



**AIRFOIL CONTROL DAMPER  
STEEL • ULTRA-LOW LEAKAGE  
HIGH PERFORMANCE  
MODELS: 1110 & 1120 WITH CR ROUND  
TRANSITIONS OPTION**

The 1110CR/1120CR Series are Nailor's most cost effective steel airfoil blade control dampers in a sealed casing with round transition collars. The ultra-low leakage (Class 1A) dampers are suitable for use in the majority of medium to high pressure and velocity commercial HVAC systems.

The design features zero maintenance concealed linkage (out of the airstream) for reduced pressure drop and air turbulence. The models are AMCA Licensed and meet the International Energy Conservation Code (802.3.4) maximum leakage for building envelope dampers criteria of 3 cfm.ft<sup>2</sup> @ 1" w.g. (15.2 l/s/m<sup>2</sup> @ 0.25 kPa).

**STANDARD CONSTRUCTION:**

**FRAME:** 5" x 7/8" x 16 ga. (127 x 22 x 1.6) galvanized steel hat channel with die-formed corner gussets. Low profile (flat top and bottom) on dampers 10" (254) high and under.

**BLADES:** 6" (152) wide on 5 1/2" (140) centers. 2 x 20 ga. (1.0) galvanized steel formed into an airfoil cross-section. 14 ga. (2.0) equivalent thickness. Parallel or opposed action.

**LINKAGE:** Concealed side type totally enclosed within the frame and out of the air stream. Plated steel.

**BEARINGS:** 1/2" (13) dia. Oilite® self-lubricating bronze.

**AXLES:** 1/2" (13) dia. plated steel double bolted to blades.  **MODEL**

**DRIVE SHAFT:** 6" (152) long x 1/2" (13) dia. rigid drive shaft.

**BLADE SEALS:** Extruded PVC.

**JAMB SEALS:** Cambered stainless steel.

**CASING:** Up to 36" x 36" (914 x 914) 20 ga. (1.0) galvanized steel.  
36" x 36" (914 x 914) and up 18 ga. (1.31) galvanized steel.  
Casing is tack-welded and caulked against leakage.

**MINIMUM SIZE:** Single blade: 4" (102) dia.  
Two blades (parallel or opposed): 8" (203) dia.

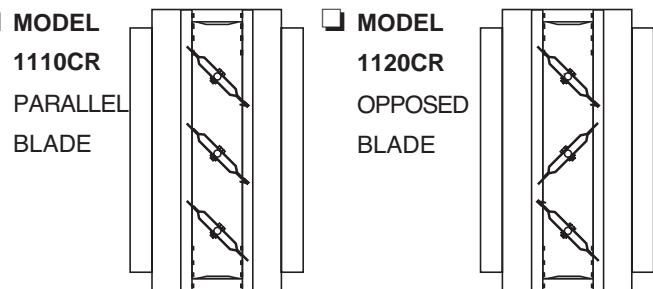
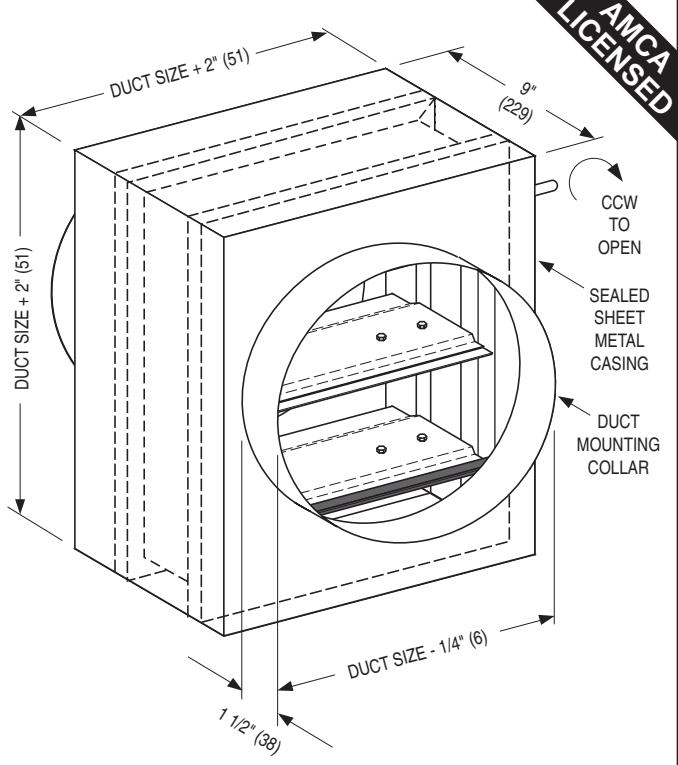
**MAXIMUM SIZE:** Single section: 46" (1168) dia.

**TEMPERATURE RANGE:** -50°F to 180°F (-45°C to 82°C)

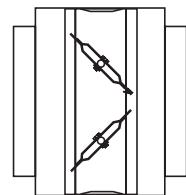
**OPTIONS:**

- 304** Type 304 stainless steel construction
- Other \_\_\_\_\_.

Nailor offers a wide selection of pneumatic and electric actuators for factory or field installation.



The low profile frame illustrated is used to maximize free area available on units 10" (254) high and under.



**SCHEDULE TYPE:**

Dimensions are in inches (mm).

**PROJECT:**

**ENGINEER:**

**CONTRACTOR:**

DATE	B SERIES	SUPERSIDES	DRAWING NO.
3 - 3 - 06	1100	8 - 3 - 04	1100-2