HEAT RECOVERY AIR HANDLING UNITS

Series VENTS VUT2 200 P VENTS VUE2 200 P VENTS VUTE2 200 P



Suspended air handling units in heat- and sound-insulated casing with horizontal spigot orientation. Air capacity up to **220 m³/h**, heat recovery efficiency up to 89 %.

Description

The suspended air handling units VUT2, VUE2 and VUTE2 200 P are the fully-featured ventilation units that ensure air filtration, fresh air supply and stale air extract.

The model VUT2 ensures sensible heat recovery and the models VUE2 and VUTE2 ensure sensible heat and moisture recovery in two plate heat exchangers.

The units are applied as components of ventilation and air conditioning networks for various premises. The units are featured with extremely low noise level due to the fans located between two heat exchangers.

High heat recovery efficiency of the units meets the strict energy saving market demands. Compatible with round \emptyset 125 mm air ducts.

Modifications

VENTS VUT2 200 P – unit with two aluminium cross-flow heat exchangers.

VENTS VUE2 200 P – unit with two cross-flow heat exchangers from polymerized cellulose.

VENTS VUTE2 200 P – unit with two cross-flow heat exchangers (one made of polymerized cellulose and another made of aluminium).

Casing

Made of aluzinc, internally filled with 10 mm cellular polypropylene heat- and sound-insulating layer.

Filter

Supply and extract air flows are purified through two bag filters with filtering class G4.

Fans

The unit is equipped with a supply and exhaust centrifugal fan with backward curved blades and integrated overheating protection thermostat with automatic restart. The motors and the impellers are dynamically balanced in two planes.

Heat exchangers

The units incorporate two heat exchangers types:

The aluminium heat exchangers are designed to ensure sensible heat energy transfer from extract to supply air flow. The heat exchangers are distinguished by long service life in a cold climate.

The enthalpy polymerized cellulose heat exchanger are designed to recuperate sensible heat and latent energy contained in the extract air to warm up supply air flow. The heat exchangers are frostproof and produce no condensate. The units with such heat exchangers are recommended for use in air conditioned premises.

The unit VUT2 200 P is equipped with two aluminium cross-flow heat exchangers with drain pans and heat exchanger freezing protection.

The VUE2 200 P unit is equipped with two enthalpy polymerized cellulose counter-flow heat exchangers. The unit VUTE2 200 P is equipped with two crossflow heat exchangers, one made of aluminium and another of polymerized cellulose. The unit has a drain pan to remove condensate from the aluminium heat exchanger.

Control and automation

The unit is equipped with a switch that enables selection of one of three unit operation modes: standby mode, low speed (LOW) and medium speed (MED).

The unit may be equipped with P3-1-300 switch that enables switching the unit on/off and setting one of three unit operation modes: low speed (LOW), medium speed (MED) and high speed (HIGH).

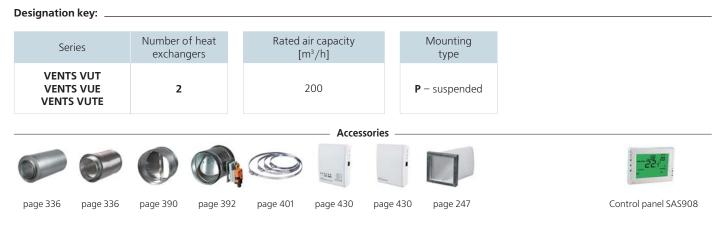
The unit may be equipped with a CO_2 sensor (not included into the delivery set). In case of high CO_2 concentration it switches the unit to maximum (HIGH) speed.

The unit may be equipped with SAS908PIT LCD control panel (not included into the delivery set) for turning the unit on/off, switching to low, medium and high speed as well as room temperature displaying.

The integrated freezing protection system is designed to prevent the heat exchanger freezing at low temperatures. In case of freezing danger indication by the temperature sensor the supply fan is turned off to let warm extract air flow pass by the heat exchangers and warm them up. After freezing danger is no longer actual, the supply fan is turned on and the unit reverts to the standard operation mode.

Mounting

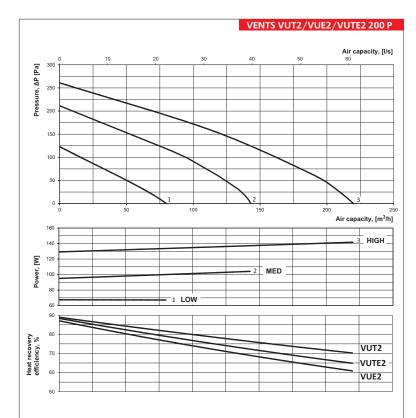
The unit is designed for suspended ceiling mounting in balcony, storeroom, basement, attic and other auxiliary premises. The unit is also suitable for installation in major premises directly to the ceiling, behind the false ceiling or in the ceiling recess. Acess for servicing and cleaning through the bottom panel. The unit is suitable for wall mounting as well.



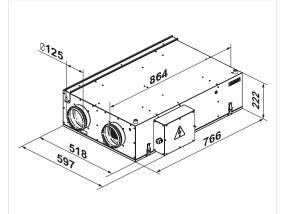
Technical data:

		VUT2 200 P VUE2 200 P VUTE2 200 P	
Ventilation mode (speed)	LOW (low)	MED (medium)	HIGH (maximum)
Voltage [V / 50 Hz]		1 ~ 230	
Max. unit power [W]	67	104	142
Fan current [A]	0.58	0.63	0.68
Max. air capacity [m³/h]	80	143	220
RPM [min ⁻¹]	1120	1890	2910
Sound pressure level at 3 m [dBA]	20	28	36
Max. transported air temperature [°C]	from - 25 °C up to +40 °C		
Casing material	aluzinc		
Insulation	10 mm cellular polypropylene		
Filter: extract / supply	bag type G4 (order code SFK VUT2 200-250 P/P EC G4)		
Connected air duct diameter [mm]	Ø 125		
Heat recovery efficiency	up to 89 %		
Heat exchanger type	cross-flow, 2 items		

 * maximum speed is activated by a signal from the control panel, humidity sensor, thermostat, $\mathrm{CO}_{_{2}}$ sensor, etc.



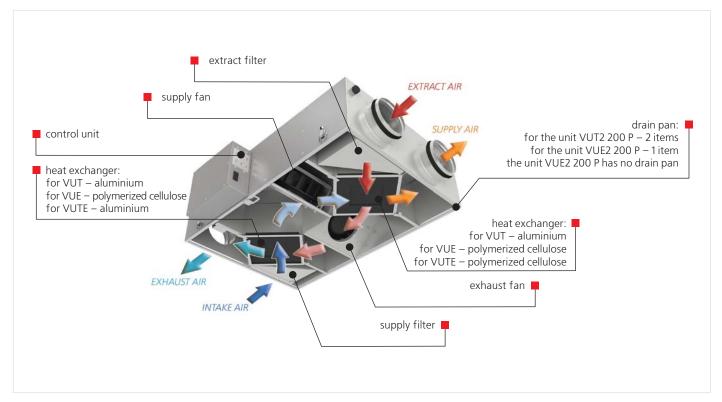
Overall dimensions:





HEAT RECOVERY AIR HANDLING UNITS

Unit design:



Application example:

