

SECTION 05586: COLUMN COVERS

PART 1: GENERAL

1.01 SCOPE

A. SECTION INCLUDES:

1. The extent of Column Covers as indicated on the drawings and in these specifications.
2. Column Cover requirements include the following components:
 - a. Vertical Reveal Column Covers. Column Cover mounting system including anchorages, shims, sealants, and misc. framing. No exposed fasteners will be accepted.
 - b. Metal-Lok Butt Joint Column Covers. Column Cover mounting system including anchorages, shims, and misc. framing. No exposed fasteners will be accepted.
 - c. Column Cover top & bottom trim rings, reveal trims, and batten strips.
 - d. Sound deadening tape

B. RELATED DOCUMENTS:

Drawings and general provisions of the Contract, including General and Supplementary Conditions, Division 1 Specification Sections, and Technical Specification Divisions 2 through 16 apply to this Section.

C. RELATED WORK SPECIFIED ELSEWHERE:

1. Section 05100: Structural Steel
2. Section 05400: Cold Formed Metal Framing
3. Section 07920: Caulking and Sealants
4. Section 07200: Sound Deadening Tape
5. Section 07250: Sprayed on Fireproofing

1.02 QUALITY ASSURANCE

1. Column Cover Fabricator shall have a minimum of 10 years experience in the manufacturing of this product.
2. Installer: Shall have experience installing Column Cover system similar to that required for a period of not less than 5 documented years.
3. Maximum deviation from vertical and horizontal alignment of erected panels: ¼ inch in 20 feet non-accumulative.
4. Column Cover fabricator/installer shall assume undivided responsibility for all components of the systems including, but not limited to attachment to sub-construction, panel to panel joinery, panel to dissimilar material joinery, and joint seal associated with the Column Cover system.
5. Shop Drawings shall be prepared by the fabricator of the Column Cover system.

1.03 SUBMITTALS

A. SUBMITTALS:

1. Submittals shall be in conformance with this section and with the general conditions.

B. SAMPLES:

1. Panel System Assembly: Two samples of typical assembly, 12" x 12" minimum.
2. Two samples of each color or finish selected, 3" x 4" minimum.

C. SHOP DRAWINGS:

Submit shop drawings showing project elevations, fastening and anchoring methods, detail and location of joints, sealants including joints necessary to accommodate thermal movements and construction tolerances, trim, and accessories.

1.04 WARRANTY

- A. SUBMIT IN ACCORDANCE WITH DIVISION 1 – CLOSEOUT SUBMITTALS.
- B. WORKMANSHIP WARRANTY:
1. Written warranty signed by manufacturer and installer warranting that portions of the work involving metal panels are of good quality, free from defects, and in conformance with the requirements of the Contract Documents. Further guarantee to repair or replace defective work during a one year period following Substantial Completion of the work.
 2. Defective is defined to include failure of the system to meet structural performance requirements and/or permanent deformation resulting from pressures within the design criteria.
- C. FINISH WARRANTY:
1. Written warranty signed by manufacturer warranting that the painted finish will not develop excessive fading or excessive non-uniformity of color or shade, and will not crack, pit, peel, corrode, or otherwise fail as a result of defect in materials and workmanship. Further guarantee to repair or replace defective work during a ten year period following substantial completion of the work. Upon notification of defects within the warranty period, make necessary repairs or replacement at the convenience of the owner.
- D. WARRANTY SHALL SPECIFICALLY INCLUDE THE APPLICABLE WORK OF THE FOLLOWING SECTIONS OF THE SPECIFICATIONS.
1. Section 07900 - Joint Sealants

1.05 DELIVERY, STORAGE AND HANDLING:

- A. Deliver units and other components so they will not be subject to damage or deformation. Deliver Column Cover units in crates designated for specific locations on the building as coordinated between GC and installer. Crates shall be able to withstand hoisting loads relevant to the project.
- B. Storage: Stack components off the ground/floor on suitable skids in fully enclosed space. Protect against warpage, scratches, damage from moisture, exposure to direct sunlight and other surface contamination.
- C. Handling: Exercise care in loading, unloading, storing, and installing units so as to preclude bending, warping, twisting, and surface damage.

