cap
1	Inlet End Cap

#### FRAME KIT A - HEAVY-DUTY APPLICATIONS

(Item Number: F38888801)

Qty.	Item Description
10	24" Hard Nose Frames

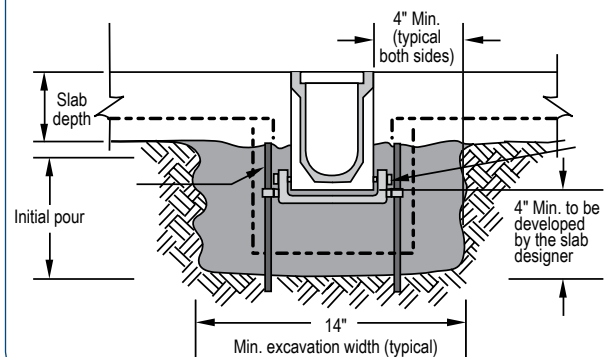
#### Trench Drain Channel Detail



**IMPORTANT:** Optional Heavy Duty Frame adds 1-3/16" to Dimensions A and B.

#### Standard Chair Installation

(Secure chair in bottom dimples on the channels.)



#### LOAD CLASSIFICATIONS

LOAD CLASS A	Pedestrian, Bicycles, Golf Carts. Meets ASTM C-857 requirements.	<b>Class A, B, C DO NOT require a Heavy-Duty Frame Kit A</b>
LOAD CLASS B	Automobiles, Light Pickup Trucks, General Aviation Aircraft, Low Speeds (parking areas, driveways)	
LOAD CLASS C	Pneumatic Tire Vehicles and Highway Vehicles, Low to Moderate Speeds (parking areas, driveways)	
LOAD CLASS D	Highway vehicles, commercial aircraft, incidental lightly loaded forklift traffic (exceeds FAA requirements for pavement design per AC 150/5320-6D), Low to moderate speeds (parking areas, driveways, warehouses)	<b>Class D, E, F DO require a Heavy-Duty Frame Kit A</b>
LOAD CLASS E	Hard wheel forklifts, construction equipment, off-road vehicles, transport and fighter category commercial and military cargo aircraft. Designed for a proof load of 308 psi. Exceeds AASHTO H-20, FAA requirements for pavement design per AC 150/5320-6D. Moderate speeds (loading docks, terminal areas)	
LOAD CLASS F	Interstate highway traffic rated. Designed for a proof load of 308 psi. Exceeds AASHTO H-20, FAA requirements for pavement design per AC 150/5320-6D. High speed vehicles (roadway and runway applications)	



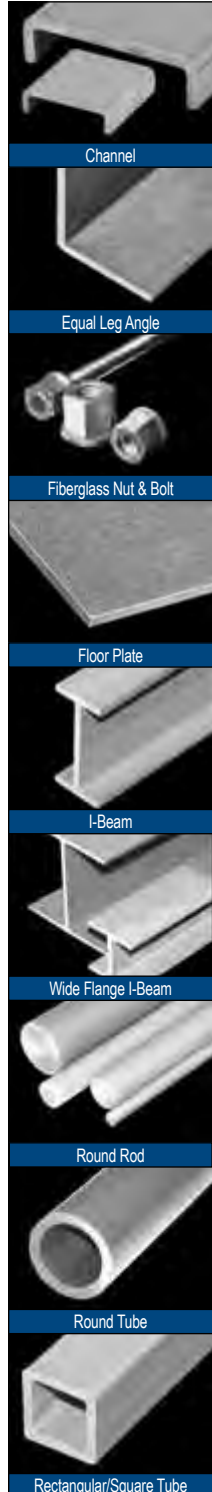
Installation process of the presloped trench drain system

## FIBERGLASS STRUCTURAL SHAPES &amp; PLATE

Structural Shapes include a variety of components for your projects, such as **EXTREN®** Fiberglass Structurals along with Fiberglass Plate, Handrail System Components, and Embed Angle. These non-corrosion components provide opportunities for the replacement of unprotected steel and wood in a variety of structural applications. Please visit [mcnichols.com](http://mcnichols.com) for more information. [WEB CODE: SSE1](#)

## RESIN CHARACTERISTICS

RESIN	TYPE
500 SPN	POLYESTER - NON-FIRE RETARDANT - GREEN
525 SPF	POLYESTER - FIRE RETARDANT - GRAY
625 SVF	VINYL ESTER - FIRE RETARDANT - BEIGE
NFR	NOT FIRE RETARDANT



