

# MEPNN Supplier Scouting Opportunity Synopsis

## Section 1: General Information

Scouting Number	2024-274
Item to be Scouted	D-ring roofing anchor kit with 3" stainless steel spiral nail fasteners
Days to be scouted	15
Response Due By	09/26/2024
Description	<p>We are currently using Super Anchor Safety brand RS-10 No. 2813 anchors (see attachments), but need something similar/same that is made within BABA specifications.</p> <p>This is a single D-ring roofing anchor kit with (8) 3" spiral nails/fasteners although it coming in a "kit" is not a requirement. Please see the attached specifications/manual.</p>
Notify Requester Immediately	
State item to be used in	Oregon

## Section 2: Technical Information

Type of supplier being sought	Manufacturer
Reason	BABA
Describe the manufacturing processes (elaborate to provide as much detail as possible)	Unsure; metal casting, and more.
Provide dimensions / size / tolerances / performance specifications for the item	<p>Anchor leg: 430 stainless steel, 2 layers 20ga</p> <p>Anchor leg length: 8-1/2"</p> <p>Anchor leg width: 2"</p> <p>D-Ring length: 2-1/2"</p> <p>Anchor leg/D-Ring minimum tensile strength: 5,000lbs</p> <p>(5) Fastener holes / Fastener holes diameter: 3/16"</p> <p>Fasteners: 3" stainless steel spiral nails</p> <p>Specified use: fall restraint PPE anchorage. Install on wood framed structures (or metal decking at minimum of 24ga with SAS engineering).</p> <p>User specs: 1 person, max user weight 340lb</p> <p>Free fall max length: 6ft</p> <p>Maximum arrest force: 1,800lb</p>
List required materials needed to make the product, including materials of product components	steel plate
Are there applicable certification requirements?	No
Are there applicable regulations?	Yes
Details	Needs to be compliant with OSHA1926.502 / 1910.66, preferably also ANSI Z359.1-07 / A10.32-2012
Are there any other standards, requirements, etc.?	No
NAICS 1	238160 Roofing Contractors
NAICS 2	
Additional Technical Comments	

## Section 4: Business Information

Estimated potential business volume	75 units for one specific project
Estimated target price / unit cost information (if unavailable explain)	\$25.00 per unit
When is it needed by?	09/23/2024
Describe packaging requirements	Each kit individually wrapped
Where will this item be shipped?	Springfield, Oregon

## Additional Comments

Is there other information you would like to include?	<p>Department of Commerce Point of Contact information for questions including BABA/Buy American compliance:</p> <p>Housing and Urban Development (HUD) Community Development Block Grant (CDBG) - City of Eugene Melanie Svenrou (City of Eugene) msvenrou@eugene-or.gov</p> <p>Please copy <a href="mailto:scouting@nist.gov">scouting@nist.gov</a> on all correspondence</p>
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# Anchors RS 10 Series

## OVERVIEW

The RS-10 is a low-profile design anchor and does not detract from the roof. Exactly half the size of our Retro-Fit anchor, this makes for an ideal installation for hip ridges and shed roofs. It is a single sided D-ring anchorage device that is installed at the ridge, hip-ridge or in the field for permanent or temporary use. The 10" overall length is ideal for shingle type roofs allowing the anchor to be attached over the roofing material. This permanent, low profile anchor comes with stainless steel fasteners, butyl strip and comprehensive installation instructions.

# Anchors • RS 10 Series

## No. 2813 RS-10™ Anchor - Retail

- Permanent or temporary use
- Numerous options for mounting and fastening
- 1 ea. 20 gauge Stainless Steel anchor
- 3/16" d fasteners
- 8 ea 3" stainless steel spiral nails
- 7" factory attached butyl strip
- Instruction Manual
- Rated for fall arrest

Pkg. Wt. 1 lb  
Master Pack Qty: 50  
Pallet Qty: 500



## No. 2813B RS-10 Anchor - Bulk

- Permanent or temporary use
- Numerous options for mounting and fastening
- 1 ea. 20 gauge Stainless Steel anchor
- 3/16" d fasteners
- 8 ea 3" stainless steel spiral nails
- 7" butyl strip
- Instruction Manual
- Rated for fall arrest