PART 2: PRODUCTS

2.01 COLUMN COVERS

- A. COLUMN COVER SYSTEMS:
1. Fabricators offering products which may be incorporated in the work, but are not limited to, the following:
 - a. Basis of Design is **Metalwerks® Vertical Reveal Column Covers and/or Metal-Lok Butt Joint Column Covers** by Metal Sales & Service Inc. of Kennett Square, Pa 19348 (800-321-7816 or website: www.metalwerksusa.com)
 2. Vertical Reveal Column Covers: Curved or elliptical shape column covers can be rolled as small as 12 ½" in diameter with a maximum length of 16'. Square and rectangular shape covers can be formed up to 13' optimal lengths and widths are restricted only by flat stock availability. Other lengths are available, consult Sales Dept. for limitations. Longer lengths of all column covers are available by adding joints.
 - a. Vertical Reveal Column Covers are recommended for both interior and exterior applications.
 - b. Column Cover joints will be sealed in the field with a nominal 5/8" joint sealer consisting of backer rod and caulking as recommended by the panel system supplier to meet system performance requirements.
 - c. Column Cover fasteners shall be stainless steel or cadmium plated for attachment in size and spacing as dictated by structural requirements.
 - d. Cold formed metal framing, as required, formed to sizes indicated in minimum #16 gage G-90 galvanized steel.
 3. Metal-Lok Butt Joint Column Covers: Curved or elliptical shaped column covers can be rolled as small as 12 ½" in diameter with a maximum length of 16'. Square and rectangular shape covers can be formed to 13' lengths and widths are restricted only by flat stock availability. Other lengths are available, consult Sales Dept. for limitations. Longer lengths of all column covers are available by adding joints.

- a. If weather tightness is an issue we do not recommend using this design on an exterior application.
- b. The metal-lok design requires a minimum ¾" gap at the top of the column cover for the Metal-Lok keyhole design installation.
- c. Column Cover fasteners shall be stainless steel or cadmium plated for panel attachment in size and spacing as dictated by structural requirements.
- d. Cold formed metal framing, as required, formed to sizes indicated in a minimum #16 gage G-90 galvanized steel.

2.02 MATERIALS

A. GENERAL:

1. Select materials for surface flatness, smoothness, and freedom from surface blemishes where exposed to view in the finished system.
2. Aluminum Sheet with minimum thickness of .125" with strength and durability properties specified in ASTM B 209 for 3003H-14 or 5005-H32AQ alloys.
3. Stainless Steel Sheet shall be type 304 in thicknesses of #18 gage, #16 gage, and #14 gage. Stainless steel is available in various textures and finishes, consult Sales Dept. for options.
4. Sound deadening tape, shipped loose to be field applied.

2.03 FINISHES

- A. Fluoropolymer Two or Three Coat Coating System: Manufacturer's standard two or three coat, thermocured system composed of specially formulated inhibitive primer, fluorocarbon color coat, and a clear fluorocarbon topcoat (applicable with three coat system). Both color coat and clear topcoat shall contain not less than 70% polyvinylidene resin by weight in compliance with AAMA 2605 for testing, performance, and application procedures.
 1. Panels shall be chemically etched by an appropriate cleaner in accordance with manufacturer's written instructions.
 2. Apply acid resistant primer to cleaned aluminum. Thickness range; 0.20 to 0.30 mils.
 3. Apply polyvinylidene fluoride (PVF2) resinated color coat. Thickness range; 0.8 to 1.2 mils.
 - a. Kynar 500. Must be applied by certified Kynar coater.
 - b. Hylar 5000. Must be applied by certified Hylar coater.
 4. Apply clear top coat finish as extra protection, no less than 0.8 mils thick. Comply with AAMA standards.
 5. Color: Match owner's representatives' sample, or if none, from manufacturer's standard selection.
 6. Properties: Meet or exceed requirements of AAMA 2605.
 7. Stainless Steel sheet shall receive a factory applied finish, #2B, #4, #6, & #8 mill polished finishes. Specialty finishes and textures available, consult Sales Dept.

PART 3: EXECUTION

3.01 INSPECTION

1. Surfaces to receive Column Covers shall be sound, clean, dry and free from defects detrimental to work. Notify contractor in writing of conditions detrimental to proper and timely completion of the work. Do not proceed with erection until unsatisfactory conditions have been corrected.
2. Surfaces to receive Column Covers shall be structurally sound as designed by the project Architect/Engineer.

3.02 INSTALLATION

1. Column Covers shall be erected plumb, level, square, true to line, securely anchored and in proper alignment to work of other trades.
2. Column Covers shall be erected in accordance with an approved set of shop drawings.
3. Do not cut, trim, weld, or braze parts during erection in a manner which would damage the finish, decrease strength, or result in visual imperfection or a failure in performance. Return parts which require alteration to shop for re-fabrication, if possible, or for replacement with new parts.
4. Separate dissimilar metals where needed to eliminate the possibility of corrosive or electrolytic action between materials.

5. Installation Tolerances: Shim and align panel units within installed tolerances of 1/4 inch in 20 feet, non-cumulative, on level/plumb/slope and location/line as indicated, and within 1/16 inch offset of adjoining faces and of alignment of matching profiles.

3.03 ADJUSTING AND CLEANING

1. Remove and replace panels damaged beyond repair as a direct result of the panel installation. After installation, panel repair and replacement shall become the responsibility of the General Contractor.
2. Repair panels with minor damage.
3. Remove protective film as soon as possible after installation.
4. Any additional protection, after installation, shall be the responsibility of the General Contractor.
5. Final cleaning shall not be part of the work of this section.