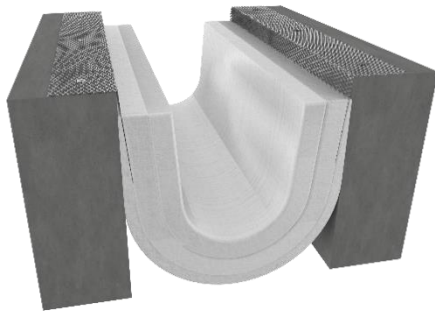


# SEISMIC FIRE BARRIER FLOOR & WALL SYSTEM – TOP MOUNT APPLICATION

**MODEL(S): EJN-FLF-TM / EJN-FLW-TM SERIES**

## Fire Barrier System – 4” Through 24” Sizes



### GENERAL DESCRIPTION

Expansion Joint Systems are an important life safety requirement in current building codes. These systems allow safe movement when buildings shift due to expansion & contraction. The following are general instructions for installing, operating, and maintaining this specific fire barrier system.

**GENERAL SAFETY PRECAUTIONS** Improper selection, installation, or use can cause personal injury or property damage. It is solely the responsibility of the user, through their own analysis, to select products suitable to the specific application requirements, ensure proper maintenance and use as intended. Follow local, state, and federal regulations for proper installation and operation requirements.

### Introduction + Safety

Please read the complete instructions carefully before beginning any work. To ensure proper installation and performance of the product, the following actions must be completed by the installing contractor. Failure to do so will affect the product warranty.

### Transportation + Storage

- Inspect all shipments and materials for missing or damaged components and hardware.
- Material must be stored in a clean, dry location.

### Preparation

- Locate the packing slip(s) and/or shop drawings.
- Verify that all products listed on the packing slip are included in the package.
- Check the products for damage. If products are damaged, report a freight claim immediately and leave the products in their packaging. If you sign for products

without reporting damage, you waive your right to a freight claim and will be responsible for their replacement cost.

- Read the instructions thoroughly before beginning installation.

### Tool List

- Tape measure
- Electric drill with appropriate bits
- Ø1/4" x 1-3/4" Lg. concrete/wood screw w/ washer
- Ø3/16" x 2-1/2" Lg. concrete/self-drilling screw w/ washer
- Tin snips or angle grinder
- Broom & dustpan or vacuum
- Level
- Utility knife
- 1" wide putty knife

