Capacity Range: 1.25 to 8 IPS mixture connections





Selas Flanged Mixing Tee

Selas Flanged Mixing Tees are air-gas proportional type mixers designed for low pressure drop operation.

How It Works

Flanged Mixing Tees are air-gas proportional type mixers designed for low pressure drop operation. Combustion air delivered through a control valve is metered through a precision machined orifice. Controlled air pressure is impulsed to the top of the gas balanced zero regulator.

The zero regulator outlet pressure will always be the same as the controlled air pressure. An adjustable gas orifice sets the gas fuel flow rate. This pressure interlocked system maintains equal air and gas pressure drops at all flow rates. Air-gas ratio will be constant over the entire turndown range of the system.

Applications:

Air-Gas Mixing



Operating Principles

FMT mixer selections are based on blower air pressure available, mixture pressure required at the burners, BTU/hr. input, percentage primary aeration and turndown ratio required. The burner selection will determine the total input, mixture quality, mixture pressure, and turndown. The turndown ratio determines the air pressure drop required across the mixer.

The sum of the high fire burner mixture pressure, pressure drop across the mixture, pressure losses in the air supply to the mixer and furnace pressure determines the minimum blower air pressure required.

Air pressure through the mixer develops the mixer pressure. Gas capacities are determined by the primary aeration required by the burners. Mixer designs are adequate to permit gas flow up to 20% of the air flows.

Features	Benefits
Compact air-gas mixers	Economical operation
High capacity with low pressure drop	Maintains process flow using less energy
Flanged construction	Fewer parts, easy installation