## EXTREN® CHANNEL

Item No.	Description	Length	Material	Color	Item No.	Description	Length	Material	Color
F1C1515120	Channel 1-1/2" x 1-1/2" x 1/4"	20' Long	525 SPF	Gray	F1C5515020	Channel 5-1/2" x 1-1/2" x 3/16"	20' Long	525 SPF	Gray
F1C3781420	Channel 3" x 7/8" x 1/4"	20' Long	525 SPF	Gray	F1C6151420	Channel 6" x 1-5/8" x 1/4"	20' Long	525 SPF	Gray
F1C3515020	Channel 3-1/2" x 1-1/2" x 3/16"	20' Long	525 SPF	Gray	F1C6154320	Channel 6" x 1-5/8" x 1/4"	20' Long	500 SPN	Green
F1C2961820	Channel 2" x 9/16" x 1/8"	20' Long	525 SPF	Gray	F1C6154420	Channel 6" x 3" x 1/4"	20' Long	625 SVF	Beige
F1C4181420	Channel 4" x 1-1/8" x 1/4"	20' Long	525 SPF	Gray	F1C8231420	Channel 8" x 2-3/16" x 1/4"	20' Long	525 SPF	Gray
F1C6181420	Channel 4" x 1-1/8" x 1/4"	20' Long	500 SPN	Green	F1C8233820	Channel 8" x 2-3/16" x 3/8"	20' Long	525 SPF	Gray
F1C5131420	Channel 5" x 1-3/8" x 1/4"	20' Long	525 SPF	Gray	F1C823G820	Channel 8" x 2-3/16" x 3/8"	20' Long	500 SPN	Green
F1C5515020	Channel 5-1/2" x 1-1/2" x 3/16"	20' Long	525 SPF	Gray	F1C1231224	Channel 10" x 2-3/4" x 1/2"	20' Long	525 SPF	Gray

## EXTREN® EQUAL LEG ANGLE

Item No.	Description	Length	Material	Color	Item No.	Description	Length	Material	Color
F1AG118020	Equal Leg Angle 1" x 1/8"	20' Long	525 SPF	Gray	F1AG325320	Equal Leg Angle 3" x 1/4"	20' Long	500 SPN	Green
F1AG151820	Equal Leg Angle 1-1/2" x 1/8"	20' Long	525 SPF	Gray	F1AG338020	Equal Leg Angle 3" x 3/8"	20' Long	525 SPF	Gray
F1AG151420	Equal Leg Angle 1-1/2" x 1/4"	20' Long	525 SPF	Gray	F1AG338320	Equal Leg Angle 3" x 3/8"	20' Long	500 SPN	Green
F1AG126620	Equal Leg Angle 1-1/2" x 3/8"	20' Long	525 SPF	Gray	F1AG415020	Equal Leg Angle 4" x 1/2"	20' Long	525 SPF	Gray
F1AG203620	Equal Leg Angle 2" x 3/16"	20' Long	500 SPF	Gray	F1AG435020	Equal Leg Angle 4" x 1/4"	20' Long	500 SPN	Green
F1AG225320	Equal Leg Angle 2" x 1/4"	20' Long	500 SPN	Green	F1AG438020	Equal Leg Angle 4" x 3/8"	20' Long	525 SPF	Gray
F1AG225020	Equal Leg Angle 2" x 1/4"	20' Long	525 SPF	Gray	F1AG614020	Equal Leg Angle 6" x 1/4"	20' Long	525 SPF	Gray
F1AG325020	Equal Leg Angle 3" x 1/4"	20' Long	525 SPF	Gray	F1AG615020	Equal Leg Angle 6" x 1/2"	20' Long	525 SPF	Gray

