

T A M C O D A M P E R INSTALLATION GUIDELINES

FOR TAMCO JACK SHAFTS AND TAMCO DAMPER JUMPER BRACKETS, REFER TO INSTRUCTIONS ON PARTS BOX.



FRONT / TOP END UP / RIGHT HAND

- When labels on blades are viewed right side up, the damper orientation is **Front/Top end up**.
- When viewed as Front/Top end up, a right-hand (RH) damper has the drive rod as shown. Left-hand (LH) dampers have a drive rod on the left.
- The damper, as a complete unit, can be installed right side up, upside down, standing up, or lying flat.
- There is no specified air entry or air exhaust side for Series 9000 BF, 9000 ECT, 9000, 9000 SC, 1500, 1500 SW, 1000, 1000 SW and 1400.
- Ensure that the damper is installed to permit future access to the side linkage, as well as any damper jumper brackets, or jack shafts, if so supplied.
- Joiners and fasteners, provided by TAMCO to interconnect damper sections, are for alignment purposes only and may not be considered as structural supports.
- Duct work construction and bracing must be sufficient to support the damper. Do not use the damper to square up duct work. The system must support the damper. The damper cannot support the system.
- For vertical blade applications, the damper must be installed so that the linkage is located at the top. Sections must be properly braced and supported.
- A 12"-long, hexagonal steel drive rod is provided as standard. Dampers are shipped with their drive rod inserted in the drive blade. Drive rods may be extended up to 8" beyond the outside edge of the frame by loosening the U-bolt, drawing out the rod to the desired length and then retightening the U-bolt.
- If required, 24" and 36" long zinc-plated, steel drive rods can be ordered.

TAMCO's all aluminum dampers are constructed with maintenance-free bearing and linkage components.

Caution: Never use any lubricants, such as grease or silicone on TAMCO dampers.

In applications where the humidity level is unusually elevated, or where there are extremely high levels of dust and dirt particles, TAMCO recommends that the damper linkage and bearing system should be cleaned once a year. This can be done easily with the use of a domestic strength steam cleaner. The loosened dirt and water droplets can then be blown out with compressed air.

Note that all technical information available on TAMCO's web site at www.tamco.ca supersedes and takes precedence over all information contained within the printed catalog.

**CALL TAMCO CUSTOMER SERVICE WITH ANY QUESTIONS CONCERNING TAMCO DAMPERS
1-800-561-3449**

**DO NOT ADJUST LINKAGE MECHANISM. IF PROBLEM STILL EXISTS AFTER VERIFICATION AND CORRECT ACTION,
CALL TAMCO CUSTOMER SERVICE.**

VERIFY DAMPER OPERATION BEFORE INSTALLATION!

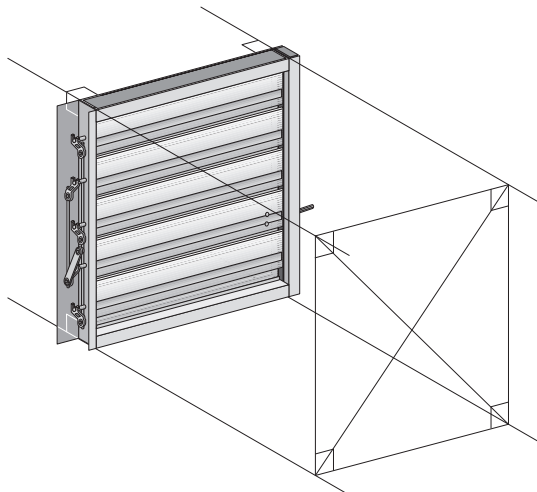
- ✓ Before installing, inspect damper for possible damage caused in shipping.
- ✓ If minor damage has occurred to frame corners or flanges, correct by bending or hammering back into position. Ensure correct realignment of repair, as bent or twisted frames might not mate with mounting angles, or additional damper sections, properly.
- ✓ Do not install damper if damage is more than superficial, if uncertain as to extent of damage, or if damper does not seal correctly.
Call TAMCO CUSTOMER SERVICE at 1-800-561-3449.
- ✓ Operate damper section manually (on a flat section of floor) to verify correct blade action and sealing.

(A) To correctly verify sealing action, loosen hex nuts of U-bolt located on drive blade. Extend steel drive rod to maximum of 8" beyond the outside edge of the frame. Re-tighten hex nuts on U-bolt.

