

Written Project Description

Tear off shingle porch roof and replace with 24 Gauge Standing Seam Metal Roof

Color Photographs of the Building Areas Involved







1. Product Name

Kynar 500[®] or Hylar 5000[®] coated aluminum-zinc alloy (Galvalume) or aluminum architectural sheet metal flashing, flat sheet, roofing and wall panels.

2. Supplier

NB Handy Company
65 10th Street Lynchburg, VA 24504
(877) 495-7663
Local: (434) 847-4495
Fax: (434) 847-2404
www.sentrigard.com
Manufactured by:
Sentrigard Architectural Metals

3. Product Description

Basic Use:

The NB Handy Company is a leading provider of steel and aluminum roofing, wall panel and flat sheet products for commercial, industrial and architectural applications.

Limitations:

Because roofing wall panel and flat sheet products are prefinished material, care must be exercised during fabrication and erection to avoid damage to the finished surface. Care must be taken to avoid scratching or marring the finish. A protective strippable film is available upon request.

Composition and Materials:

26, 24, 22, 20 or 18 gauge, minimum Grade 50 (50ksi yield strength) structural steel with AZ50 aluminum zinc alloy coating, both conforming to ASTM A792, or 0.032", .040", 0.050" or .063 alloy 3105 – H14, H20, H22 + H24 (18 ksi yield strength) aluminum alloy conforming to ASTM B209.

Sizes:

Reference availability chart on page 4.

Colors:

31 colors finished with SentriClad TM (Kynar 500[®]/Hylar 5000[®]) are available: Regal White, Bone White, Almond, Sandstone, Sierra Tan, Medium Bronze, Mansard Brown, Dark Bronze, Extra Dark Bronze, Patina Green, Classic Green, Hartford Green, Teal, Military Blue, Slate Blue, Regal Blue, Terra Cotta, Banner Red, Colonial Red, Brandywine, Dove Grey, Slate Gray, Charcoal, Matte Black, Stone White, Bright Silver, Silversmith, Champagne, Pewter and Bright Copper. Other finishes and colors are available.

Finish:

Medium gloss range 20–35, depending upon color. Low gloss is available- please consult with your sales representative. Stucco embossed finish available; minimum quantities apply; Primer coat is 0.2 mils thickness applied to both sides of the previously prepared bare metal prior to finish coat application.



4. Technical Data

- **Accelerated Weathering** - ASTM D 4587 3000 total hours, 8 chalk rating, 5 E on hot dipped galvanized steel, galvalume and aluminum. ASTM G 5000 total hours, 8 chalk rating, 5 E Hunter units max color rating on both steel and aluminum.
- **Salt Spray** - ASTM B 117 1000 total hours, scribe rating 7 (1/16") (1.6mm), field rating 10, not blisters on hot dipped galvanized steel and galvalume. 3,000 total hours, scribe rating 10 - no creepage, field rating 10 - no blisters on aluminum.
- **Humidity** - ASTM D 2247 2,000 total hours, rating 10 - no blisters on hot dipped galvanized steel and galvalume. 3,000 total hours, rating 10 - no blisters on aluminum.
- **Formability** - ASTM D 4145 2T on hot dipped galvanized steel, galvalume and aluminum.
- **ASTM D 522** - (Elongation over 1/8" mandrel) No cracking or loss of adhesion on hot dipped galvanized steel, galvalume or aluminum.
- **Pencil Hardness** - ASTM D 3363 HB-2H on hot dipped galvanized steel, galvalume and aluminum.
- **Abrasion Resistance** - ASTM D 968 5080 liters of falling sand on hot dipped galvanized steel, galvalume or aluminum.
- **Specular Gloss** - ASTM D 523 20- 35 at 60° on hot dipped galvanized steel, galvalume and aluminum. Lower gloss coatings are available.
- **Reverse Impact** - ASTM D 2794 3 x Metal thickness in inch-lbs, no loss of adhesion on hot dipped galvanized steel or galvalume. 1 1/2x metal thickness in inch-lbs, no loss of adhesion on aluminum.
- **Flame Test** - Class A rated coating on hot dipped galvanized steel, galvalume and aluminum.

Approvals

Consult manufacturer for current industry approval information.

Environmental Considerations

Metal wall panels and roofing systems are the cladding materials of choice for "green" construction. SentriClad™ metal products are recyclable upon final disposal and these products are largely produced of recycled content. Call your sales representative to learn which products qualify to earn LEED points.

Physical/Chemical Properties

Test reports and additional product performance data are available upon request.

Fire Performance

Sheet metal roofing and wall panels are inherently fire resistant. UL assembly fire resistance ratings of 1,2 and 3 hours are available. Consult with N.B. Handy for technical support.

5.Storage / Installation

Store architectural metal roof panels properly and adequately to protect from damage on the jobsite or in the warehouse. Protect flat sheet, roofing and wall panels from adverse job conditions, such as moisture, prior to installation.

Protect flat sheet roofing and wall panels from other trades after installation. Factory applied protective strippable film must be removed immediately upon material installation. Accessories and trim components should be factory fabricated or field formed in finish and metal thickness, same as the panels, except as otherwise noted on the drawings.

Verify that the substrate layout complies with the shop-drawing layout. Do not start work until all unsatisfactory conditions have been corrected.



Methods

Flashings should be shop fabricated from material that is the same thickness and finish as the panels to which they are attached. Where practical, flashings should be furnished in 10' (3 m) lengths. Exposed flashings should be lapped 6" (152mm). Use premolded polyethylene or EPDM closures to match the profile of the panel in lengths as supplied by the manufacturer. Caulking should be polyether or polyurethane where it is exposed to the weather and there is no thermal movement. Caulking should be non-skinning, nonhardening gun grade butyl sealant or butyl sealant tape with a minimum thickness of 3/32" where it is concealed and where thermal movement must be accommodated. All caulking or sealing should be applied in a neat manner with excess caulking or sealant removed from exposed surfaces. All architectural metal roofing and wall panel systems should be installed plumb, straight and true to adjacent work. Polyethylene or EPDM profile closures should be provided and used as needed. No perforations should be made in roofing, wall panels or flashings by fasteners except as shown on the drawings. Complete installation recommendations are available from the manufacturer.

Precautions

Observe all industry recognized jobsite safety practices. Oil Canning is a characteristic of light gauge architectural metals and is NOT a flaw and therefore not considered a cause for rejection.

Building Codes

Current data on building code requirements and product compliance may be obtained from N. B. Handy Technical Services. Installation must comply with the requirements of the authority having jurisdiction (code officials).

6. Availability and Cost

Availability:

SentrClad™ products are sold through our network of NB Handy service centers in optimized and strategic locations throughout the Mid-Atlantic and Southeastern United States.

Cost:

Budget installed cost information and life cycle costing information may be obtained from NB Handy.

7. Warranty

The SentrClad™ paint finish has a manufacturer's standard 30-year warranty. See full warranty details for specifications.

8. Maintenance

Architectural metal roof, wall panel and flashing systems offer very low maintenance. Periodic inspection to ensure panel, sealant and flashing integrity is advisable. Depending on local environmental conditions, occasional pressure washing using a mild detergent solution can be effective in removing dust and dirt.

9. Technical Services

A staff of factory trained authorized and credentialed service personnel offers design assistance and technical support. For technical assistance, contact N.B. Handy.