## FIBERGLASS BOLTS AND NUTS (NOT EXTREN®)

Item No.	Description	Length	Material	Color	Item No.	Description	Length	Material	Color
F1FB380048	Fiberglass Bolt 3/8" (Pk. of 15)	4' Long	SVF	Brown*	F1FN5801FB	Fiberglass Nut 5/8" (Pk. of 100)		SVF	Brown*
F1FN3801FB	Fiberglass Nut 3/8" (Pk. of 100)		SVF	Brown*	F1FB340048	Fiberglass Bolt 3/4" (Pk. of 15)	4' Long	SVF	Brown*
F1FB150048	Fiberglass Bolt 1/2" (Pk. of 15)	4' Long	SVF	Brown*	F1FN3401FB	Fiberglass Nut 3/4" (Pk. of 100)		SVF	Brown*
F1FN1501FB	Fiberglass Nut 1/2" (Pk. of 100)		SVF	Brown*	F1FB010048	Fiberglass Bolt 1" (Pk. of 15)	4' Long	SVF	Brown*
F1FB580048	Fiberglass Bolt 5/8" (Pk. of 15)	4' Long	SVF	Brown*					

## EXTREN® FLOOR PLATE

Item No.	Description	Length	Material	Color	Item No.	Description	Length	Material	Color
F1GPN1848	Floor Plate 1/8"	4' x 8'	525 SPF	Gray	F1GPN3848	Floor Plate 3/8"	4' x 8'	525 SPF	Gray
F1GPN1748	Floor Plate 1/8"	4' x 8'	500 SPN	Green	F1GPN1248	Floor Plate 1/2"	4' x 8'	525 SPF	Gray
F1GPN3648	Floor Plate 3/16"	4' x 8'	525 SPF	Gray	F1OPNG1248	Floor Plate 1/2"	4' x 8'	500 SPN	Green
F1GPN61448	Floor Plate 1/4"	4' x 8'	525 SPF	Gray					

## EXTREN® I-BEAM

Item No.	Description	Length	Material	Color	Item No.	Description	Length	Material	Color
F1IB421420	I-Beam 4" x 2" x 1/4"	20' Long	SPN	Green	F1IB883820	I-Beam 8" x 4" x 3/8"	20' Long	SPN	Green
F1IB631420	I-Beam 6" x 2" x 1/4"	20' Long	SPF	Gray	F1IB888820	I-Beam 8" x 4" x 3/8"	20' Long	SVF	Beige

## EXTREN® WIDE FLANGE I-BEAM

Item No.	Description	Length	Material	Color	Item No.	Description	Length	Material	Color
F1WB314020	Wide Flange I-Beam 3" x 1/4"	20' Long	525 SPF	Gray	F1WB638020	Wide Flange I-Beam 6" x 3/8"	20' Long	525 SPF	Gray
F1WB425020	Wide Flange I-Beam 4" x 1/4"	20' Long	525 SPF	Gray	F1WB638B20	Wide Flange I-Beam 6" x 3/8"	20' Long	525 SPF	Gray
F1WB614020	Wide Flange I-Beam 6" x 1/4"	20' Long	525 SPF	Gray					

## ROUND ROD (NOT EXTREN®)

Item No.	Description	Length	Material	Color	Item No.	Description	Length	Material	Color
F1RR140020	Round Rod 1/4" dia. NOT EXTREN	20' Long	NFR	Green*	F1RRC10020	Round Rod 1" dia. NOT EXTREN	20' Long	NFR	Clear*
F1RR380020	Round Rod 3/8" dia. NOT EXTREN	20' Long	NFR	Green*	F1SB100020	Round Rod 1" dia. NOT EXTREN	20' Long	NFR	Green*

## EXTREN® ROUND TUBE

Item No.	Description	Length	Material	Color	Item No.	Description	Length	Material	Color
F1RT118020	Round Tube 1" OD x 1/8"	20' Long	525 SPF	Gray	F1RT152820	Round Tube 1-1/2" OD x 1/8"	20' Long	500 SPN	Green
F1RT111820	Round Tube 1-1/4" OD x 1/8"	20' Long	525 SPF	Gray	F1RT152720	Round Tube 1-1/2" OD x 1/8"	20' Long	625 SVF	Beige
F1RT151820	Round Tube 1-1/2" OD x 1/8"	20' Long	525 SPF	Gray	F1RT201420	Round Tube 2" OD x 1/4"	20' Long	525 SPF	Gray

