



Pitot Tube (Orifice Flow Meter) (SMT-FM-19)

The Pitot tube enables the total pressure in a flowing fluid to be measured. The unit consists of a small tube that is positioned in the flow such that the opening is facing the flow. A wall bore in the measuring section of it is used as static tube. The Pitot tube and the static tube are connected to a differential pressure manometer. The dynamic pressure can be read directly. The flow velocity is calculated.

Technical Specifications

Specifications:

- Pitot tube for measuring pressure in a flowing fluid.
- Pitot tube made of PMMA.
- Display of pressure difference on manometer
- Water supply using SMT-FM-100 base module.
- Supplied with a comprehensive user guide.
- PVC Pipe Fittings.

Technical Data:

- Pitot tube.
 - Material: PMMA
 - Effective length: 250mm.
- Bend radius: 15mm.
- Small limb: 47mm.
- Pressure Measuring Tube:
 - Inner diameter: $\varnothing=6\text{mm}$.
 - Outer diameter: $\varnothing=8\text{mm}$.
- Weight: approx. 15kg.



Experimental Data:

- Determination of velocity profile in a tube flow
- Static and Dynamic Pressure Measurement
- Pitot static tube complete with scale for positioning within the tube.