The Essential Guide to Process Flow Measurement

ABB manufactures more types of flowmeters than any other manufacturer and is the only manufacturer who can give totally unbiased advice as to which flowmeter is suitable for a given application. This wall-chart details the major flow measurement techniques ABB offers, their capabilities and their suitability for an application.

**Electromagnetic**

- **Flowmeters**: Vortex, Transit Time, Coriolis, Magnetic
- **Applications**: Liquids, gaseous including steam, slurries
- **Accuracy**: ±0.5% of span or better, calculated: ±0.2% of span
- **End Connections**: Flanged, sanitary connections
- **Limitations**: Requires flow straighteners; flow disturbance up to 10% of pipe diameter is acceptable

**Mass**

- **Flowmeters**: Variable Area, Coriolis, Magnetic
- **Applications**: Liquids, gaseous including steam, slurries
- **Accuracy**: ±0.5% of span or better, calculated: ±0.2% of span
- **End Connections**: Flanged, sanitary connections
- **Limitations**: Requires flow straighteners; flow disturbance up to 10% of pipe diameter is acceptable

**Vortex / Swirl**

- **Flowmeters**: Vortex, Transit Time, Coriolis
- **Applications**: Liquids, gaseous including steam
- **Accuracy**: ±0.5% of span or better, calculated: ±0.2% of span
- **End Connections**: Flanged, sanitary connections
- **Limitations**: Requires flow straighteners; flow disturbance up to 10% of pipe diameter is acceptable

**Variable Area**

- **Flowmeters**: Variable Area
- **Applications**: Liquids, gaseous including steam
- **Accuracy**: ±0.5% of span or better, calculated: ±0.2% of span
- **End Connections**: Flanged, sanitary connections
- **Limitations**: Requires flow straighteners; flow disturbance up to 10% of pipe diameter is acceptable

**Ultrasonic**

- **Flowmeters**: Ultrasonic
- **Applications**: Liquids, gaseous including steam
- **Accuracy**: ±0.5% of span or better, calculated: ±0.2% of span
- **End Connections**: Flanged, sanitary connections
- **Limitations**: Requires flow straighteners; flow disturbance up to 10% of pipe diameter is acceptable

For technical advice and further information on the ABB range of process flow products call: 0870 600 6122 or refer to the Assist Direct - Instrumentation Catalogue