## EXTREN® RECTANGULAR AND SQUARE TUBE

Item No.	Description	Length	Material	Color	Item No.	Description	Length	Material	Color
F1T4121420	Rect. Tube 4" OD x 2" x 1/8"	20' Long	525 SPF	Gray	F1ST201420	Square Tube 2" OD x 1/4"	20' Long	525 SPF	Gray
F1ST101820	Square Tube 1" OD x 1/8"	79.5' Long	500 SPN	Green	F1ST202520	Square Tube 2" OD x 1/4"	20' Long	500 SPN	Green
F1ST101722	Square Tube 1" OD x 1/8"	20' Long	500 SPN	Green	F1ST301420	Square Tube 3" OD x 1/4"	20' Long	525 SPF	Gray
F1ST151820	Square Tube 1-1/2" OD x 1/8"	20' Long	525 SPF	Gray	F1ST301520	Square Tube 3" OD x 1/4"	20' Long	500 SPN	Green
F1ST152820	Square Tube 1-1/2" OD x 1/8"	20' Long	500 SPN	Green	F1ST401420	Square Tube 4" OD x 1/4"	20' Long	525 SPF	Gray
F1ST201820	Square Tube 2" OD x 1/8"	20' Long	525 SPF	Gray					

\* Product not EXTREN®. OD - Outside Diameter

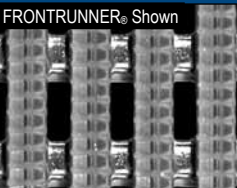
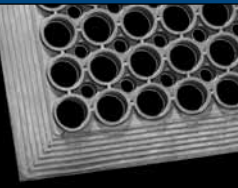

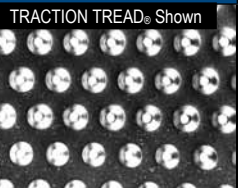
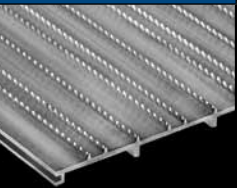


# MATting & FLOORing






McNICHOLS has a large selection of Matting & Flooring Products to meet your application requirements.

Used for its slip-resistance, wear resistance and durability our Matting and Flooring Products can be used in both retail and industrial settings. Each style has its own unique features, such as open area, chemical and weather resistance.

## PRODUCT OPTIONS

	RUNNER MATTING	AREA MATTING	TILE MATTING	METAL PLATE FLOORING	METAL DECK FLOORING
Pattern Types	FRONTRUNNER® Shown 		HERONTILE® Shown 	TRACTION TREAD® Shown 	
	pg. 54 / webcode: FMAT1	pg. 54 / webcode: FMAT1	pg. 55 / webcode: FMAT1	pg. 55 / webcode: MFT1	pg. 55 / webcode: MFB1

## PRODUCT SPECIFICATIONS

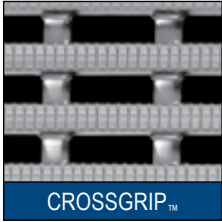
Styles/Class	CROSSGRIP™ FRONTRUNNER® HERONAIR™ HERONRIB® VYNAGRIP®	THE HOLE MAT®	HERONTILE® FLEXMAT®	GRIP TIGHT, TRACTION TREAD™ Floor Plate, Tread Plate	DIAMONDBACK® Metal Deck
Materials	PVC	Rubber	HERONTILE: EVA (Ethyl Vinyl Acetate) FLEXMAT: Polypropylene and rubber	GT: Plain Steel TT: Plain Steel, Aluminum TP: Galvanized Steel	Aluminum
Thickness/Height	VYNAGRIP: 19/32" CROSSGRIP & FRONTRUNNER: 9/16" HERONAIR & HERONRIB: 3/8"	.50"	HERONTILE: 19/32" FLEXMAT: 5/8"	GT: 1/4", 3/8" TT: 16, 14, 11, .125 TP: .063, .105	.36" Height
Standard Sizes	2'x33', 3'x33', 4'x33' (3'x33' most common) FRONTRUNNER: 2'x33', 3'x33'	3'x10'	HERONTILE: 13"x13" FLEXMAT: 12"x12"	GT: 5'x10', 5'x12' TT: 3' x 10' TP: 4'x8', 4'x10', 5'x8', 5'x10'	12"x144"
QR Code (Scan using a QR Reader on your smart phone)					

Not all product combinations are available. See [mcnichols.com](http://mcnichols.com) for availability.

