

Duct sensor SK10-THC-KF10

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Article no. **30531010**



Duct sensor
IP65/54

**Measuring and control unit with duct sensor for temperature and humidity.
Protection class IP65 (SK10 housing) / IP54 (sensor)**

**The duct sensor is suitable for air ducts from 100 mm diameter.
The sensor can also be mounted on rectangular ducts.**

Device description

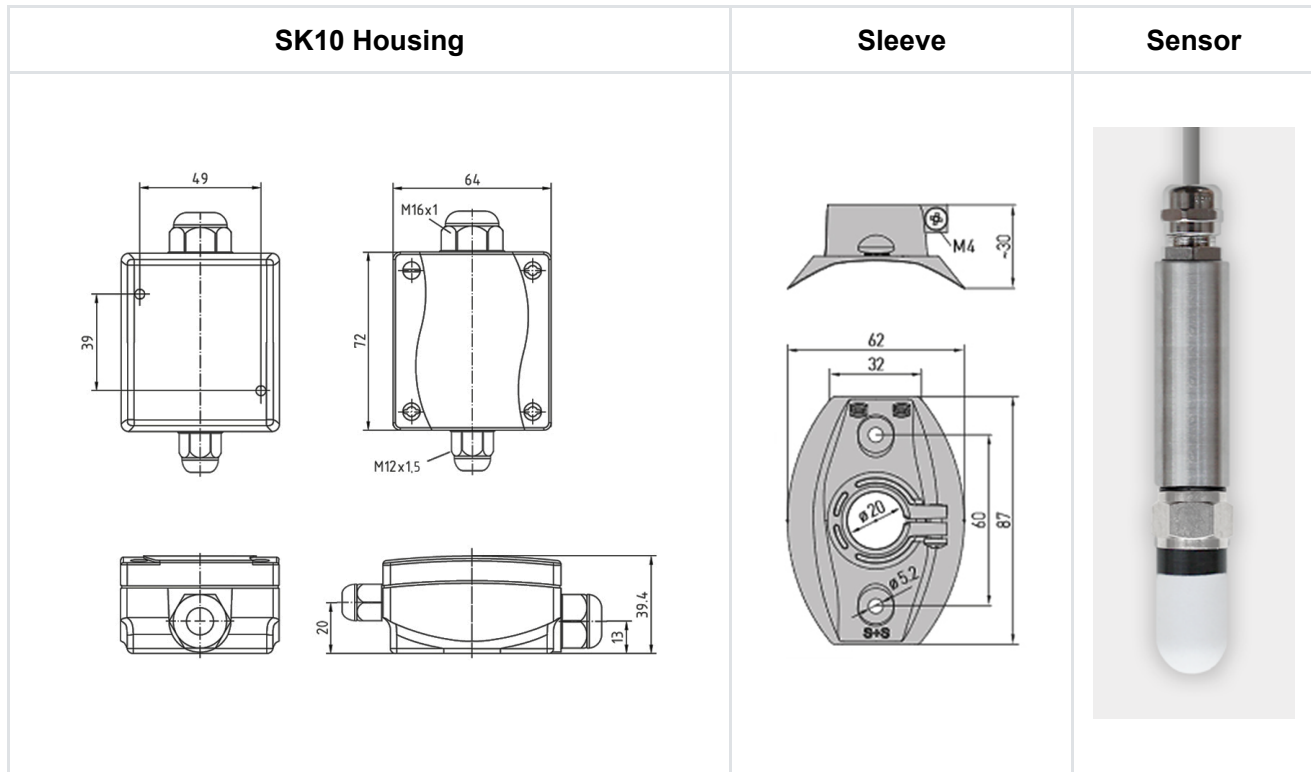
- Measured values:
 - Air temperature, can be weighted with an external temperature.
 - Relative humidity
- Calculated values
 - Absolute humidity
 - Dew point temperature with alarm / control in case of condensation danger
 - Energy content (Enthalpy)
- Control functions for heating and cooling applications (also combinable)
- Setpoint temperatures for comfort, standby, economy, and protection mode, selectable via KNX HVAC objects
- Setpoint change via objects
- Detection of the minimum and maximum temperature
- Heat and frost alarm
- Limits for temperatures and humidity
- Fan control via humidity limits and external inputs
- Detection of the dew point temperature of the air with alarm / control in case of condensation risk
- Tracking functions for setpoint and limit temperatures
- Controller output 0..100% or configurable PWM for thermal actuators
- Valve flush function
- Second temperature controller as auxiliary controller
- Four logic blocks for the logical combination of internal and external signals
 - 10 assigned logic inputs / outputs
 - Heating request and cooling request also available as signals
 - Functions "AND, OR, NOT, XOR" for binary logic
 - Functions "+ - *" for 8-bit values
 - Function '=' for conditional event forwarding

For the exact functionality of the coupling module, see description
"Manual ETS-App HLK305"

Technical data

SK10-THC-KF10	
Supply voltage	KNX 21 .. 32V DC
KNX load	10mA
Operating/storage temperature	-25 .. +80°C/-25 .. +80°C
Environment humidity	0 .. 100% non-condensing
Dimensions housing/sleeve	see drawing
Sensor dimensions	Length 125mm / Diameter 20mm
Sensor cable length	1,8m
Article number	30531010
ETS-application	HLK305
Protection class Housing	IP65
Protection class Sensor	IP54
Measured value temperature	
Measuring range	-25 .. +80°C
Resolution	0,02°C
Accuracy	±0,4°C (5..60°C), else ±0,8°C
Measured value relative humidity	
Measuring range	0 .. 100% r.H
Resolution	0,02%
Accuracy	±3% r.H (20..80%) at +20°C, else ±5%

Drawing



In Case of Bus Voltage Recurrence

All changes made using the help key for the KNX bus are saved if the device has been correctly parameterized. By using the weighted mixture temperature, the external temperature scaling is set to 0% until an external temperature value is received. The measuring and control values start with their current values (integral component=0 by PI-Controller). The ETS parameter settings are retained.

Discharge Program and Reset Sensor

In order to delete the programming (projecting) and to reset the module back to delivery status, it must be switched off (disconnect the KNX bus).

Press and hold the programming button while reconnecting the KNX bus and wait until the programming LED lights up (approx. 5-10 seconds). Now you can let go of the programming button and the module is ready for a new project planning.

If you let go of the programming button too early, repeat the procedure.

Imprint

Editor: Arcus-EDS GmbH, Rigaer Str. 88, 10247 Berlin

Responsible for the content: Hjalmar Hevers, Sascha Bergmann

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Warranty

We provide warranty within the scope of the legal provisions. In the event of a malfunction, please contact us and send the device with an error description Our company address mentioned below.

Manufacturer



Arcus-EDS GmbH
Rigaer Str. 88
10247 Berlin

Disposal



The symbol of the crossed -out garbage bin on the device or the packaging means that the product at the end of his service life may not be disposed of with other general waste.

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The CE sign is a free traffic sign that turns exclusively to the authority and none Assurance of properties.



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