### ***Included with the expansion joint system:***

- UL-rated fire caulk

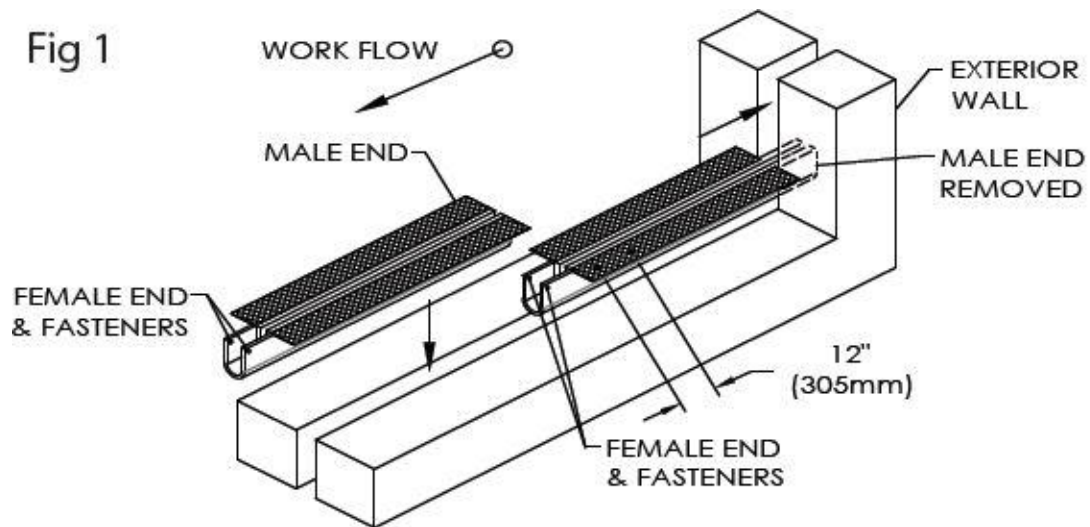
### Preinstallation

#### **NOTE: STORE AND INSTALL BLANKETS SUCH THAT THE PRODUCT REMAINS DRY.**

1. Verify that the structural gap and blockout dimensions are in conformance with submittal data before beginning installation. Certification of this product was completed by Guardian and Intertek Testing Laboratories. Product must be installed in accordance with these installation instructions.
2. For vertical (wall) conditions single sided and double-sided blankets are available. For single sides product, ensure drape of blanket faces "potential threat" side of wall.
3. If job site specific conditions exist, these general installation instructions do not take place of an engineering evaluation if required. Any modifications made to the product without documented manufacturing direction will void the warranty.
4. EJN-FLF-TM / EJN-FLW-TM is delivered pre-assembled. Transitions/directional changes must be installed first. TIP: If blanket assembly appears to be too wide to install, compress the sides of the blanket by laying it on its side and using a protective wood board, apply foot pressure. This will allow the blanket to regain its intended shape.
5. **Fire Caulk Disclaimer:** Nystrom provides 1 to 2 tubes of fire caulk (depending on order size) at no charge. Should additional caulk be required due to project or site complexity, additional caulk to be provided by others.