## MATting & FLOORing APPLICATIONS



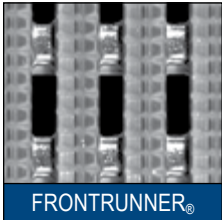
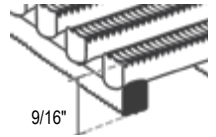
## RUNNER MATTING

**CROSSGRIP™** WEB CODE: FMAT1

**CROSSGRIP™** External Walkway Mat has an excellent slip resistance and high wear resistance rating. It is ideal for inclement weather conditions on rooftops with high wind tolerance (wind tunnel tested to 94 mph unsecured on a flat solid surface).

## PRODUCT OPTIONS

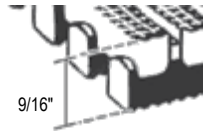
Primary Feature: Wind Resistance  
 Materials/Color: PVC - Gray  
 Thickness & Weight: 9/16" - 1.33 #/SF  
 % of Open Area: 41%  
 Standard Sizes: 2', 3', & 4' x 33'  
 Item Number: 8PCGRPDG33 (3'x33')

**FRONTRUNNER®** WEB CODE: FMAT1

**FRONTRUNNER®** Entryway Runner Mat has a high slip and wear resistance rating. It is typically used as a recessed well entryway mat in commercial and retail areas with high traffic. It will also handle high heel and wheelchair traffic.

## PRODUCT OPTIONS

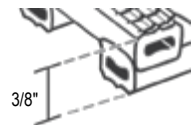
Primary Feature: High Foot Traffic  
 Materials/Color: PVC - Black or Dark Gray  
 Thickness & Weight: 9/16" Ht. - 2.14 #/SF  
 % of Open Area: 11%  
 Standard Sizes: 2' & 3' x 33'  
 Item Number: 8PFRTRBK33 (3'x33' Black)

**HERONAIR™** WEB CODE: FMAT1

**HERONAIR™** Anti-Fatigue Runner Mat has a high wear resistance rating and is excellent for its anti-fatigue properties. It is typically used in commercial, industrial or retail applications like platforms, counter areas, mail rooms and retail checkouts.

## PRODUCT OPTIONS

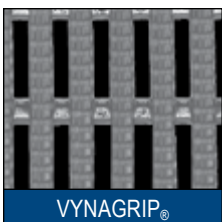
Primary Features: Anti-Fatigue, Cost Effective  
 Materials/Color: PVC - Black or Blue  
 Thickness & Weight: 3/8" Ht. - .77 #/SF  
 % of Open Area: 33%  
 Standard Sizes: 2', 3', & 4' x 33'  
 Item Number: 8PHRARBK33 (3'x33' Black)

**HERONRIB®** WEB CODE: FMAT1

**HERONRIB®** Barefoot Runner Mat is one of our most comfortable anti-fatigue mats and is moderately slip and wear resistant. It is typically used in recreational areas and in wet environments, such as pool and spa decks, locker rooms, showers and hospital areas.

## PRODUCT OPTIONS

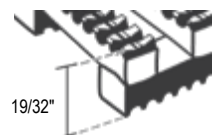
Primary Feature: Hygienic Barefoot  
 Materials/Color: PVC - Buff, Ocean Blue, Oxford Blue  
 Thickness & Weight: 3/8" Ht. - 1.22 #/SF  
 % of Open Area: 33%  
 Standard Sizes: 2', 3', & 4' x 33'  
 Item Number: 8PHRRBF33 (3'x33' Buff)

**VYNAGRIP®** WEB CODE: FMAT1

**VYNAGRIP®** High Traction Runner Mat has a high wear and slip resistance rating and can tolerate most chemicals. It is typically used in commercial, industrial or retail applications, such as platforms, counter, equipment or washing areas.

## PRODUCT OPTIONS

Primary Feature: Chemical Resistance  
 Materials/Color: PVC - Black  
 Thickness & Weight: 19/32" Ht. - 1.53 #/SF  
 % of Open Area: 33%  
 Standard Sizes: 2', 3', & 4' x 33'  
 Item Number: 8PVNGPBK33 (3'x33')



## AREA MATTING

**THE HOLE MAT®** WEB CODE: FMAT1

**THE HOLE MAT®** works well in relieving fatigue for workers who stand for long periods of time around equipment and counters. Mats are made of a premium quality rubber and are available in a stock size of 3'x10'. Other sizes available by special order.

