# Halton Max MLC

# Airflow management damper for VAV applications with zero safety distance.

Halton Max MLC is perfect for demanding and flexible space requirements. The variable-air-volume operating principle makes it particularly suitable for demand-based office applications. Halton Max MLC operates with air velocities as low as 0,5 m/s.

#### Zero safety distance

Halton Max MLC can be installed without upstream safety distance in all installation cases. Mounting behind a duct bend, T-branch or sound attenuator does not affect the product performance. The damper can be installed both on supply and exhaust side.

### Low air velocity range 0,5 - 6 m/s

Halton Max MLC is designed to operate at very low air velocity and pressure. The calibrated orifice plate enables correct airflow measurement even at very low air speeds. The system meter is dust resistant.

### **Flexible installation**

All products are individually calibrated at the factory to ensure the highest possible reliability and accuracy. Thanks to this, the product is quick to install.

#### **Tightness class**

- Casing tightness: EN 1751 class C
- Shut-off operation tightness: EN 1751 class 4

### **Operating principle**

Halton Max MLC can operate either in duct static pressure control mode or duct airflow control mode, depending on chosen control unit. It maintains the required airflow level or pressure level through static pressure measurement. For ductwork static pressure control, a static pressure measurement unit (Halton MSS) with a pressure transmitter is used for zone ductwork static pressure measurement. A range of control units are available for



various application needs, enabling energy-efficient HVAC system distribution by optimizing the amount and temperature of distributed air.

Changes in room conditions can be adjusted manually from an end-user interface or by different sensors such as occupancy or room-pressure sensors, thermostats or timers. The conditions can also be managed remotely from the building management system (BMS). The control signal and the airflow measurement data from the pickup tubes are processed in the VAV controller. The VAV controller gives the actuator a command to change the position of the damper blade, in order to keep the airflow at the predefined setpoint.

The airflow setpoint can be modified between minimum and maximum settings from the room controller interface or a BMS. The VAV controller can also send actual value data back to the room interface controller. The communication protocol used for the signal between the room control interface and the VAV controller depends on the actuator model.

## **Key features**

- For VAV applications
- Zero safety distance
- Low air velocity range 0,5 6 m/s

- Factory pre-calibration
- Tightness class: EN 1751 class C (casing) and class 4 (shut-off)