Pkg. Wt. 1 lb  
Master Pack Qty: 20  
Pallet Qty: 500



**Device:** Fall Arrest Anchor  
**Material:** 20 gauge 430 Stainless Steel  
**D-Rings:** 3,600-pound proof loaded, Dacromet Coated  
**Install Hardware:** Stainless Steel spiral shank nails  
**Min. Tensile:** 5,000 pounds  
**Working Radius:** Direction of Roofing Slope  
**Specification Use:** 1 person Fall Arrest, 1 person Fall Restraint  
**Max Weight:** 340 pounds with tools  
**Engineering:** 3rd Party Certified  
**Compliance:** OSHA 1926.502, 1910.66, ANSI Z359.1-07, A10.32-2012



# SUPER ANCHOR SAFETY®

## RS Series Anchors Instruction/Specification Manual 06-2021

ENGLISH  
VERSION

**!WARNING TO USER!**  
You are required to read and use the Instruction/ Specification manual supplied at the time this device was shipped. Improper use and installation can result in serious injury or death. Follow inspection requirements before each use.

### Material Specifications

**Anchor Leg:** 430 Stainless Steel  
RS-10/20/Retro Fit: 2 Layers 20ga.  
**D-Ring:** Stamped Dacromet™ or yellow zinc plated steel.  
**Fastener Holes:** 3/16" d.  
**Anchor Leg/D-Ring Min. Tensile Strength:** 5,000lb(22.5kN).  
**Stamp Marks:** DOM Y/M and mfg.

### Certifications

**Compliance:** OSHA1926.502/1910.66  
ANSI Z359.1-07/A10.32-2012  
**Canadian 3<sup>rd</sup> Party Engineering:**  
Certified by a member of  
l'Ordre des ingénieurs du Québec.

### Specified Use

Fall arrest or fall restraint PPE anchorage.  
Permanent or temporary installation on wood framed structures.  
May be used on metal decking min. of 24ga. w/SAS engineering.  
**User Specifications:** 1 person max user wt. 340lb(154kg).  
**Free Fall:** Max length 6ft(1.8m). **Max. Arrest force:** 1,800lb(8kN).  
Energy Absorber required specified for the user's weight.

### Non-Specified Use

Do not use for window washing, suspended work or Horizontal Lifeline Systems. Do not attach to the underside or side of a top chord or framing.

### Fastener Specifications

Supplied with 3.0" Spiral SST nails. Optional SAS fasteners (see Table 1).  
**CAUTION!** DO NOT substitute with other types of fasteners unless they have been engineered by a qualified person or supplied by SAS.  
**Screws:** Use the lowest torque setting to flush mount with leg surface.  
**WARNING!** Always use eye protection when installing fasteners. DO NOT install screws by hammering. DO NOT reuse fasteners specified in this manual.

### Fastener/Anchor Inspection Prior to Use

At the time of first installation, check the underside of the sheathing at anchor location and inspect for blow outs as shown at Fig. 4. Before using the anchor, always confirm it has been correctly installed. Remove from service if any of the following conditions are present:

- 1) Deformation of D-Ring or Shackle.
- 2) Missing fasteners (see Table 1-A).
- 3) Fastener Blow-outs (see Fig. 4).
- 4) Subjected to a free fall.

### Anchor Installation over Wood Framing

Framing must be capable of supporting 5,000lb(22.5kN) or 2 times the intended fall protection load. Install over min. 2x4 top chord with 7/16" or thicker OSB or Plywood sheathing that is structurally sound and free of defects or damage. Position leg over top chord center and install leg fasteners as shown at Fig. 3. Install leg off-center fasteners at a slight angle toward the rafter center Fig. 3.1. Defective anchor installations must be removed and installed at a different location using new fasteners. **WARNING!** DO NOT install over open framing without sheathing.

Table 1 SAS Supplied Fasteners/Service Load

Fasteners			▲Max Service Load Applied	
Part No.	Min.	Types	0°-30° Angle	Over 30°
RS-10	6	3.0" SST Spiral Nails *3.0" Screws HH/BH	3,600lb(16kN) See Fig.5	Fall Restraint Use Only! No risk of Free Fall
Retro-Fit	8			
RS-20	8			

\*HH=12ga Hex Head / BH=Bugle Head

▲ SAS energy absorber MAF = 1,800lb(8kN) + safety factor x2.  
Other mfg. energy absorbers may be used when compatibility is ensured by a qualified or competent person.

