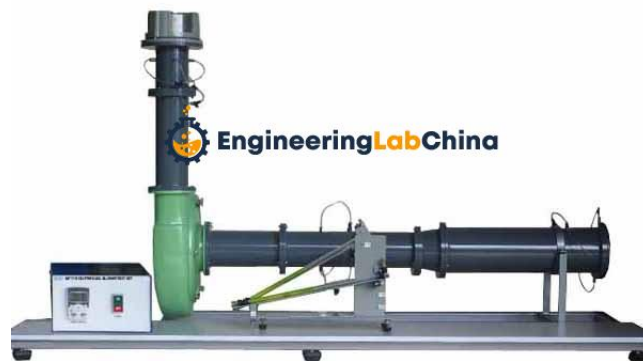


Product Name :
Centrifugal Fan Demonstration Unit

Product Code :
CHINAELABC2590005



Description :

Centrifugal Fan Demonstration Unit

Technical Specification :

The Advanced experimental unit provides the basic experiments to get to know the operating behavior and the most important characteristic variables of radial fans.

Radial fans are used to transport gases with non-excessive pressure differences.

The medium is drawn in axially to the drive shaft of the radial fan and is deflected by 90° by the rotation of the rotor and discharged radially.

To demonstrate the effect of different blade shapes two rotors are included in the scope of delivery: one rotor with forward curved blades and one with backward curved blades.

The rotors are easily interchangeable.

The experimental unit is fitted with sensors for pressure and temperature.

The flow rate is determinate via differential pressure measurement on the intake nozzle.

The microprocessor-based measuring technique is well protected in the housing.

The measured values are transmitted directly to a PC via USB where they can be analyzed using the software included.

FEATURES:

Functioning and operating behavior of a radial fan

Radial fan with 3-phase AC motor

Determination of flow rate via intake nozzle

Display of differential pressure, flow rate, speed, electrical power consumption and hydraulically power output, temperature and efficiency

Variable speed via frequency converter

Transparent intake and delivery pipes

Throttle valve to adjust the air flow in the delivery pipe

Interchangeable rotors: 1 rotor with forward curved blades and 1 rotor with backward curved blades

Display and evaluation of the measured values as well as operation of the unit via software

SPECIFICATIONS:

Intake pipe :

Inner diameter: 90mm & Length: 430mm

Delivery pipe :

Inner diameter: 100mm & Length: 530mm

Measuring ranges :

Differential pressure: 0...1800Pa

Flow rate: 0...1000m³/h

Temperature: 0...100°C

Speed: 0...3300min⁻¹

Electrical Power consumption: 0...250W

Power required: 230V, 50Hz, 1 phase

Radial fan :

Power consumption: 110W

Nominal speed: 2800min⁻¹

Max. Volumetric flow rate: 480m³/h

Max. Pressure difference: 300Pa



Engineering Lab China