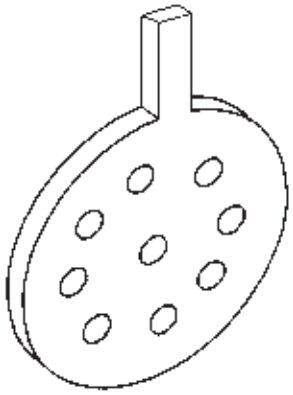
spirax sarco®

Acoustic Plates

The Spirax Sarco model AP Acoustic Plate is designed to graduate the expansion across a valve, and therefore reduce valve noise. The acoustic plate absorbs the impact of the vent pressure at the downstream side of the valve. It distributes the steam flow and provides a noise frequency shift to reduce the perceived noise using a multiple hole orifice pattern in the plate inserted on the downstream side of the valve. Noise level reductions of up to 10 dBa can be achieved.



Limiting Operating Conditions

Max. Operating Pressure 250 psig (*17 barg)*
Max. Operating Temperature 650˚F
Pressure Drop Less than 1%
Standard Connections
AP plates are installed between standard flanges:
ANSI 150 RF flange designated “A”
ANSI 300 RF flange designated “B”

Construction Materials

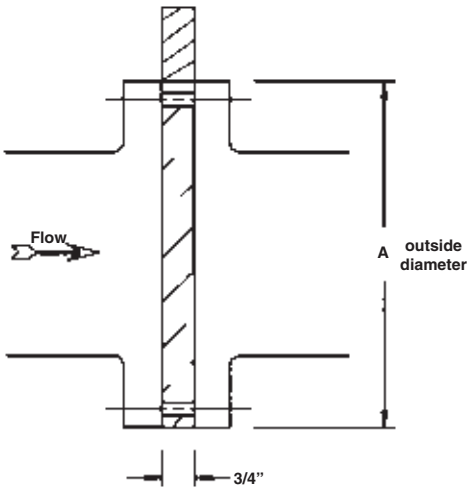
Part	Material
Plate	Cast Steel

Installation

The Series AP Acoustic Plate is designed to reduce control valve and/or regulator noise. The plate is installed between standard ANSI 125/150 flanges or ANSI 250/300 downstream of a valve and reorients the normal exit turbulence of the steam flow. Noise reduction of up to 10 dBa can be achieved. The plates can be used in conjunction with D series noise diffusers and acoustic silencers for additional noise attenuation. See below for dimensions.

Dimensions
(nominal) in inches and millimeters

Nominal Pipe Size	Dimension A of ANSI 150 Flange	Dimension A of ANSI 300 Flange	Avg. Weight (lbs.)
1/2”	1.75	2.00	1.0
3/4”	2.12	2.50	3.4
1”	2.50	2.75	3.6
1-1/4”	2.88	3.12	3.8
1-1/2”	3.25	3.62	4.3
2”	4.0	4.25	6.0
2-1/2”	4.75	5.00	6.5
3”	5.25	5.75	10
4”	6.75	7.00	11.5
6”	8.62	9.75	12.4
8”	10.88	12.00	14.0



