**SUGGESTED SPECIFICATIONS**

08/30/2017

**TAMCO SERIES 7000 CW MEDIUM-DUTY ADJUSTABLE COUNTERWEIGHTED BACKDRAFT DAMPER**

1. Extruded aluminum (6063-T5) medium-duty backdraft damper frame shall not be less than 0.060” (1.52 mm) in thickness. Frame shall be 2.5” (63.5 mm) deep x 5/8" (15.9 mm), with duct mounting flanges on both sides of frame. Frame shall have a 17/8" (47.6 mm) mounting flange on either the front or rear of the damper, when ordered as either Front Flange or Rear Flange install type. Frame to be assembled using zinc-plated steel mounting fasteners. Welded frames shall not be acceptable.
2. Blades shall be maximum 5” (127 mm) deep extruded aluminum (6063-T5) profiles and shall not be less than .060" (1.52 mm) in thickness.
3. Aluminum (6061-T6) counterbalance weights shall be mounted on each blade. Counterweights shall be fully adjustable, such that they may be set to relieve air pressure differentials less than .01” w.g. (3 Pa).
4. Blade seals shall be extruded silicone, secured in an integral slot within the aluminum blade extrusions and shall be mechanically fastened to prevent shrinkage and movement over the life of the damper. Adhesive or clip-on type blade seals will not be approved.
5. Frame seals shall be extruded silicone, secured in an integral slot within the aluminum frame extrusions and shall be mechanically fastened to prevent shrinkage and movement over the life of the damper. Frames without seals will not be approved. Metallic compression type jamb seals will not be approved.
6. Maintenance-free bearings system shall be composed of a ½" (12.7 mm) aluminum pivot point rotating in a Celcon bearing.
7. Linkage system shall consist of hard alloy aluminum (6005-T6) crank arms fastened to aluminum pivot rods and shall be secured within a channel running along top of blades. Large diameter 11/32" (8.73 mm) hard alloy aluminum (6065-T6C) linkage rod shall connect the crank arms by means of a zinc-plated steel trunnion. Linkage that consists of metal rubbing metal will not be approved.
8. Trunnions shall be zinc-plated to provide a hard, smooth and long-lasting rotating surface for the bearing and shall be secured to the linkage by cup-point screws to prevent linkage slippage.
9. Medium-duty adjustable counterweighted backdraft dampers shall be designed for operation in temperatures ranging between -40°F (-40°C) and 212°F (100°C).
10. Air leakage through a 24" x 24" (610 mm x 610 mm) counterweighted backdraft damper shall not exceed 4.32 cfm/ft² (21.95 l/s/m²) against 1 in. w.g. (0.25 kPa) differential static pressure at standard air.
11. Medium-duty backdraft dampers shall be custom manufactured to required size, without blanking off free area.
12. Counterweighted backdraft dampers with dimensions greater than maximum section size shall be manufactured in multiple sections. Multiple sections are not interlinked or connected. To install, each section must be individually fastened to a structural frame prepared on site.
13. Counterweighted backdraft dampers shall be installed in the following manner: Rear Flange, In Duct, or Front Flange. (Specify one.)
14. Installation of backdraft dampers must be in accordance with TAMCO's current installation guidelines, provided with each damper shipment.
15. Intermediate structural support is required to resist applied pressure loads for medium-duty backdraft dampers that consist of two or more sections in both height and width. (See TAMCO Medium-Duty Backdraft Damper Installation Guidelines.)
16. Acceptable product shall be TAMCO Series 7000 CW Medium-Duty Adjustable Counterweighted Backdraft Damper, as manufactured by T. A. Morrison & Co., Inc. (Tel: 1-800-561-3449, USA & Canada).

**OPTIONS** *(For each option listed, replace the specification lines above with their corresponding specification lines below.)*

**MR - MOISTURE RESISTANCE OPTION:**

1. Extruded aluminum (6063-T5) medium-duty backdraft damper frame shall not be less than 0.060” (1.52 mm) in thickness. Frame shall be 2.5” (63.5 mm) deep x 5/8" (15.9 mm), with duct mounting flanges on both sides of frame. Frame shall have a 17/8" (47.6 mm) mounting flange on either the front or rear of the damper, when ordered as either Front Flange or Rear Flange install type. Frame to be assembled using stainless steel screws. Welded frames shall not be acceptable.

7. Trunnions shall be stainless steel to provide a hard, smooth and long-lasting rotating surface for the bearing and shall be secured to the linkage by stainless steel cup-point screws to prevent linkage slippage.

**SW - SALT WATER RESISTANCE OPTION:**

1. Extruded aluminum (6063-T5) damper frame shall not be less than 0.080” (2.03 mm) in thickness. Damper frame shall be 4” (101.6 mm) deep x 1" (25.4 mm), with duct mounting flanges on both sides of frame. Damper frame shall have a 2" (50.8 mm) mounting flange on the rear of the damper when installed as Extended Rear Flange install type. Aluminum frame shall be clear anodized to a minimum thickness of 0.7 mil (18 microns) deep. Frame shall be assembled using stainless steel screws. Welded frames shall not be acceptable.

2. Blades shall be maximum 5” (127 mm) deep extruded aluminum (6063-T5) profiles and shall not be less than .060" (1.52 mm) in thickness, clear anodized to a minimum thickness of 0.7 mil (18 microns) deep.

6. Linkage system shall consist of hard alloy aluminum (6005-T6) crank arms fastened to aluminum pivot rods and shall be secured within a channel running along top of blades. Large diameter 11/32" (8.73 mm) hard alloy aluminum (6065-T6) linkage rod shall connect the crank arms by means of a zinc-plated steel trunnion. Aluminum linkage components shall be clear anodized. Linkage that consists of metal rubbing metal will not be approved.

7. Trunnions shall be stainless steel to provide a hard, smooth and long-lasting rotating surface for the bearing and shall be secured to the linkage by stainless steel cup-point screws to prevent linkage slippage.