## INSTALLATION (General Installation Workflow)

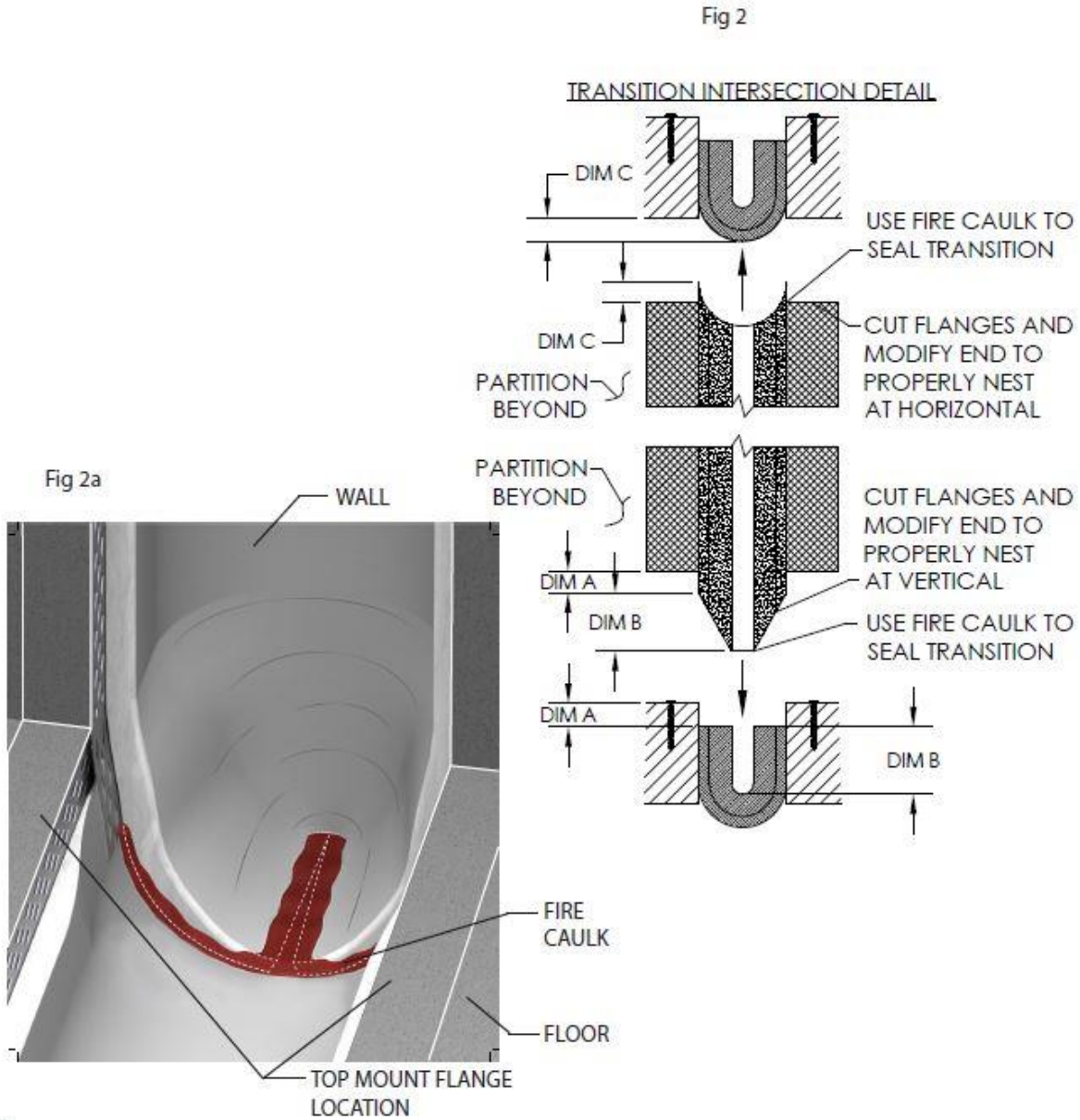
1. Place the fire barrier into the expansion joint, EJN-FLF-TM has a 12" [305mm] overlap at each end. One end is male and the other is female. Always secure the female with fasteners in each upper corner as depicted.
2. On the first section remove the male end and slide it into the wall. Install the next section, nesting the male into the female end tightly and secure with hardware appropriate to the substrate.
3. Flanges are expanded metal. Ensure flanges are pressed tight and held flat to the substrate. Pour a leveling compound over the flanges to ensure a flush blockout base if necessary.
4. Utilize hardware appropriate to the substrate (supplied by others) with a maximum spacing of 12" [305mm] O.C. **See Figure 1.** Recommended hardware for various conditions are:
  - a. Floor: 1/4" [6mm] x 1-3/4" [44mm] concrete/wood screw with washer.
  - b. Wall: 3/16" [5mm] x 2-1/2" [64mm] concrete/wood screw with washer.



## INSTALLATION (Vertical Intersection)

1. Remove the male end of the vertical fire barrier. Always install vertical blanket with the female end up. Next measure the depth of (Dim A) and the inside bellows (Dim B). Cut a "V" shape to match the space within the blanket. Flange trimming may be required. **See Figure 2**

2. Install the modified end into the throat of the floor and insert the fire barrier into the wall. Be sure there are no voids between the two. Fire caulk at connection point to ensure no air gap exists. **See Figure 2a.**



### INSTALLATION (Field specific lengths at field transitions connections workflow)

1. In the event a project requires a specific length, a female end can be recreated in the field to facilitate the next male end connection.
2. Measure the needed length from the edge of the flange to the other edge of the flange. Mark it on both sides.
3. Measure back 12" [305mm], using a razor remove the inside layer of white blanket material exposing the flanges (**see Figure 3a**). Remove the pins and cut the flanges off. The 1/2" [13mm] thick outer fire blanket will remain with the section.
4. In the female end install the 4 new pins/washers and bend the pins over.
5. Nest the 24" [610mm] male end into both female ends and fasten. Modify flanges as needed to fit horizontal fire blanket into wall cavity. **See Figure 3b.**

