SECTION 07 65 00

FLEXIBLE FLASHING SYSTEM FOR MASONRY VENEER

PART 1 - GENERAL

1.01 SUMMARY

A. Section includes through wall masonry flashing system components for installation over sheathing where spray foam cavity insulation is the basis of design.

EDIT RELATED SECTIONS TO INCLUDE ONLY SECTIONS IN PROJECT MANUAL.

B. Related sections:

1. 07 21 29 Sprayed Cavity Wall Insulation
2. 07 10 00 Dampproofing and Waterproofing
3. 04 05 23 Masonry Accessories
4. 04 05 23.16 Masonry Embedded Flashing
5. 04 05 23.19 Masonry Cavity Drainage, Weepholes and Vents
6. 04 20 00 Unit Masonry Veneer (Brick, CMU, Stone)
7. 04 26 13 Masonry Veneer
8. 04 21 13.13 Brick Veneer Masonry
9. 04 22 00.13 Concrete Unit Veneer Masonry
10. 04 22 23 Architectural Concrete Unit Masonry
11. 04 43 13.13 Anchored Stone Masonry Veneer
12. 04 42 00 Exterior Stone Cladding
13. 04 73 13 Calcium Silicate Manufactured Stone Masonry
14. 04 72 00 Cast Stone Masonry
15. 05 41 00 Structural Metal Stud Framing
16. 06 10 00 Rough Carpentry

C. Alternates: This Section includes deletion of accessory metal drip edge where specified or required. Flexible metal flashing and flexible membrane flashings specified in this section can be extended to flush with face of masonry wall in conformance with industry standards, without additional metal drip edge.

1.02 REFERENCES & STANDARDS

A. Standards of the following as referenced:

1. Brick Industry Association (BIA)
   a. BIA Tech Note 7, Water Penetration Resistance - Design and Detailing
   b. BIA Tech Note 28B, Masonry Veneer on Steel Stud Backup
2. ASTM D412 Standard Test Methods for Vulcanized Rubber and Thermoplastic Elastomers — Tension, Elongation
3. ASTM D624 Standard Test Method for Tear Strength of Conventional Vulcanized Rubber and Thermoplastic Elastomers
4. ASTM D146 Standard Test Method for Low Temperature Flexibility
5. ASTM D471 Standard Test Method for Rubber Property—Effect of Liquids, elevated temperature, fluid immersion.

1.03 DEFINITIONS

A. Terms:

1. Cavity wall flashing: Same as flexible flashing.
2. Foundation sill flashing: Same as flexible flashing.
3. Flexible flashing: Water-proof material typically used in cavity wall construction to contain and assist in the proper water drainage that may penetrate wall system veneer. Other materials may be required to constitute the system.
4. Head and sill flashing: Same as flexible flashing.
5. Through-wall flashing:
   a. Generally considered the same as flexible flashing
   b. Rare definition referred to full-width cap flashing under copings or wall caps.

1.04 SUBMITTALS

A. Product data: Indicate material type, composition, thickness, and installation procedures.

B. Samples: All components specified in Part 2.01.A Products, submit physical samples of each. Flashing material specified in Part 2.01.B, submit two 18" wide x 36" long samples of the flashing and two samples each of all components related to its installation.

C. Product Quality & Environmental submittals:

1. Certificates:

   a. Indicate materials supplied or installed are asbestos free.
   b. Indicate recycled content: 60%.
   c. Certify metal and/or membrane flashings submitted contain no rubberized asphalt mastic or asphalt impregnated fabric.

SPECIFIER'S NOTE:	DECIDE IF THIS PROJECT WILL REQUIRE METAL FLEXIBLE FLASHING OR MEMBRANE FLEXIBLE FLASHING. IF METAL IS CHOSEN, DELETE ALL FOLLOWING REFERENCES TO MEMBRANE FLASHING.

2. Performance Attributes of Metal Flashings

   a. Tensile strength: 100,000 + psi
   b. Puncture Resistance: 2,500 + psi
   c. When tested as manufactured, product resists growth of mold pursuant to test method ASTM-D3273-94.
   d. Fire Rating: Class A, ASTM E84 Heat resistant: Will not degrade in high heat applications.
   e. Non-asphaltic only.

