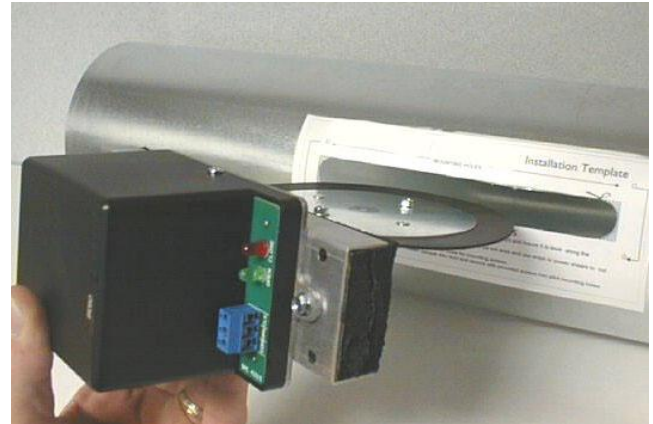


Retro-Round™ Damper With MDM Power Open/ Power Close Motor Model: RRM

The NEW Retro-Round™ Insertable Damper with the MDM Zone Damper Motor now simplifies those hard to zone retrofit installations. The RRM is a low cost single blade damper that inserts into any branch take-off duct. It is available in 4", 5", 6", 7" and 8" diameters. All RRM dampers are rated for duct systems less than 2.0" W.C. Dampers are ordered as RRMdd, using 2 digits for the dimension.

The simple 3 wire motor has two light emitting diodes (LED's) to indicate the damper position. The **RED** LED is lit when the damper is **closed** and the **Green** is lit when the damper is **open**. The MDM also has adjustable minimum position stop under the motor cover. This motor's energy saving design uses end switches to break power to the motor once the motor reaches the end travel position. This lengthens the motor life and conserves energy. The MDM has been factory tested to over 250,000 cycles.

The RRM is available in 4", 5", 6", 7", 8" diameters.

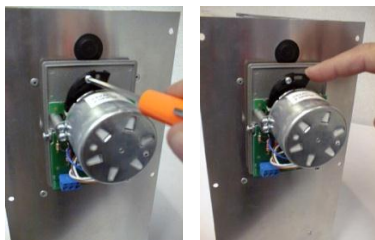


Motor Actuator



The MDM Actuator delivers up to 250 in/oz. (15.62 in/lbs.) of torque that powers the RRM open and closed. This powerful motor allows the damper to handle higher static pressures.

The MDM is a reversible motor that powers the damper both open and closed. It also has an adjustable stop for a minimum damper position setting.



Damper Specifications

Construction – Aluminum End Plate and shaft with Glvanized Blade

Linkage – Direct Drive

Sizes: 4", 5", 6", 7", 8"

Dimensions – 8"x 2"x 2.5" Outside the Duct excluding blade

Motor Voltage – 24Volts AC, 50/60Hz, 4VA, .17A

Torque – 250in/oz. (15.62in/lbs.)

Temperature Rating - 0°F to 150°F Operating, -20°F to 175°F Storage

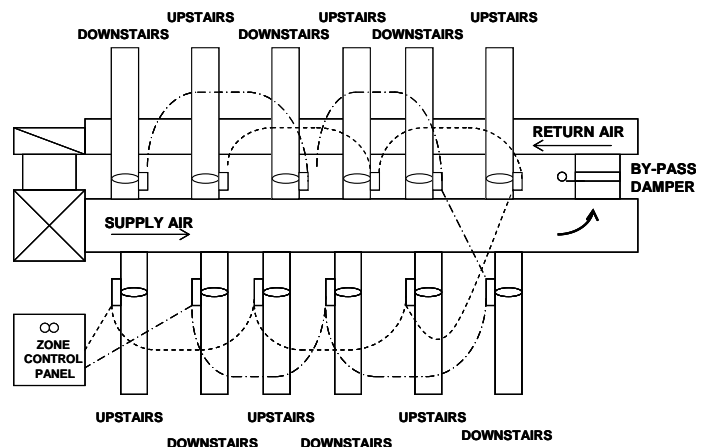
Humidity – 5% to 95% Non-Condensing

Damper Timing – Nominal 9 Sec. Powered

Connection: Screw Terminals

Static Pressure – Maximum 2.0 "W.C.

Typical Application of the RRP installed in the branch ducts to control the upstairs and downstairs zones.

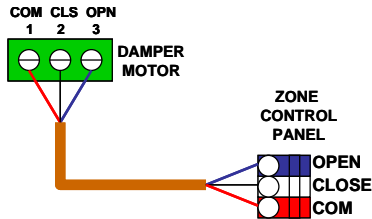


INSTALLATION

To install, use the template provided with damper.

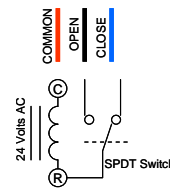
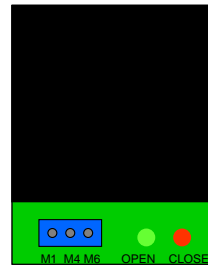
1. Peel off the back of the installation template provided and align along the centerline of the duct. Insure the template is straight before adhering to the duct.
2. Drill a $\frac{3}{4}$ diameter hole at each end of the cut area.
3. Using a pair of snips or shears, cut along the top and bottom of the cut out area to make the opening for the damper.
4. Insert the damper into the duct. It is recommended to power each damper motor before securing the damper to the duct and cycle the damper. This will avoid possibly pulling the damper out of the duct later to check for proper alignment that may cause the damper to jam.
5. While keeping the damper in-line with the duct, secure using the screws provided. Tighten until the damper end plate meets the duct. **DO NOT OVER TIGHTEN AS THIS MAY CAUSE THE DAMPER TO JAM.**

WIRING DIAGRAM



CHECKOUT

To checkout the operation of the dampers, place 24V across terminals M1 and M4. The damper will open and the Green LED will light at the end of the cycle. Place 24V to terminals M1 and M6 and the damper will close and the Red LED will light at the end of the cycle. All dampers are 100% factory tested.



TROUBLESHOOTING

After performing the checkout of the damper, check the motor terminals for 24V across terminals M1 and M4 if the damper should be open, and M1 and M6 if the damper should be closed. If power is not at the proper terminals, check the wiring and control panel for power.