Fig 3

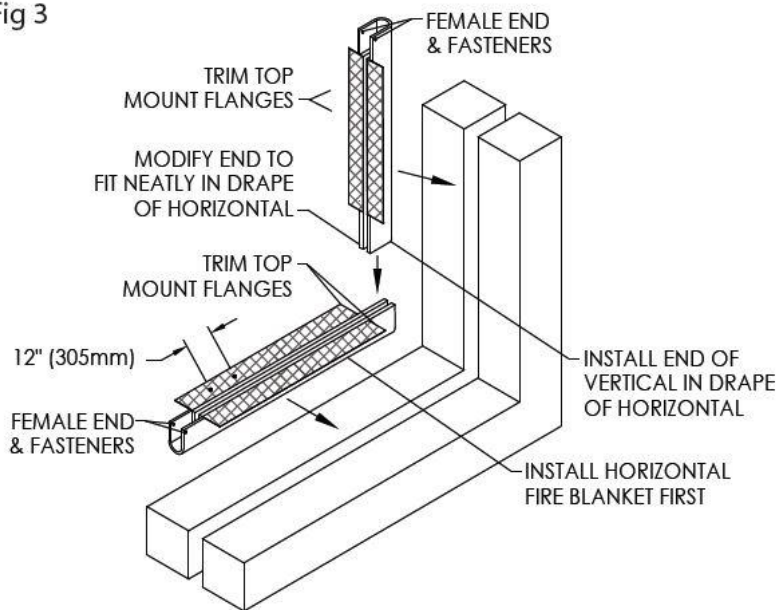


Fig 3a

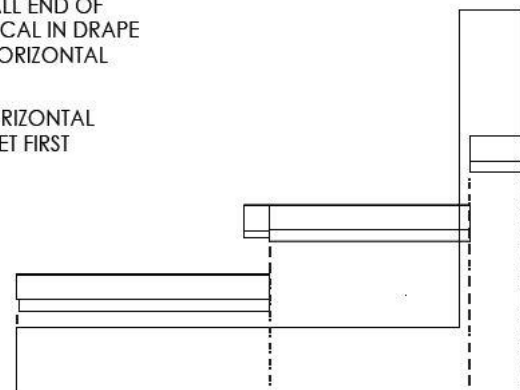
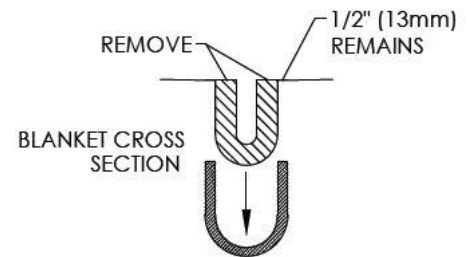
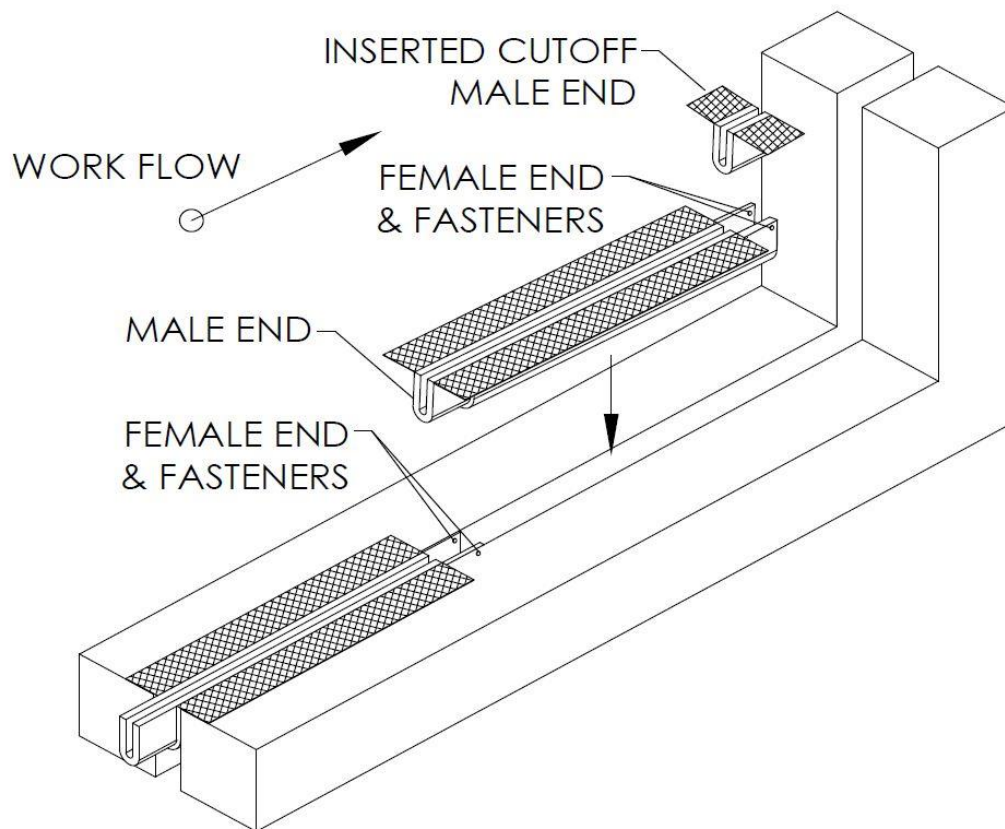


