



# MULE-HIDE EHD (#15) FASTENERS

## PRODUCT DESCRIPTION

Rev. May 2020

Mule-Hide EHD fasteners (Extra Heavy Duty) are # 15 fasteners engineered for attachment into wood and steel (18 to 22 ga) substrates in higher wind uplift assemblies. These fasteners incorporate a No. 3 Phillips recess, flat truss head with a #2 double flute self-drilling point. The drill point has an exclusive tapered entry thread design that allows for fastener penetration into steel roof decks and offers exceptional back-out resistance.

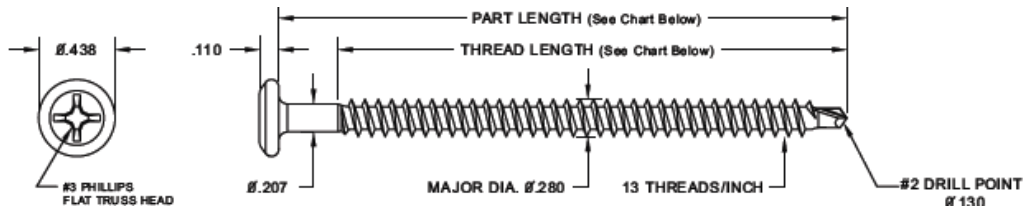
## BASIC USES

Mule-Hide's EHD Fasteners are designed specifically for the mechanical attachment of Mule-Hide's reinforced EPDM, TPO and PVC membranes in steel and wood roof decks. Mule-Hide EHD fasteners can also be used for the mechanical attachment of Poly ISO 1 and Poly ISO 2 roof insulation boards and other FM approved insulation / cover boards. The Mule-Hide EHD Fasteners may be used in conjunction with the Mule-Hide 2.4" Seam Plates, 3" Insulation Plates and All Purpose Bars. Refer to Mule-Hide's appropriate Single-Ply Manuals for installation instructions and uses.



## SPECIFICATIONS

Property	Standard	Average Ultimate Value
Wire:	----	SAE C-1022, heat treated wire
Coating:	----	TRU-Kote™ Epoxy E-Coat
Corrosion Resistance	FM 4470, ASTM D6294, DIN 50018	<15% Red Rust after 30 cycles
Tensile Strength	ASTM F606-10	4200 lbf.
Shear Strength	NASM 1312-20	2400 lb. (thread zone)



## PACKAGING

Screw Length*	Thread Length*	Pieces/Box	Weight/Box
1-1/4"	1-1/4"	1000	12.6 lbs
2"	2"	1000	19.5 lbs
3"	3"	1000	28.2 lbs
4"	3"	1000	37.8 lbs
5"	4"	1000	48.1 lbs
6"	4"	500	27.9 lbs
7"	4"	500	33.6 lbs
8"	4"	500	37.3 lbs
9"	4"	250	20.7 lbs
10"	4"	250	23.7 lbs
11"	4"	250	25.3 lbs
12"	4"	250	28.9 lbs
14"	4"	250	33.1 lbs
16"	4"	250	36.9 lbs
18"	4"	250	41.7 lbs
20"	4"	250	46.7 lbs
22"	4"	250	51.1 lbs
24"	4"	250	56.1 lbs

# MULE-HIDE EHD (#15) FASTENERS

## PERFORMANCE INFORMATION

Average Ultimate Pullout Values in Corrugated Steel Deck Substrates													
Thickness	24 ga.		22 ga.		20 ga.			18 ga.			16 ga.		
Strength, ksi	36.5	33.0	80.0	102.0	33.0	80.0	102.0	33.0	80.0	102.0	33.0	80.0	102.0
Pullout (lbs)	390	465	695	805	605	855	970	925	1125	1215	1175	1370	1460

Average Ultimate Pullout Values in Wood Substrates								
Type	APA Rated OSB				APA Rated Plywood			
Thickness	7/16"	15/32"	19/32"	23/32"	15/32"	19/32"	23/32"	SPF #2
Pullout (lbs)	295	300	310	515	400	525	685	1165*

- \*lbf./in. of thread penetration including tip.
- Pull out values are offered only as a guide and are not guaranteed in any way.
- Designated holding powers are dependent upon quality of substrate and accuracy of installation.
- Mule-Hide recommends that fastener pull out testing be performed to verify fastener performance.

## CODE APPROVALS/COMPLIANCE

Mule-Hide EHD Fasteners comply with the requirements of the following specifications, test and code requirements when properly installed. FM Standard 4450/4470 Approvals, Metro-Dade Approved, Florida Product Approvals

LEED® Information	
Manufacturing Location	Bryan, OH
LEED Eligible Recycle Content	20%

## INSTALLATION INSTRUCTIONS

### Steel and Wood Decks

Install fasteners with #3 Phillips drive bit provided in box and a variable speed screw gun. Fastener must penetrate the deck a minimum of 3/4" as measured from the underside of the roof deck to the fastener tip. Ensure that fastener is installed perpendicular to surface of roof deck. Care should be taken to not overdrive the fastener causing damage to roof insulation, fastener or roof deck. **Use eye protection when installing fasteners.**

## PROTECTION & SAFETY

Mule-Hide maintains Safety Data Sheets on all of its non-exempt products. Safety Data Sheets contain health and safety information for your development of appropriate product handling procedures to protect your employees and customers. Mule-Hide's Safety Data Sheets should be read and understood by all of your supervisory personnel and employees before using Mule-Hide products in your facilities.

## ADDITIONAL INFORMATION

The information given on this PDS is subject to change without notice. Always check the Mule-Hide website at [www.mulehide.com](http://www.mulehide.com) for the latest information, changes and updates or contact Mule-Hide Products Company at 800-786-1492.

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