Fig. 1

### RS-Anchor Models

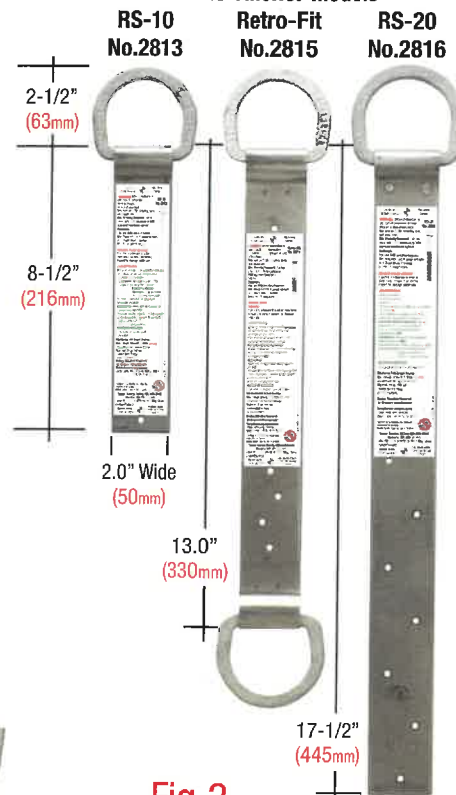
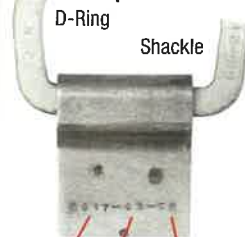


Fig. 2

### Stamp Marks



Year Month Mfg.  
DOM: Date of mfg.

Fig. 3.1

### Fastener Locations

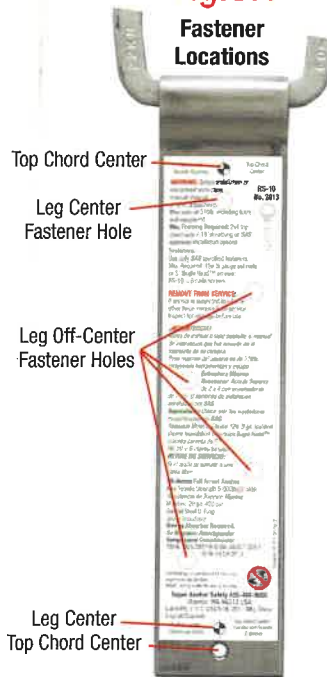


Fig. 3

### Anchor/Fastener Attachment

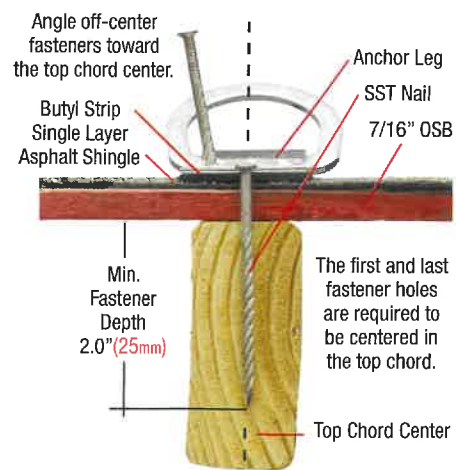
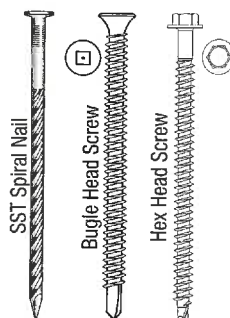