Fig 3b

**INSTALLATION (Field conditions of whole fire blanket lengths workflow – increments 10’ [3.1m] or 4’ [1.2m])**

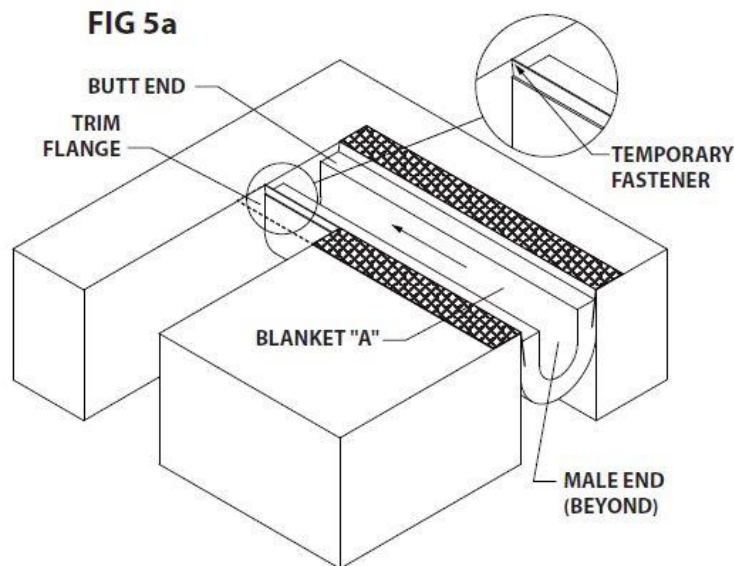
1. In these conditions you must remove the first male end and use it in the last female end.
2. Remove the pins and cut the fire blanket in line with the edge of the flange. Set male end aside for later installation.
3. Install all the sections except for the last one.
4. Take the male end that is set aside and nest into the last female end.
5. Install the new pins/washers and bend the pins over. Modify the flanges as needed to nest the horizontal fire blanket thin wall cavity to edge of slab. **See Figure 4.**