## PRODUCT OPTIONS

Primary Features: Anti-Fatigue, Grease-Resistant  
 Materials/Color: Rubber - Black  
 Thickness & Weight: .50" - 40 #/EA  
 Standard Sizes: 3' x 10'  
 Item Number: 8843743431

## TILE MATTING

**HERONTILE®** WEB CODE: FMAT1

**HERONTILE®** Barefoot Tiles are 13" square tile grids that conveniently lock together to cover small or large areas. This product is for indoor areas only, it is self-draining, has a high slip resistance and added anti-bacterial elements.

## PRODUCT OPTIONS

Primary Feature: Hygienic Barefoot  
 Materials/Color: EVA - Ocean Blue  
 Thickness & Weight: 19/32" Ht. - .96 #/SF  
 % of Open Area: 21%  
 Standard Size: 13" x 13" Tile  
 Item Number: 8PHRTLOB11

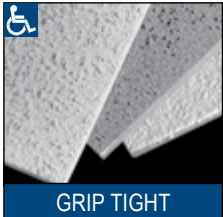
**FLEXMAT®** WEB CODE: FMAT1

**FLEXMAT®** Floor Tiles are made from polypropylene and rubber and come in 12" squares. Tile grids are 5/8" high and conveniently lock together to cover small or large areas. The open grid design of the tiles allow liquids to drain quickly.

## PRODUCT OPTIONS

Primary Features: Drainage  
 Materials/Color: Polypropylene rubber - Black  
 Thickness & Weight: 5/8" - 70 # each  
 Standard Size: 12" x 12" Tile, 5/16" open grids  
 Item Number: 86500F6212 (Black)

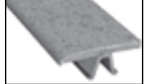
## METAL PLATE FLOORING

**GRIP TIGHT®** WEB CODE: MFG1

In the patented **GRIP TIGHT** process, an oxide grit is bonded to a metal base using a metal bonding agent. This metal and abrasive grit composite provides a non-sparking, non-corrosive surface that results in sure footing under slippery conditions. Aluminum oxide surface also available.

## PRODUCT OPTIONS

Material: Plain Steel  
 Finish: Steel Oxide Grit (Aluminum Available)  
 Thickness: 1/4", 3/8"  
 Standard Sizes: 5' x 10', 5' x 12'  
 Item Number: 6M00001451 (1/4" Thick)

GRIP TIGHT  
CE3 NOSING**TRACTION TREAD®** WEB CODE: MFT1

For slip resistance in all directions, the raised dimpled, perforated-button surface of **TRACTION TREAD®** Flooring is a great choice for most industrial applications, especially when pedestrian traffic is a consideration.

## PRODUCT OPTIONS

Material: Plain Steel, Aluminum, Pre-Galvanized Steel  
 Thickness/Gauges: 16, 14, 11, .125 (Aluminum)  
 Standard Size: 3' x 10'  
 Item Number: MP14101631 (Plain Steel, 16 gauge)

**DIAMOND TREAD PLATE®**

WEB CODE: MFC1

**DIAMOND** Tread Plate is a practical solution for industrial applications, such as truck steps or flooring for maintenance, machinery or conveyor areas. The plate is easy to fabricate and ideal for durable sheet metal applications.

## PRODUCT OPTIONS

Material: Galvanized Steel  
 Thickness/Gauges: .063, .105  
 Standard Sizes: 4' x 8', 4' x 10', 5' x 8', 5' x 10', 5' x 12'  
 Item Number: 6400011548 (4'x8', .063 gauge)

## METAL DECK FLOORING

**TREAD PLATE®** WEB CODE: MFB1

**DIAMONDBACK®** Tread Plate Interlocking Flooring has aggressive, serrated ridges to provide slip resistance that is superior to many other skid-resistant aluminum floor plates. It is configured with legs that raise it off the floor by .36", providing drainage and additional longitudinal stiffness.

## PRODUCT OPTIONS

Material: Aluminum  
 Height: .36"  
 Surface: Serrated Solid (Vented by special order)  
 Standard Size: 1'x12'  
 Item Number: T712000112



## FABRICATION SERVICES

From print takeoffs and stair treads to welding and cut-to-size, **McNICHOLS** is ready to fabricate to your specifications.

**CUT-TO-SIZE**

Our nationwide service centers are equipped with a variety of specialized cutting equipment so your job can be cut-to-size quickly and accurately!

**SPECIALTY**

We offer a variety of processing capabilities, including cut pieces and special shapes, such as circles, cut-outs and notches.