3. Performance Attributes of Membrane Flashings

   a. Chemical resistance: Not effected by high alkaline environments typical of masonry construction; will not deteriorate or harden with longevity or UV ray exposure.
   b. Elongation (MD) ASTM D412 100%
   c. Tensile Strength (MD) ASTM D412 1,200 psi min.
   d. Tear Strength (MD) ASTM D624 25 ppi
   e. Low Temperature Flexibility ASTM D146 0º Pass
   f. Water Absorption ASTM D471 Less than 0.1%
   g. No rubberized asphalt mastic.

1.05 QUALITY ASSURANCE

A. Qualifications:

1. Manufacturer: Provide flashing system components able to withstand 300º F without changing the long term performance of these components.

2. Manufacturers of flexible flashing system components, insulation, air/vapor barrier and sealant shall provide mutual letters of compatibility for these products in combination with each other.

1.06 WARRANTY

A. Special warranty:

1. Manufacturers: Warrant flashing system component materials for life of masonry wall.
2. Begin warranty at Date of Substantial Completion.

PART 2 - PRODUCTS

2.01 MANUFACTURED UNITS

A. Flashing Support System

1. Basis of Design for all locations to receive flashing, whether metal or membrane: Flash Trac: http://www.flashtracsystems.com/ , with the following system components:

a. Flash Trac Wall Bracket: Color: White. Length: 5’ & 8’. Custom lengths are available with advance notice.
b. Flash Trac Retaining Rod: Color: White. Length: 5’ & 8’ feet. Custom lengths are available with advance notice.
c. Flash Trac Installation Tool: Holds Retaining Rod in the correct position for ease of membrane and rod installation.
d. Flash Trac internal and external corner returns.
e. Flash Trac Cleaning Tool: Used to remove the protective tape and overspray from face of Flash Trac Bracket prior to flashing installation (if necessary).
f. Flash Trac Wall Bracket Alignment Clip: Holds ends of Flash Trac Wall Bracket sections in proper alignment before spray foam insulation is applied. Once spray foam insulation has been applied, Alignment Clips can be removed and reused.
g. No substitutions accepted for Flash Trac flashing support components.

B. Flexible flashing: Choose metal or membrane here. **SPECIFIER’S NOTE:** If Specifying Authority prefers metal flashing for superior durability, delete from this point on all references to membrane flashing.

1. Metal Flashing: Products of manufacturers listed below meeting indicated standards and specified manufacturer's product data characteristics and installation instructions, are acceptable for use, subject to compliance with specified requirements:

a. York Manufacturing, Inc.: Multi-Flash SS stainless steel
b. York Manufacturing, Inc.: Multi-Flash copper
c. York Manufacturing, Inc.: Flash Vent
d. STS Coatings, Inc.: Gorilla Flash CF
e. Wire-Bond, Inc.: Copper Seal
f. Other flashing provided they meet performance characteristics listed in paragraph 1.04.C.2

2. Membrane Flashing: Products of manufacturers listed below meeting indicated standards and specified manufacturers' product data characteristics and installation instructions, are acceptable for use, subject to compliance with specific requirements:

    a. Hyload Flashing, Inc.: Hyload Flashing Membrane
    b. Hohman & Barnard: Epra-Max EPDM
    c. Carlisle Coatings & Waterproofing: Pre-Kleened EPDM
    d. Other flashing provided they meet performance characteristics listed in paragraph 1.04.C.3.