Fig 4

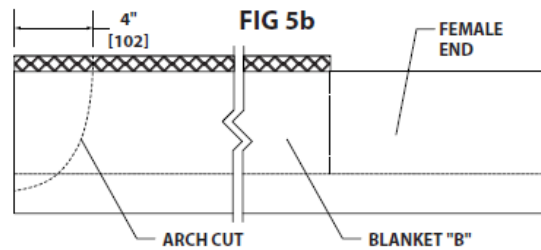


### INSTALLATION (Field fabricated in-plane 90° turn)

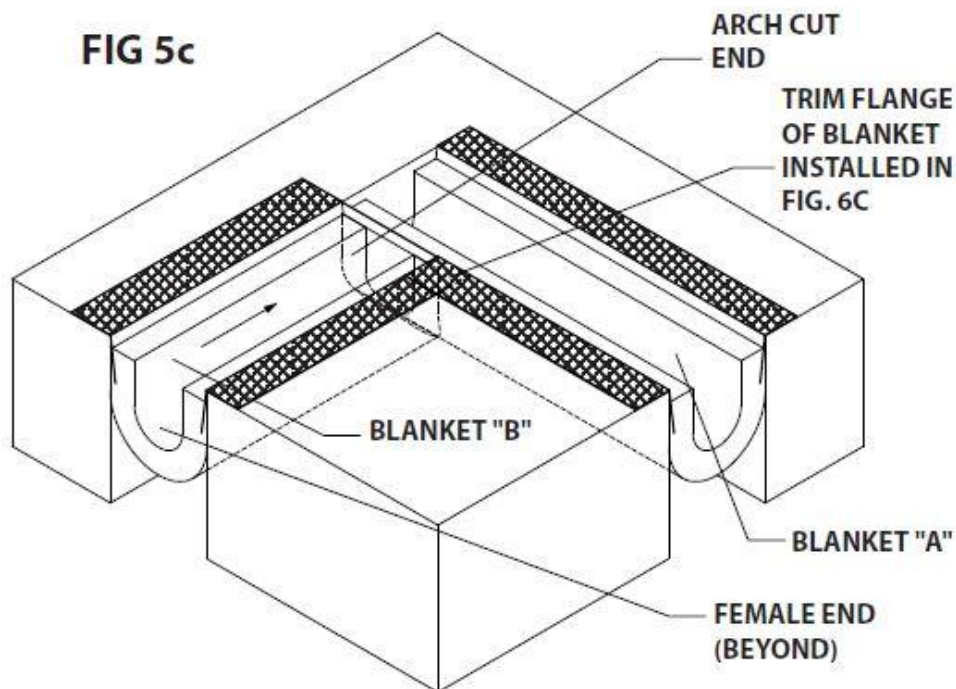
1. Ensure the previously installed blanket has the female end towards the transition location.
2. Make blanket “A” by cutting the next blanket to proper length making sure the measurement is taken from the male side of the blanket. This will be a straight cut through the blanket, avoiding the assembly pin locations. Use a utility knife to cut through blanket material and a tin snip or angle grinder for the flanges. Install blanket “A”, ensuring the male end fits snugly into the female section and the butt end fits tightly into the corner of the directional change (see Figure 5a). Install fire caulk at any visible openings, see tip below.



3. Trim the horizontal portion of the flange hanging over the joint and install a temporary fastener affixing the “floating” flange to the substrate. This will need to be removed in a later step.
4. Use the remainder of the previously cut blanket assembly (if enough remains) to make blanket “B”. Cut the butt end into an arch pattern (see Figure 5b). Measure roughly 4” [102mm] back on the flanges to begin the cut. Blanket “B” should consist of an arch cut in one end and a female end on the other.



5. Install blanket “B” into the corner, tightly pressing the end with the arch cut against the side wall of blanket “A”. The arch cut should hug the side wall of blanket “A” snugly (see **Figure 5c**). Install fire caulk at all visible openings at the seam, see tip below.
6. Remove the temporary fastener in Step #3 and continue with the general installation as referenced in Figure 1.
7. **FIRE CAULK TIP:** Apply fire caulk to the face of the butt end you are installing into the corner and to the arch cut you are installing against the other blanket. Then apply additional fire caulk at any visible openings.





## OPERATION

Expansion Joints are designed and built for years of dependable service.

## MAINTENANCE

Perform annual inspections to make sure the system is in position; all fasteners are tight and in place and there is no impedance of joint cover movement. Repair and/or replace as needed.

## QUESTIONS?

For more information on installation, repair, or replacement, please contact Customer & Sales Support at 800-547-2635 or visit [nystrom.com](http://nystrom.com)