Fig. 4

### Fastener Types



**Fastener Blow Outs**  
Remove anchor and locate to another position.

**WARNING!**  
DO NOT USE ANCHOR WITH BLOW-OUTS!

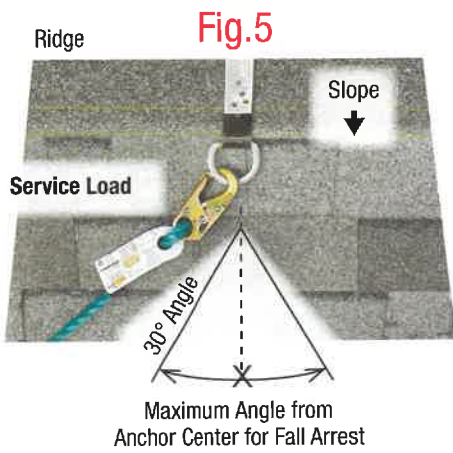


Fig. 5

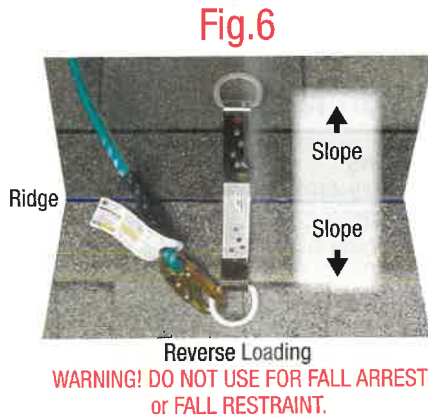


Fig. 6

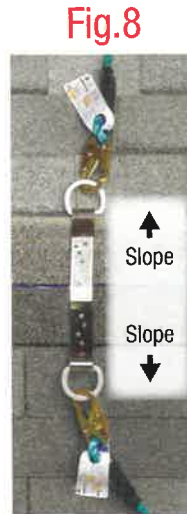


Fig. 8



D-Ring Exposure Fig. 9

**Direction of Load**

**Fall Arrest:** When exposed to fall hazards do not exceed a 30° angle from the anchors parallel to slope position as shown at Fig. 5, 10a. Do not use on slopes greater than 8/12.

**Fall Restraint:** No exposure to a free fall, sliding fall, or static loading of the anchor and at least 6ft from any gable edge, perimeter edge or other fall hazard.

See Fig. 7, 13.

**Steep Slope Definition:** OSHA 3146-05R 2015: slopes greater than 4/12. RS series anchors are not recommended for work that requires prolonged tension on the anchor and must not be used for work positioning.

**Reverse and Side Load Warning!**

As shown at Figs. 6, and 10b, in the event of a fall, the anchor fasteners may unzip (pull out) resulting in a failure to arrest a fall. Do not side load when exposed to a fall hazard, static loading, or slopes over 8/12.

**Anchor Location/Spacing**

The maximum spacing between anchors for a non-engineered system is 8ft(2.4m). Install anchors at the ridge or in the field at a minimum of 6ft from gable edges or openings in the roof or work surface as shown at Fig. 13. Do not install over hips. Engineered spacing between anchors is calculated using the free fall distance, rafter length, and 30° service load. Consult SAS anchor location plan service for an engineered system. **User Engineering:** End users may engineer their own anchor spacing specifications when performed by a qualified or competent person. Documentation of the engineering is required. **Vertical Surfaces:** Sheathing must be in place and the wall fully braced to support the intended fall protection load. Use only RS-20 anchors attached with Bugle or Hex Head screws.

**Permanent Installation over Roofing Membrane**

Use SAS butyl strips, a user supplied waterproof membrane or a compatible caulking between the anchor leg underside and the roofing material surface as shown at Fig. 3. They are recommended to cover the fastener heads and anchor leg sides for low slope, high wind areas or where buildups of surface debris may occur.

**Re-Roofing:** Table 1 fasteners are specified for a single layer of roofing material. The min. fastener depth penetration is 2.0”(25mm) as shown at Fig. 4. Longer length screws may be required for heavier materials or multiple layers. Contact SAS for longer fastener specifications.

**RS-20 Specified for Tile Roofing**

Install anchors on each side of the roof at the ridge or field. Conform the anchor leg to the tile profile as shown at Fig. 11. Plan the D-ring exposure as shown at Fig. 12 before installing the anchor. Use the 8 fastener holes at the top of the anchor leg.