**WELDING**

Our [American Welding Standard \(AWS\)](#) certified welders fabricate steel, aluminum and stainless materials. We also fabricate areas of gratings per your specifications with custom cutouts, banding and toe plates.

**INFILL PANELS**

Our infill panels can be fabricated to your specifications from a variety of products with many patterns, openings, gauges and material choices.

**PRINT TAKEOFFS**

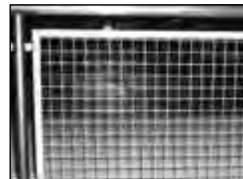
Our CAD experts are trained to do takeoffs from your drawings or spec blueprints to provide you with approval drawings, erection drawings or field drawings as required.

**STAIR TREADS**

We can fabricate over 20 different styles of stair treads in a variety of sizes and material types. Many sizes of GW Welded Series Treads are in stock for immediate shipment!

**METAL FINISHES**

As metal can corrode in the environment, we can provide a variety of finishes to combat that! We also offer a diverse selection of powder coated finishes (and anodizing for aluminum), in a variety of colors.

**EDGING**

Edging is used to enclose expanded metal, wire mesh and perforated sheet. Edging provides a smooth edge around exposed ends of jagged sheet steel. Edging is available in a variety of materials and lengths to meet your project requirements.

## PACKAGING &amp; SHIPPING

**McNICHOLS CO.** is ISO 9001:2008 certified. This certification means that we comply with the highest standards set in our industry for our products and processes, including shipping standards. The following information will help explain our practices for shipping various types of products and materials within the United States or Canada. Most products are shipped by way of common carriers.

**Perforated Metal, Expanded Metal and Wire Mesh sheet or Panel Goods**

Sheet material weighing less than 140 pounds with a one day ship point will ship in a carton. Shipments with longer transit times and/or heavier loads will ship on a skid.

**Grating, Plank Material, Perforated Metal Coil or Wire Mesh Rolls**

For non-flat and/or odd sized/shaped material, product may be shipped on a skid/pallet, bundle or box depending on the material size.

Products may be shipped via flatbed or enclosed trailer depending on the size and parameters of scheduled shipment.

International shipping procedures will vary by type of product, material, carrier and destination. For more details on these types of shipments, our Customer Service Specialist will be happy to provide information. Please call [813.739.1095](tel:813.739.1095) with any questions related to international packaging and shipping services.



Skid of Perforated Metal packaged for shipment

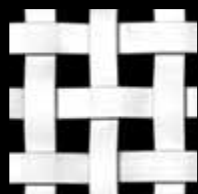


Fabrication Bar Grating loaded on flatbed for shipment

# McNICHOLS® QUALITY DESIGNER METALS . . .

## AESTHETICS WITH INTEGRITY

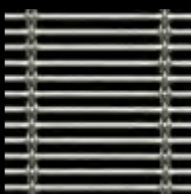
### DESIGNER WIRE MESH



Ashland™ 8018+®



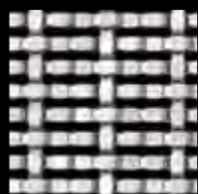
Aura™ 8150



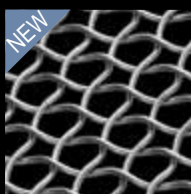
Aura™ 8858+®



Chateau™ 3105



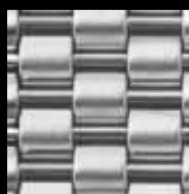
Chateau™ 8861+®



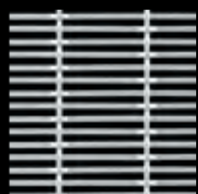
Halo™ 1162



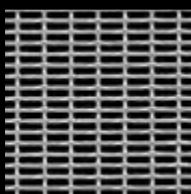
Halo™ 2252



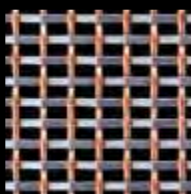
Shire™ 2134+®



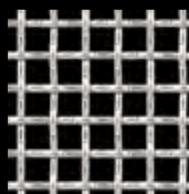
Shire™ 4391



Shire™ 8140+®



Shire™ 8148+®



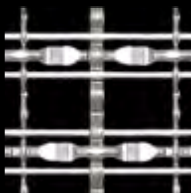
Talica™ 2120



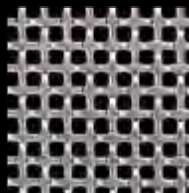
Techna™ 3150



Techna™ 3155+®



Techna™ 3156+®



Techna™ 8163+®



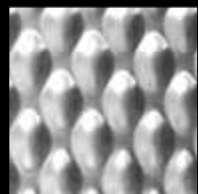
Plaid™ 6013 Wire Mesh was selected as an infill panel for this beautiful stairway.



