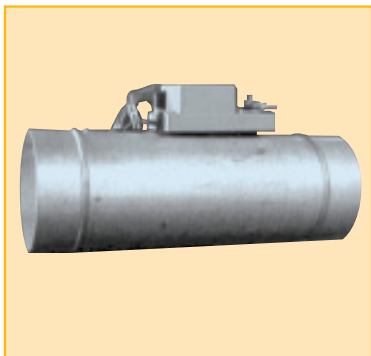


VAV CIRCULAR TERMINAL BOXES

TYPE: BR

Installation dimensions

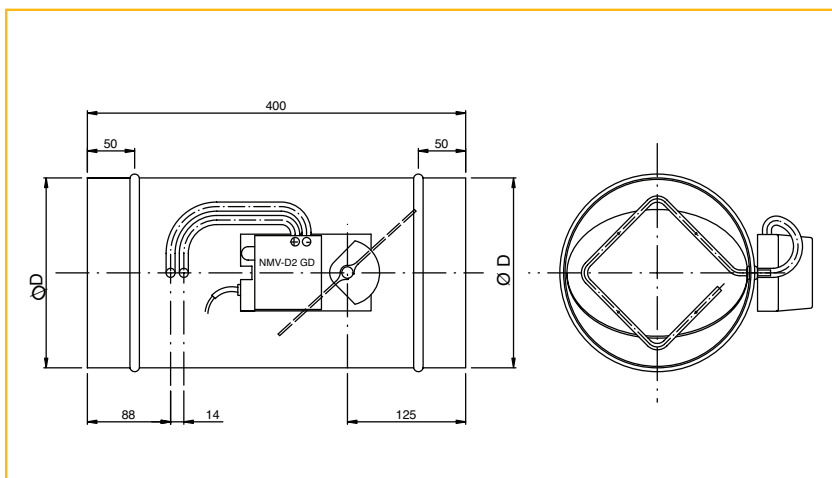


Application

The circular terminal boxes BR are designed for single duct high velocity constant or variable flow rate applications and can be used both in supply (BRT) and exhaust air (BRA). The air flow rate control is pressure independent and achieved by a precision engineered damper which modulates in response to a differential pressure sensor and an electronic velocity control device with motor.

A direct communication is possible between the VAV boxes and the central control area.

The volume control and the complete shut-off of the VAV box are obtained by the same damper. Taking into account the reduced pressure loss in the damper, the boxes need a minimum of inlet pressure which results in remarkable savings in the total energy requirements.



Regenerated noise = air generated noise + casing radiated noise

Size (mm)	Air flow (m³/h)	Pressure loss dPs (Pa)		
		100 Pa	250 Pa	500 Pa
100	150	35	43	49
	200	38	46	52
	300	42	50	56
125	200	34	43	50
	300	40	46	52
	400	43	51	54
160	300	35	44	49
	500	41	46	53
	700	46	51	56
200	600	37	46	52
	800	40	48	53
	1200	47	52	58
250	900	35	47	54
	1200	38	48	56
	1500	42	50	58
315	1200	35	46	54
	1900	39	48	55
	2500	44	52	59

Lw in Nr values with 8 dB (room attenuation) reduced.

Technical information

Characteristics

- designed for flow rates from 50 up to 3600 m³/h
- available in 6 sizes

VAV CIRCULAR TERMINAL BOXES

TYPE: BR

Controls

- each VAV box is equipped with an electronic velocity regulator and motor; together with the pressure differential sensor it guarantees a pressure independent variable or constant air flow.
- all controls are mounted externally for an easy access
- motor : Belimo Compact NMV-D2
 - power supply : 24 VAC/DC
 - control signal 0-10 VDC
 - integrated regulator
 - min. or max. air flow rates (VAV) to indicate by order; adjustment always possible on site
 - in case of constant flow rate control (CAV), indicate requested constant flow rate
 - documentation and wiring diagram available on simple request

Construction

- casing in galvanised sheet steel
- air flow control damper in extruded aluminium with keyed shaft; internal pivot points have lubricant-free bearings
- pressure differential sensor in aluminium; connection sensor-controller by plastic tubes
- insulated casing on request

Specifications description

Example :

VAV box in galvanised sheet steel, equipped with electronic Belimo (NMV-D2) controller, and a built-in aluminium pressure differential sensor. The aluminium single blade damper has lubricant-free bearings.

Type **BR . . . B5**
Size ... mm.

How to order

VAV-box for supply, size 160 mm.