PART 3 - EXECUTION

3.01 INSTALLATION

A. Flash Trac installation:

1. **Note:** The Flash Trac Bracket comes with a protective tape across the opening. **DO NOT** remove this tape until all spray foam operations have been completed and you are actually about to install the flashing. This keeps the insulation and other contamination from getting into the track.
2. After exterior sheathing has been installed, install Flash Trac Brackets continuously along all horizontal locations to receive flashing, using self-tapping fasteners compatible with the sheathing/studs.
3. It is recommended that screws be installed every 16 to 24 inches depending on studding. Small pieces should have at least two and preferably three screws installed.
4. If 18" flashing is used the receiver would be installed from 9" – 11" above the shelf/angle to the top of the opening where the rod is inserted. This wall make up would be 4" veneer, 1" – 3" clear space, 9" – 11" vertical flashing and 2" of flashing to wrap around the retaining rod.
5. If 24" flashing was used the receiver would be installed from 15" – 17" above the shelf/angle. This wall make up would be 4" veneer, 1" – 3" clear space, 15" – 17" flashing height and 2" of flashing to wrap around the retaining rod.
6. When installing two or more pieces of Flash Trac receiver, each piece should be butted end to end. The face of each joint should have a joint clip installed on the face of the track to help hold the two pieces aligned.
    Note: DO NOT tape the clip to the receiver. This clip will be removed prior to the rod being inserted.
7. The seam should be taped using a tape recommended by the membrane flashing manufacturer, or a tape known to be compatible with the type of membrane flashing being used. Flash Trac components are not affected by any type of tape.
    Note: 3M™ All Weather Flashing Tape 8067 has been tested and works well for this application.
8. Install Flash Trac internal and external corners at all 90 degree changes in direction. The joints on the corners are also taped.
9. Install alignment clips at joints between Flash Trac sections to assure Brackets are properly aligned before spray foam insulation is applied. The alignment clips can be removed once the spray foam insulation has been applied or prior to the installation of the flashing.
10. Wait for spray foam insulation contractor to apply sprayed on insulation to the specified thickness. After insulation has been installed and all conditions for commencement of masonry work have been met, begin installation of flexible flashing and masonry veneer.
11. Do not install flexible flashing in Flash Trac Wall Brackets until AFTER the spray foam insulation has been applied.

12. After spray foam has been installed, pull the protective tape off the Track sections. The tape can also simply be split with a trowel or blade and left in place. It is not necessary to completely remove the tape to install flashing.
13. If necessary, use the Track Cleaner tool to remove protective tape residue and over spray from face of Track prior to membrane installation. If the protective tape was left in place until flashing installation, this will probably not be necessary.

B. Flexible flashing installation:

1. After spray foam insulation has been applied, and during masonry wall construction, install specified flexible flashing into the Flash Trac Wall Bracket. Install flashing only at the time it is needed, not before, so masonry veneer will encapsulate flashing soon after it has been installed. If flashing is left unprotected and is punctured, torn, or has loose scrim, remove damaged flashing from Wall Bracket, and install a fresh, undamaged section.
2. Begin by rolling the flashing out for several feet.
3. Two operators can lift the flashing up with the bottom edge of the flashing approximately 3 inches below the bottom of the jaw of the receiver.
4. Hold the flashing against the face of the Flash Trac bracket. Do not hold the flashing away from the bracket.
5. A third operator can place the rod over the front of the flashing.
6. Insert the jaw of the installation tool over the raised ridge of the rod.
7. Give the installation tool a brisk strike with a hammer to set the flashing in the jaw of the receiver.
   Note: It might be necessary to start the installation by pushing a few inches of the flashing into the jaw of the track to allow the rod to start easier.
8. Once the flashing is set, the operator with the hammer and installation tool can move down the line striking the installation tool and installing the flashing.
9. As the installation progresses, the two operators holding the flashing will move in succession with the installer until the wall is completed.
10. The flashing will be allowed to fall as the operators move down the wall.
11. If the flashing roll runs out, a new roll can be started. Simply overlap the old roll and the new roll by about two inches. The receiver will accommodate the overlap.
12. Extend flashing 6" minimum beyond openings. Fold flashing at ends of openings or horizontal flashing terminations to form end dams.
13. Flashing width: Width required starting flush with outside face of exterior wythe, extending through masonry veneer to the Flash Track Wall Bracket.
14. Splice end joints by overlapping 6” and seal with flashing manufacturer’s recommended joint splice tape and/or mastic.
15. Lay flashing in continuous bead of flashing manufacturer’s recommended sealant or adhesive on masonry bearing shelf.
16. Fold ends of flashing at ends of openings to form dams; seal with manufacturer’s recommended sealant or adhesive, or use manufacturer’s preformed end dams.
17. Inside corners: Make in industry accepted manner using corner and splice material, or use manufacture’s pre-formed corners.
18. Outside corners: Make in industry accepted manner using corner and splice material, or use pre-manufactured corners.

3.02 SCHEDULES

A. Locations:
   1. Foundation
   2. Exterior door heads
   3. Window heads and sills
   4. Continuous shelf angle
   5. Storefront heads

6. Horizontal control joints
7. Changes in veneer materials
8. Other wall openings
9. Other locations indicated.

END OF SECTION 07 65 00