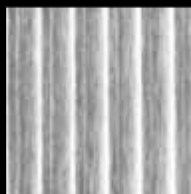
Screen printed perforated metal panels add interest to this hospital parking garage exterior.

### DESIGNER TEXTURED METALS

Add the elements of texture, dimension and shine to your next project with **McNICHOLS®** Textured Metals. Textured Metal is especially popular in high traffic areas, providing a beautiful appeal and dimension while helping hide fingerprints.



6-OM



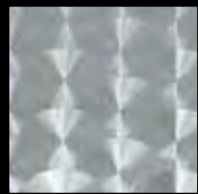
Cambridge®



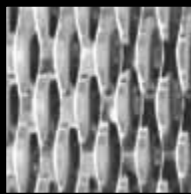
TreadTex®



3" Diamond Quilt



Engine Turn



5-SM

#### TEXTURED DETAILS

MATERIAL	Aluminum, Pre-Galvanized, Stainless Steel
THICKNESS/ GAUGES	.063 to 24
STANDARD SIZES	4' x 8', 4' x 10'

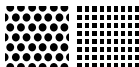


6-OM pattern adds a appealing look while functionally hiding fingerprints in this high traffic area.



# McNICHOLS CO.

PO BOX 30300 TAMPA, FL 33630-3300  
800.237.3820 | mcnichols.com | sales@mcnichols.com



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"The Lutheran Hour"

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McNICHOLS CO.

Source Code

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Printed in the USA

## McNICHOLS ECO-MESH<sup>®</sup> MODULAR FACADE & TRELLIS SYSTEMS

- **ECO-MESH<sup>®</sup>** Screens are made of a heavy .120 woven wire mesh screen with a unique bridge wire for stabilization. The gauge is 2-1/2 times stronger than .080 wire found in competing products. The special intercrimp weave provides flexibility and eliminates broken welds that can occur in other brands.
- **ECO-MESH<sup>®</sup>** Screens are framed on four sides by a durable 16 gauge metal channel that is 25% heavier than 18 gauge frames commonly found in other products.
- **ECO-MESH<sup>®</sup>** Screens are warranted for 2 years.
- **ECO-MESH<sup>®</sup>** Screens have more standard colors than others in a super durable powder coating. Custom colors are also available.
- Full Design and Installation Services are available.
- Framework units are modular/moveable.
- Strong and sustainable - Garners LEED points.

**Quick Shipment!**  
Produced to your approved drawings - typically 4 weeks!

To provide the durability plants require for years of beauty and low maintenance, specify **McNICHOLS ECO-MESH<sup>®</sup>** System.

**ECO-MESH<sup>®</sup>** Screens are the highest quality on the market!

### SPECIFICATIONS

Panel Heights: 2' up to 25' (30' Custom) [WEB CODE: EC01](#)  
Panel Width: 2' up to 7'  
Bridge Wire: .105 standard  
Wire Diameters: 9, 10, 11 gauge  
Mesh Openings: 1" x 1" to 3" x 3"  
(2" is standard) Not climbable (1-1/2" centers)  
Weave: Woven Intercrimp standard, other weaves available  
Frame Depth: 2" or 3", 16 gauge standard  
Material: Plain, Pre-Galvanized, Stainless Steel, or Aluminum  
Finish: Bare or powder coated (environmentally friendly for near zero VOC emissions)  
Planter Boxes (optional): 3/16" gauge standard  
Fasteners or Clips: Standard brackets or clips and stainless fasteners included

**Stocked 4' x 8' panels in Textured Black!**

### ECO-MESH<sup>®</sup> Colors<sup>2</sup>

	Red Orange		Aged Copper		Forest Green		Medium Bronze
	Brick Red		Reed Green		Moss Green		Texture Black
	Sierra Tan		Jet Black		Traffic White		Anodized Silver

<sup>2</sup>Custom colors available, please inquire!



Typical panel detail



# McNICHOLS

mcnichols.com

800.237.3820

800.237.9212 (español)