(B) Using drive rod, slowly apply closing torque, while ensuring that damper frame does not twist due to torque being applied. (Larger dampers may require additional person to hold damper frame square and true.)

(C) If possible, use daylight or inside light source as a backdrop to verification procedure. No light should be visible through damper.

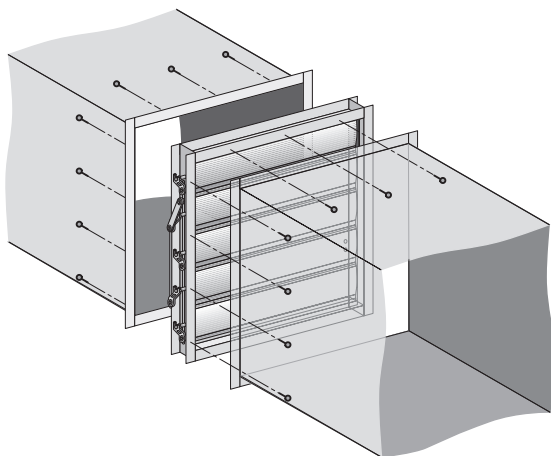
CAUTION SHOULD BE EXERCISED TO ENSURE FINGERS ARE NOT IN WAY OF MOVING LINKAGE PARTS OR BLADES.



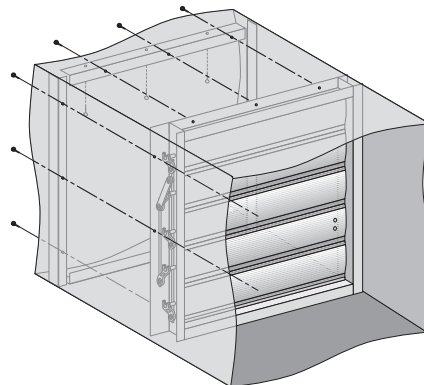
I N S T A L L A T I O N O F DAMPER TYPES

"INSTALLED IN DUCT" TYPE

- Damper must be installed square.
- Damper approximately 1/2" smaller than specified duct or opening size.
- Ensure that duct is square and/or large enough to allow damper to be installed square.
- Make hole in duct work, if required, to allow extension of drive rod.
- Bottom of frame must sit flat on floor of duct to prevent twisting, sagging, or bumping up, as this could cause leakage between bottom frame and bottom blade.
- Verify that damper is square and then secure bottom frame to floor of duct using a 90° mounting angle. Operate damper manually to confirm proper sealing.
- As each mounting angle is installed, verify operation to ensure damper is sealing correctly.
- Caulk all joints.



**Linkage Must Be Accessible
After Installation**



"FLANGED TO DUCT" TYPE

- Damper must be installed square.
- Damper flange is 1" larger than duct or opening, all around.
- Do not assume that duct is square. Verify that duct flange is square, flat and even.
- Verify that damper is square. Operate damper to verify free movement of blades and correct sealing. Secure damper. Re-verify that damper is square.
- Repeat procedure for other flange, if ducted on both sides.
- Caulk all joints.

