

WISE DPS

Duct pressure sensors - Duct Pressure Sensor



QUICK FACTS

- Measurement of duct pressure
- Integrated radio antenna for wireless communication

Technical description

General

- Pressure sensor with mounting plate and duct nipple.
- Designed for demand controlled ventilation of premises with a varying load.
- Designed for comfort ventilation.
- Moist, cold and aggressive environments must be avoided.
- Can be installed in both supply and extract air systems.

Functions

- Measurement of duct pressure.
- Wireless communication in Swegon's WISE system.

Materials and surface treatment

Enclosed in plastic PP. All sheet-metal parts are galvanized sheet steel (Z275).

The front piece is finished in grey NCS S5500-N.

Installation

The pressure sensor can be mounted in an optional position in the system to measure the duct pressure. The hose should be connected "+" (red)" to measure the duct pressure on the supply air and "-" (blue)" to measure the duct pressure on the extract air. NOTE: Do not twist the hose during installation, as this may restrict air flow.

The pressure sensor should be mounted with the diode visible to assist pairing.

Project planning/Typical room

See the separate documentation "WISE System Guide", which is available for download via www.swegon.com.

Commissioning

Use TuneWISE for commissioning, see the WISE commissioning manual.

Maintenance

If necessary, use a dry cloth when cleaning. Never use water, detergent, cleaning solvent or a vacuum cleaner.

Environment

The Building Materials Declaration is available from www.swegon.com.

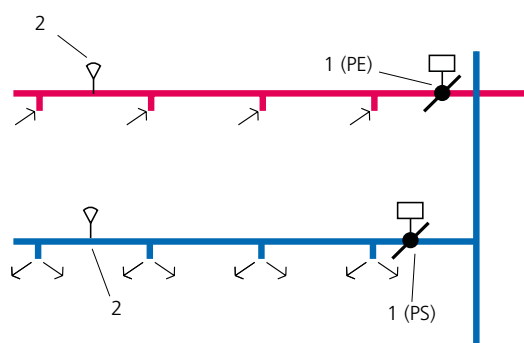


Figure 1. Constant pressure regulation recommended installation 2/3 out in duct.

1. WISE Damper
2. WISE DPS

Technical data

Power supply:	24V AC $\pm 10\%$ 50-60 Hz
Max. power consumption:	2 VA
Cable rating, connector:	Power: max. 2.5mm ²
Frequency band:	2.45 GHz IMS band (2400–2483 MHz)
Output (ERP):	50 mW
Range of measurement	
Pressure:	0 – 300 Pa
IP class:	IP20
Ambient temperature	
Operation:	0 – 50°C
Storage:	-20 – +50°C
RH:	10 – 95% (non-condensing)

Dimensions and weights

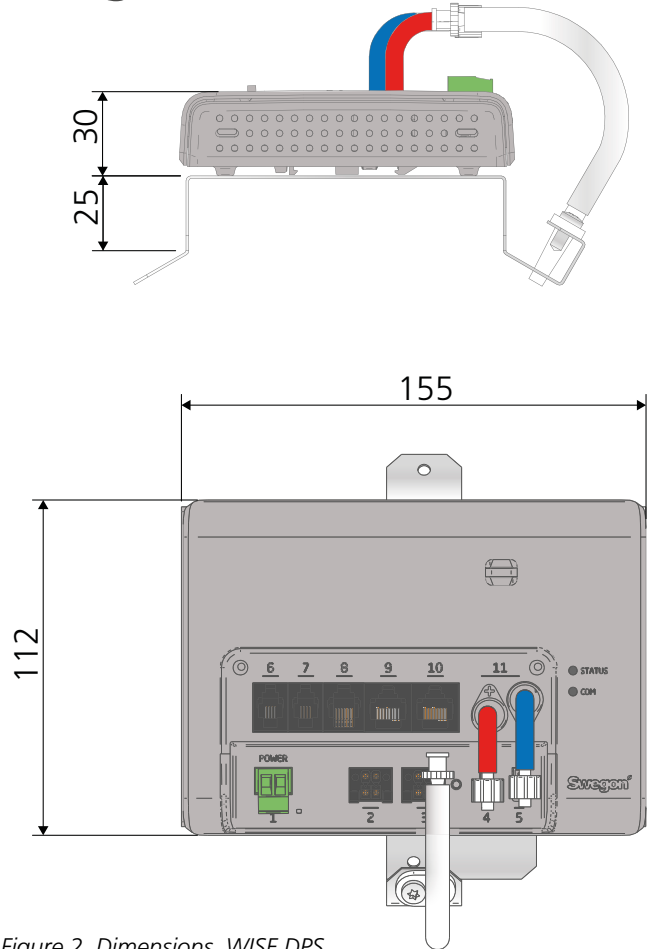


Figure 2. Dimensions, WISE DPS.

Weight (kg)
0.43

Specification

Product	Duct pressure sensors	WISE DPS	b
Version:			

Specification text

Example of a specification text according to VVS AMA.

- UBC.13** Sensor for pressure, duct mounted
- Make: Swegon
- Type: WISE DPS
- Pressure sensor for Swegon’s system WISE, with the following functions:
- Measurement and reporting duct pressure via wireless communication in Swegon’s WISE system.
 - Easy mounting on the ventilation duct with mounting plate and duct nipple.
 - Designed for demand controlled ventilation of premises with a varying load.

Specification	
Power supply:	24V AC
IP class:	IP20
Corrosivity class:	C3
Range of measurement pressure:	0-300 Pa
Type:	WISE DPS b xx items

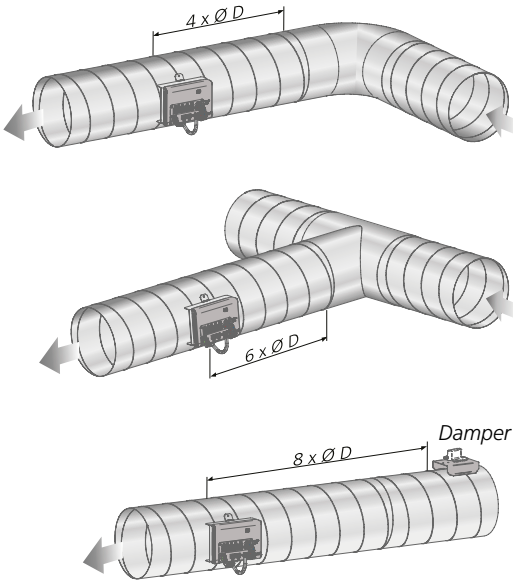


Figure 3. Straight section requirement before WISE DPS.