Steam Measurements with Rosemount Flow Meters

For any point of steam measurement

In industrial facilities process heating accounts for an average of more than 60% of thermal energy use predominantly in the form of steam. Process heating also accounts for a significant portion of controllable operating costs. To control steam losses with a steam mass balance approach can be a great opportunity to reduce operating costs and improve profits.

Effectively manage energy consumption and cost

- Eliminate leak points and heat loss
- Maintain optimal combustion in the boiler
- Maintain balance system and eliminate condensate loss
- Rosemount instruments feature time-proven and trusted technologies

Eliminate process shutdowns and unplanned work

- Optimizing measurement accuracy
- Eliminate unreliable equipment
- Eliminate calibration events with in-line verification tools
- Adds control and keep helps to avoid energy loss issues

Meet safety and regulatory requirements

- Protect work force and equipment
- Increase safety and system stability
- Eliminate reportable events
- A simple, easy to install, effective way to make your operations more efficient

WHAT IF...

- You could save thousands of euro per year of the operational cost to run a plant in the form of loaded cost of steam - with a help of correctly sized flow meter by reducing pressure and energy loss.

For more information, visit Emerson.com/FlowMeasurement or contact your local Emerson Sales Representative
Rosemount™ meters provide safe and reliable steam measurements and control in all process industry points. Different technologies are available, so you can find the right solution for your case. Optimize energy mass balancing and improve billing accuracy with Differentiated Pressure flowmeters or save up to 30% per installation by eliminating the need for external temperature compensation with MultiVariable Vortex meter for saturated steam applications.

**Rosemount Multivariable Vortex Flowmeters**
- No moving parts, internal meter calibration
- Up to 38:1 flow turndown
- 10D upstream and 5D downstream requirements
- Sensor designed for wide process temperature range
- Compensated mass flow calculations with a pressure transmitter
- Multiple flange ratings for your high pressure steam needs
- All casted, and welded meter body design eliminates ports and crevices

**Energy Efficiency: 8800 Vortex**
- No impulse lines
- Accurate at low flow
- Suitable up to 427 °C
- Available in dual and quad version for redundancy requirements
- Multivariable capabilities

**Steam Distribution: 8800 Vortex**
- No impulse lines
- Easy to install
- Turndown in steam up to 38:1
- Integral mounted design up to 250°
- Pressure and temperature compensated

**Steam Recovery: 8600 Utility**
- Inline Technology eliminates impulse lines
- No impulse lines to plug or freeze
- All-cast construction prevents leaking
- No field calibration or zeroing required
- Optional mass flow-Integrated temperature compensation

**Rosemount Differential Pressure Flowmeters**
- Transmitters specified as percent of reading
- Up to 14:1 flow turndown
- Installs with 2D pipe straight run and compact mounting
- Fully-compensated mass flow calculation
- Insertion technology lowers cost in large lines
- Less blockage lowers permanent pressure loss
- Resistant to wear, warpage and plugging

**Energy Efficiency: 585 Main Steam Line Annubar**
- MultiVariable transmitter outputs mass or energy flow
- Suitable up to 649 °C
- Resistant to excessive vibration
- Easy to remove for boiler blowout

**Steam Distribution: 3051SFC Compact and 3051SFA Annubar**
- Easy to install
- Pressure and temperature compensated
- Mass or energy flow output
- Integral solution up to 205 °C
- 3051SFC available as:
  - Orifice Plate with 2D/2D straight length
  - Compact Annubar with low pressure loss

**Steam Recovery: 3051SFC Compact Orifice**
- Easy to install
- Temperature compensated
- Mass or energy flow output

For more information, visit [Emerson.com/FlowMeasurement](http://Emerson.com/FlowMeasurement) or contact your local Emerson Sales Representative.
## Steam Measurement Technologies Comparison Table

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**Key:** ● Best Choice  ● Suitable

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### Consider It Solved.

Emerson Automation Solutions supports you with innovative technologies and expertise to address your toughest challenges.

For more information, visit [Emerson.com/RosemountProductPage](https://Emerson.com/RosemountProductPage)