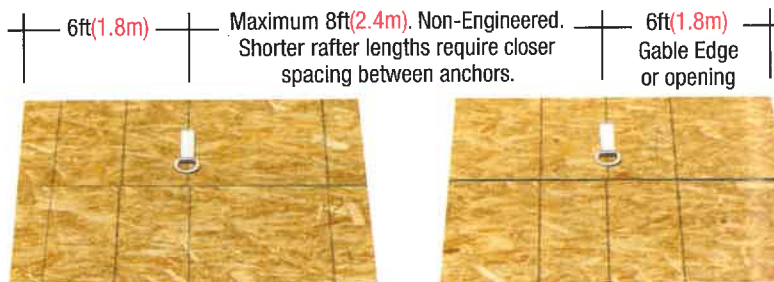


Fig. 13

Anchor Spacing

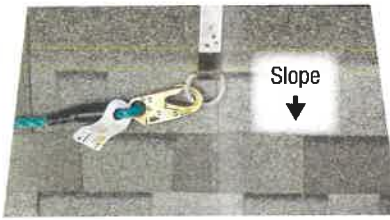


Fig. 7



Fig. 10a



Fig. 10b



Conform Anchor Leg to the tile profile.



D-Ring exposure

**Note:** It may be necessary to remove lugs or weather blocks from the underside of the succeeding tile course so it fits properly over the anchor leg at the head lap. Caulking may be necessary to provide protection against wind driven rain, snow or dust.



## SUPER ANCHOR SAFETY

### Super Anchor Safety -

OSHA 1926:502 Fall Arrest Anchorage notes regarding 5,000 pounds.

Super Anchor Safety is told by many builders, contractors, and design professionals that their structure must be able to withstand a 5,000 pound force load. This is true in part, but there is more to the OSHA Standard that must be taken into account – especially in the field of residential construction. To make sense of it all, I use the following information to help clarify in the minds of those that I am training so that they understand the regulation as set forth by OSHA. Here is how the standard reads:

#### Fall Protection System Criteria and Practices – 1926:502

1926:502(d)(15)(i-ii)

Anchorage used for attachment of personal fall arrest equipment shall be independent of any anchorage being used to support or suspend platforms and be capable of supporting at least 5,000 pounds per employee attached *or shall be designed, installed, and used as follows: As part of a complete personal fall arrest system which maintains a safety factor of at least two;* under the supervision of a qualified person

Yes, OSHA requires a 5,000 pound anchor attachment point, but they also in the same sentence allow you to engineer around the 5,000 pound minimum if need be. This is nothing new and has been in the standard since its inception some 30 years ago. What does a safety factor of at least two mean? In order to figure this out we need to have a baseline starting point. Let's take a look at the following numbers:

- 1) The max allowable free fall is 6':
  - a. A 6' free fall generated on average 2,500 pounds of force load'
  - b. The above number is based on a 220 pound worker
  - c. That is how OSHA came up with 5,000 pounds (a safety factor of two, or  $2,500 \times 2 = 5,000$  pounds)
- 2) The max allowable force load that can be exerted on the employee is 1,800 pounds:
  - a. This can be confusing because a typical 6' fall can be up to 2,500 pounds
  - b. There are two ways to reduce the force load on the user and the system:
    - i. Eliminate/Limit/Reduce your free fall distance
    - ii. Use a shock absorbing lanyard in your system
- 3) Technical Numbers & Data:
  - a. A shock absorber limits a 6' free fall force load to 900 pounds
  - b. Working in fall restraint (no free fall) limits your max load to about 400 pounds
  - c. A typical MSR 2x4 top chord truss breaks at about 3,400 pounds
- 4) Residential Scenario:
  - a. A framing contractor wants to tie-off to an anchor point installed onto a 2x4 truss. The question comes up that the 2x4 truss is not designed for a 5,000 pound force load. Good point, but it does not need to be because the standard says 5,000 pounds or a safety factor of at least 2. The framing is using a Personal Fall Arrest System with a harness, lifeline, and a shock absorber. If he takes a full 6' maximum allowable fall over the eave or gable he will generate a force load of 900 pounds. A safety factor of 2 would equal 1,800 pounds. We just took the OSHA standard from the perceived 5,000 pound anchorage point and reduced it to 1,800 pounds by reading and applying the whole standard.

Super Anchor Safety is dedicated to helping all those in our industry understand how to best protect their workers. This information is designed to help everyone understand and apply the regulations that they work under every day. Please contact us if you ever need further information on any realm of wood framed fall protection. We can be reached at 425-488-8868 or at [paul@superanchor.com](mailto:paul@superanchor.com)

Visit us on the Web at [www.superanchor.com](http://www.superanchor.com)