

FANS FOR ROUND DUCTS

MAXI TRADE

Series VENTS TT PRO EC









Inline mixed-flow fans with the air flow up to 1970 m³/h

Application

VENTS TT PRO EC fans combine the versatility and outstanding performance of both axial and centrifugal fans producing a powerful air flow and high pressure while retaining the signature energy-efficiency and response of EC motors.

Integration of several fans into a single computercontrolled system with sensor feedback combined with speed control across the entire dynamic range.

Designed for supply and exhaust ventilation systems requiring high energy efficiency, excellent response, high pressure and air flow rate while keeping noise under control – such as high-humidity commercial and industrial spaces (e.g. bathrooms and kitchens) as well as flats, villas, shops and cafes.

Compatible with air ducts from 100 to 315 mm in diameter.

Design

The casing of VENTS TT PRO EC fan is made of low-combustible polypropylene. The removable central unit with a motor, impeller and terminal box is attached to the fittings by means of special mounting brackets with integral latches. This helps to make the fan maintenance extremely simple and convenient. Fan service no longer requires major disassembly and dismantling of the fan: all you have to do is remove the main unit from the casing and carry out the maintenance as required.

The inlet fitting has a profiled header which ensures smooth air flow into the fan. Conically shaped impellers with specially profiled blades cause circular velosity rise, that resuts in airflow boost and pressure increase comparing to conventional design.

The fan outlet combination of a diffuser, specially designed impeller and rectifier allow for the optimim air distribution: high air flow and pressure without excessive noise.

Motor

The fans feature high-efficiency electronically commutated (EC) direct current motors. These state-of-the-art units offer excellent energy efficiency. In addition to that EC motors combine high performance and optimum response over the entire speed range. The performance efficiency of electronically commutated motors reaches a staggering 90 %.

Speed control

The fans are controlled by means of a 0-10 V control signal while the performance regulation is based on the feedback from the temperature, smoke and other sensors as well as other vital parameter settings. As the control signal changes the EC fan changes speed accordingly to supply the exact air amount required by the ventilation system.

The maximum fan speed does not depend on the electric mains frequency enabling compatibility with both 50 Hz and 60 Hz networks. The fans can be easily combined into a single computer-controlled network. Special software allows for precise control over the operating parameters of the network units. All the system parameters can be monitored from the computer screen allowing to program operating parameters for each fan on the network individually.

Installation

The fans are intended for installation in matching diameter air ducts at any point of the ventilation system without limitation to mounting angle.

The fan casing has a flat mounting plate for a secure wall mounting.

Electrical connection and installation must be performed in accordance with the instruction manual and the electrical connections diagram applied to the terminal box.

A single system may have several fans installed in parallel to boost the output capacity or in series to boost the working pressure.

Designation key

| Series | Air duct diameter | Options | Motor type |
|--------------|--------------------------------------|--|---|
| VENTS TT PRO | 100; 125; 150; 160; 200; 250; 315 | U: speed controller with an electronic thermostat and a temperature sensor integrated inside an air duct. Temperature-based operation logic. Un: speed controller with an electronic thermostat and a temperature sensor fixed on a 4 m cable. Temperature-based operation logic. U2n: speed controller with an electronic thermostat and a temperature sensor fixed on a 4 m cable. Temperature-based switching on/off. P: built-in smooth speed controller. | EC : synchronous electronically commutated motor |

Accessories

















Clamps







Backdraft

Air shutter

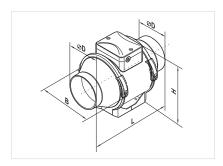
Temperature regler

Speed switches



Fan overall dimensions:

| T | Dimensions [mm] | | | | Mana [lan] |
|---------------|-----------------|-----|-----|-----|------------|
| Туре | ØD | В | Н | L | Mass [kg] |
| TT PRO 100 EC | 97 | 192 | 241 | 303 | 1.75 |
| TT PRO 125 EC | 123 | 193 | 241 | 259 | 2.15 |
| TT PRO 150 EC | 148 | 217 | 289 | 254 | 2.95 |
| TT PRO 160 EC | 158 | 217 | 289 | 254 | 3.25 |
| TT PRO 200 EC | 197 | 239 | 296 | 278 | 3.95 |
| TT PRO 250 EC | 247 | 288 | 339 | 383 | 7.80 |
| TT PRO 315 EC | 309 | 360 | 423 | 443 | 11.95 |



Technical data:

| | TT PRO 100 EC | TT PRO 125 EC |
|---|---------------|---------------|
| Voltage [V/50 Hz] | 1~230 | 1~230 |
| Power [W] | 30 | 40 |
| Current [A] | 0.29 | 0.37 |
| Max. air flow [m³/h] | 300 | 450 |
| RPM [min ⁻¹] | 3680 | 3750 |
| Sound pressure level at 3 m distance [dBA] | 47 | 49 |
| Transported air temperature [°C] | -25+55 | -25+55 |
| SEC class | В | В |
| Protection rating | IPX4 | IPX4 |

