# RICKARD INTEGRATED DIFFUSER CONTROLS & SENSORS

# **DESCRIPTION**

Rickard have controls built into the diffuser which can manage a range of sensor options. They can be integrated into a BMS to regulate the HVAC system output in response to varying thermal conditions and maintain comfort.

**Onboard Air Flow Sensor** 

Rickard electronic ceiling and linear diffusers are available with onboard air flow sensing that enables commissioning to occur easier and faster.



- Supplies the precise amount of air required via the unique air trimming feature on each diffuser
- Allows the ventilation system to be electronically tuned remotely though the Rickard MLM software without the requirement of an Air Capture Hood
- Can be fitted to every Rickard diffuser for accurate air flow calculations or one diffuser per zone
- Includes commissioning mode that allows a maximum flow value to be limited to design volumes under maximum load conditions.

# **Onboard Temperature and Occupancy Controller**

The onboard temperature and occupancy controller is a cost effective and small module that plugs into a VCD or VSD diffuser making that diffuser the master of the room.



- Allows room temperature and occupancy to be monitored from the centre of the Rickard diffuser and managed within that space accordingly
- Controlled from a BMS or Rickard infrared remote set point adjuster

### **Infrared Remote Set Point Adjuster**

The set-point can be easily adjusted on individual diffusers for temperature or set to standby mode when a room unoccupied.

- · Gives the occupant personalised comfort control of the environment
- Set point adjuster links directly via Infrared signal to the diffuser's onboard controller



# Onboard Temperature Sensor

Mounted in the base of a VCD or VSD diffuser this optional sensor with controller monitors the temperature from within that specific area or zone



- The diffuser has a venturi tube that draws air past the sensor making room temperature measurement accurate
- Controlled from a BMS or Rickard infrared remote set point adjuster

# Flush Mounted Temperature Sensor

When the temperature monitoring is required in a targeted location, this flush mounted sensor can be mounted on any facing in the room.

- · Direct connects to the diffusers onboard temperature controller
- · Controlled from a BMS or Rickard infrared remote set point adjuster



# **Onboard Occupancy Sensor**

Rickard VAV electronic diffusers can also be fitted with occupancy sensing capability with controller. This unique option is available with VCD or VSD diffusers which means no additional sensor or wiring is required.



- · The diffuser automatically backs off the supply of air to that room once a room with occupancy sensing is unoccupied
- The diffuser will return to automatic control when the room becomes occupied
- Factory pre-set to a 15 minutes exit room delay, but can be easily adjusted using the Rickard MLM software
- Controlled from a BMS or Rickard infrared remote set point adjuster

## **TECHNICAL DATA**

	Model Number	Description	Input Power	Mounting
	RICK-MLMOC	Onboard temp/occ controller	12V from control unit	Inside diffuser
	RICKMLMIROC	Onboard temp/occ infrared controller	12V from control unit	Inside diffuser
	RICK-SENS-TCAP	Temperature sensing cap for ceiling diffusers	12V from onboard controller	Flush mount to diffuser plate
May 1	RICK-SENS-RTS	Flush mounted temp sensor, c/w 8m cable	12V from onboard controller	Wall / Ceiling
	RICK-CU-OCC	Occupancy sensing cap for ceiling diffusers	12V from onboard controller	Flush mount to diffuser plate
	RICK-CU-SPADJ	Infrared remote control (for the RICKMLMIROC)	3 x AAA batteries	Sits in wall mount holder

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