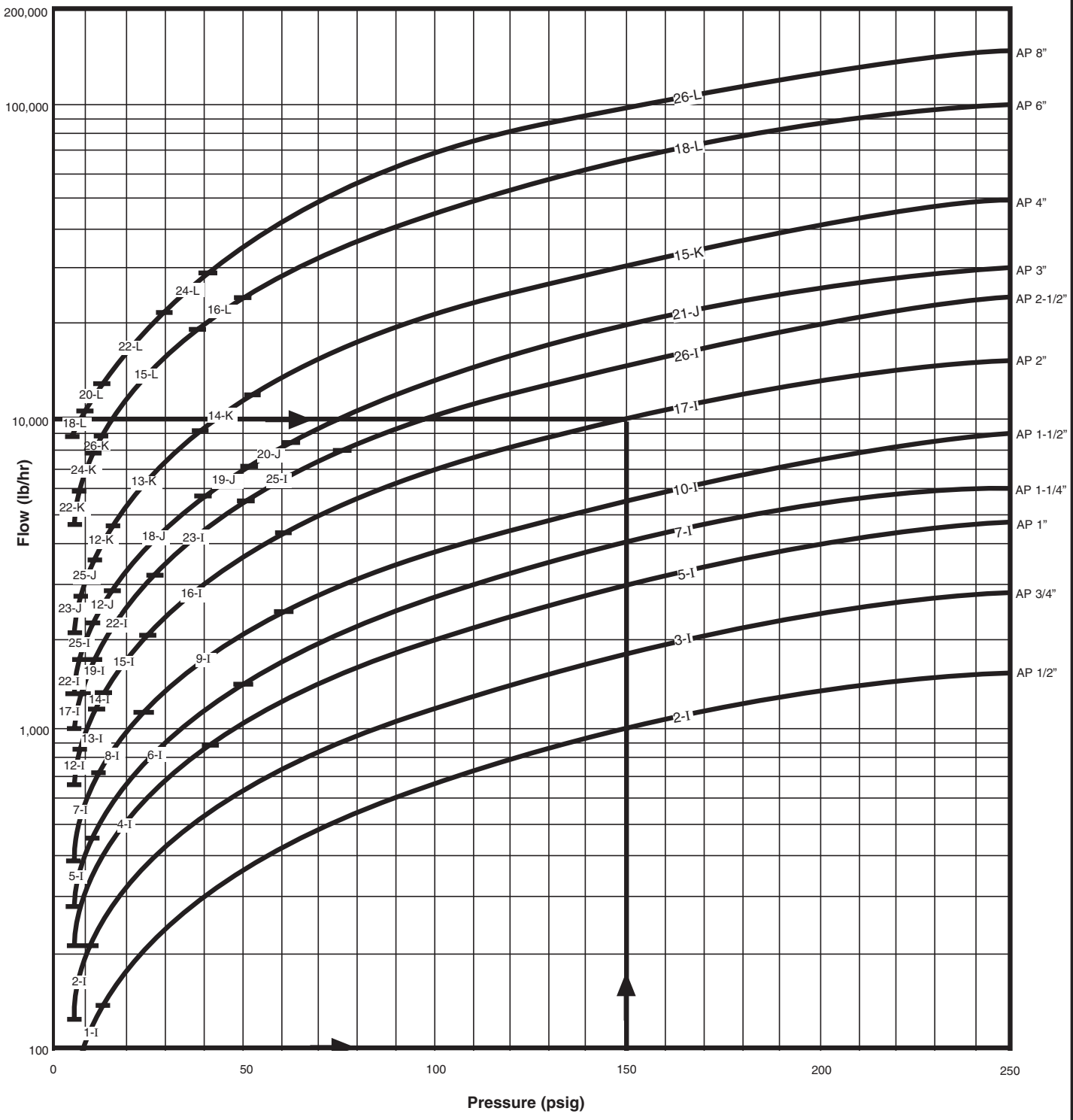
How To Order Quantity One Of:

AP	-	1-1/2”	A	-	10-I
Acoustic Plate		Size	Flange		No. of Holes and Configurations

Local regulation may restrict the use of this product below the conditions quoted. Limiting conditions refer to standard connections only.
In the interests of development and improvement of the product, we reserve the right to change the specification.

Acoustic Plates

Sizing and Selection Chart for AP Plates



How To Use Sizing Chart

Select correct acoustic plate by known flow rates (lb/hr.) and inlet pressure of control valve or regulator.
Example: Inlet pressure of control valve 150 psig @ 10,000 lb./hr. Move horizontal to intersect with 150 psig. Follow 150 psig line vertically to intersect with 10,000 lb./hr. horizontal line. Select AP 2" - 17 - I.

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