

**FIELD INSTALLATION INSTRUCTIONS**

**Kit Part Number**

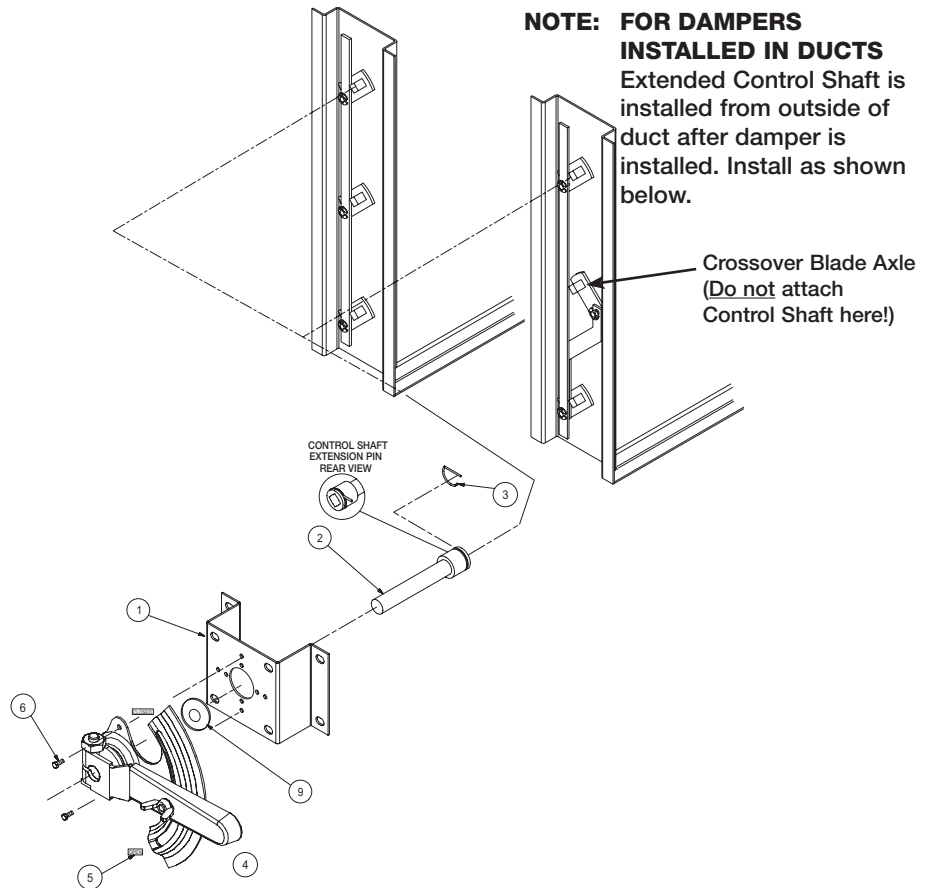
1/2 in. Extension Pin Kit & Manual Quadrant Kit	Part #828599
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**TOOLS REQUIRED:**

- 5/16 in. Hex Nut Driver
- 3/8 in. Electric Drill
- 1/2 in. Open End Wrench

**1/2 in. Extension Pin Kit Part Numbers**

No.	Qty.	Description
1	1	Stand off bracket Part #651812
2	1	Extension pin Part #463676
3	1	Retaining clip Part #451738
4	1	1/2 in. (13mm) manual quadrant Part #455648
5	1	Open and close labels
6	2	Tek screws
9	1	Washer Part #416338)



**Before Installing Damper in the Duct**

1. If damper has more than one blade, determine which blade axle will be driven by the extended control shaft. Always attach extended control shaft to a blade axle which is directly connected to the main linkage tiebar. **DO NOT** attach extended control shaft to a crossover blade axle.
2. Cut hole approximately 1 in. in diameter in the duct where damper drive blade axle will be located. Hole must provide clearance for enlarged portion of extended control shaft.

**After Damper Is Installed in Duct**

1. Push extended control shaft through hole in the duct and onto drive blade axle. Retainer clip should "click" into groove on drive blade axle and hold shaft into place. Standard Control Shaft location is the third blade from the bottom on dampers with three or more blades. Control Shaft location is the first blade from the bottom on dampers with one or two blades.
2. Install the stand off bracket with washer over the extended control shaft and screw bracket to duct. Make sure screws do not interfere with damper linkage or blade movement. Assemble Manual Quadrant to extension bracket assembly (screws provided).
3. With damper either fully open or closed, lock manual quadrant to extended control shaft so manual quadrant can move damper between open and closed. Note: Tighten down bolt on manual quadrant to 250 in. lb. of torque. Apply "OPEN" and "CLOSED" labels if damper movement is opposite to that engraved in the manual quadrant.
4. Set damper to desired position and tighten wing nut on manual quadrant to hold damper in place.

**Caution**

Stand off bracket with washer is needed to support the extended control shaft. If not installed as directed, the extended control shaft may not operate the damper correctly.