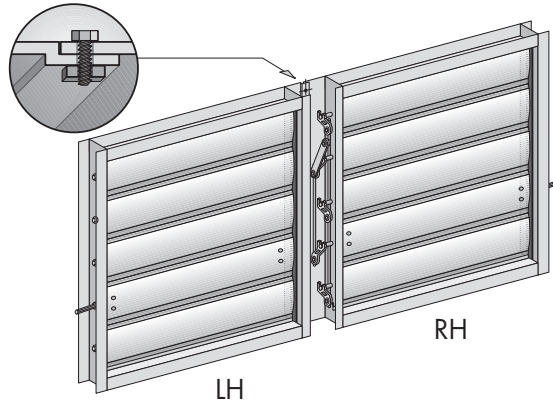
MULTI-SECTION DAMPERS

ADDITIONAL TO PRECEDING GUIDELINES

IF JACK SHAFTS ARE TO BE FITTED, SEE JACK SHAFT INSTRUCTIONS PRIOR TO INSTALLING DAMPERS

TWO SECTIONS WIDE

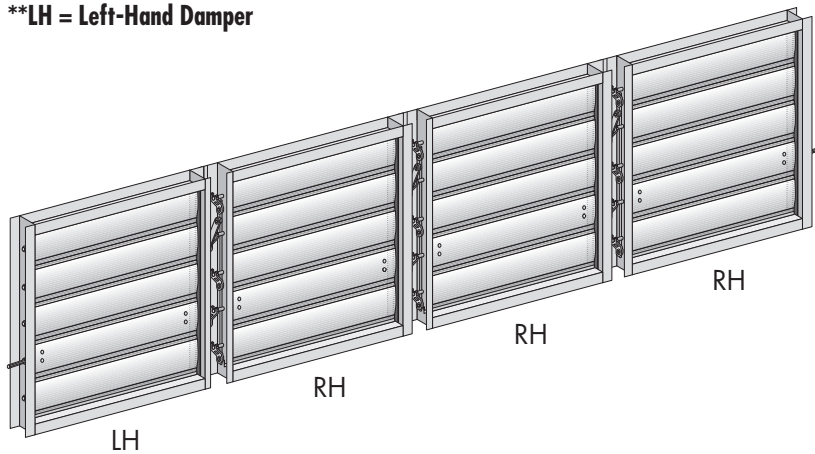
- Frame members are designed to overlap and are manufactured with two aligned positioning holes. When dampers are correctly positioned, holes will be aligned.
- Alignment fasteners are shipped attached to the offset overlapping frame. *(Alignment holes are not meant to be structural. Bracing may be deemed necessary by installer.)*
- Ensure that both sections are straight, even, and aligned with each other.



ALL ILLUSTRATIONS SHOWN ARE FRONT/TOP END UP DAMPERS

*RH = Right-Hand Damper

**LH = Left-Hand Damper

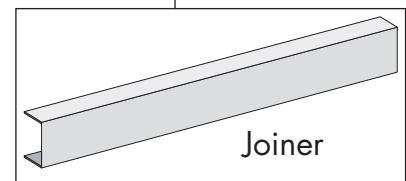
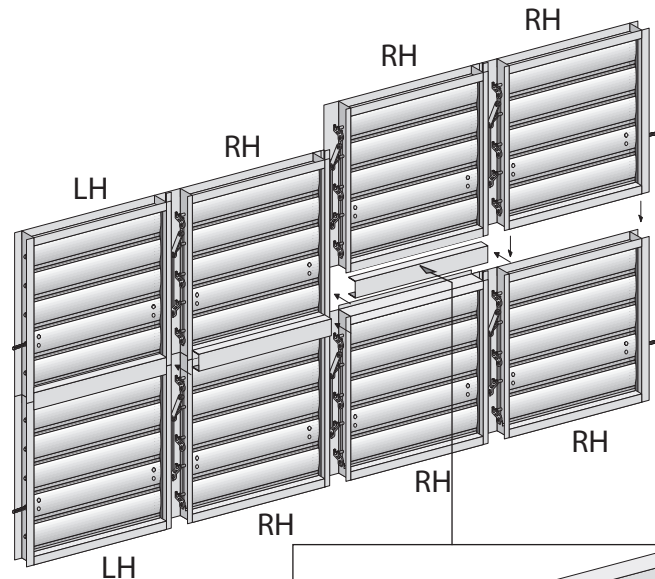


FOUR SECTIONS WIDE

- Frame members are designed to overlap and are manufactured with two aligned positioning holes. When dampers are correctly positioned, holes will be aligned.
- Alignment fasteners are shipped attached to the offset overlapping frame. *(Alignment holes are not meant to be structural. Bracing may be deemed necessary by installer.)*
- Ensure that all four sections are straight, even, and aligned with each other.

MULTIPLE SECTIONS WIDE BY MULTIPLE SECTIONS HIGH

- Install bottom tier damper section(s) first.
- Place second level of damper section(s) on top of bottom section(s), being careful that all sections are properly aligned.
- Install top damper section(s).
- Slide joiner(s) over frame member(s), where top and bottom section(s) meet(s).
- Using self-drilling screws, fasten joiner to damper frame member(s) through pre-punched holes in joiner. **Caution: Joiner is not designed to be structural. Additional bracing may be required if deemed necessary by installer.**
- Repeat procedure for all additional section tiers.
- Ensure all sections are straight, even, and aligned with each other.



END CAPS

FOR FLANGED-TO-DUCT TYPE, MULTI-SECTION DAMPER INSTALLATIONS

- End caps are provided with all multi-section dampers that are to be installed as flanged-to-duct mount type.
- These are required to prevent air flow from passing through open channels.
- End caps are not required for installed in duct type multi-section dampers.

