



The Room Temperature Controller Fan Coil, RTF/A 1.1 is a constant KNX room temperature controller for Fans/Coils in 2 and 4-pipe systems.

It measures the current room temperature (actual value) and sends a continuous control variable (0...100 %) to a Fan Coil actuator in order to achieve the desired room temperature (target value).

The RTF/A 1.1 operates both in heating and cooling mode. Furthermore, the fan stage can be manually selected via a button.

Switches or push buttons (floating) can be connected for switching, dimming or control of shutters via three binary inputs (see external interface).

The RTF/A 1.1 supports four operating modes to simply matching the setting values to comfort and energy conservation requirements:

- Comfort
- Standby
- Night time operation
- Frost protection operation

The RTF/A 1.1 does not require an additional power supply. The KNX bus coupler is integrated into the device.

#### Technical data

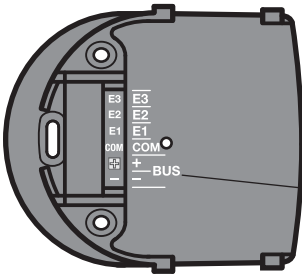
<b>Power supply</b>	<ul style="list-style-type: none"> <li>– Operating voltage</li> <li>– Current consumption KNX</li> <li>– Power consumption via KNX</li> </ul>	21...30 V DC, made available by the bus 10 mA 300 mW
<b>Inputs</b>	<ul style="list-style-type: none"> <li>– Number</li> <li>– Contact voltage</li> <li>– Contact current</li> <li>– Maximum cable length</li> </ul>	3 3.3 V supplied internally 1 mA 5 m
<b>Connections</b>	<ul style="list-style-type: none"> <li>– KNX</li> <li>– Load circuits (1 terminal per contact)</li> <li>– Cable cross-section</li> <li>– Tightening torque</li> </ul>	Connection terminal, 0.8 mm Ø, single core Screw terminal Max 1.5 mm <sup>2</sup> stranded Max 1.5 mm <sup>2</sup> single core Recommended: 0.75 – 1 mm <sup>2</sup> 0.6 Nm
<b>Operating and display elements</b>	<ul style="list-style-type: none"> <li>– Temperature setting</li> <li>– Fan stages</li> <li>– 5 LEDs</li> </ul>	Rotary adjustment switch Push buttons 3 fan stages, off, automatic mode
<b>KNX safety extra low voltage</b>	<ul style="list-style-type: none"> <li>– SELV 24 V DC</li> </ul>	
<b>Enclosure</b>	<ul style="list-style-type: none"> <li>– IP 21</li> </ul>	to DIN EN 60 529
<b>Safety class</b>	<ul style="list-style-type: none"> <li>– III</li> </ul>	to DIN EN 61 140
<b>Temperature range</b>	<ul style="list-style-type: none"> <li>– Operation</li> <li>– Storage</li> <li>– Transport</li> </ul>	0° C ... + 50° C – 25° C ... + 55° C – 25° C ... + 70° C
<b>Design</b>	<ul style="list-style-type: none"> <li>– Surface mount, SM</li> <li>– Dimensions (H x W x D)</li> </ul>	Design device 80 x 84 x 28 mm
<b>Weight</b>	<ul style="list-style-type: none"> <li>– in kg</li> </ul>	0.065
<b>Mounting position</b>	<ul style="list-style-type: none"> <li>– as required</li> </ul>	
<b>Housing, colour</b>	<ul style="list-style-type: none"> <li>– Plastic housing, white</li> </ul>	
<b>Approvals</b>	<ul style="list-style-type: none"> <li>– KNX to EN 50 090-2-2</li> </ul>	Certification
<b>CE mark</b>	<ul style="list-style-type: none"> <li>– in accordance with the EMC guideline and low voltage guideline</li> </ul>	

Application program	Max. number of communication objects	Max. number of group addresses	Max. number of associations
FanCoil Operation Control /1	18	34	35

**Note**

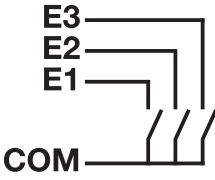
The programming requires EIB Software Tool ETS2 V1.3 or higher. Refer to the product manual “Room Temperature Controller Fan Coil, RTF/A 1.1” for a detailed description. The product manual can be downloaded free on the internet at [www.abb.de/KNX](http://www.abb.de/KNX).

**Circuit diagram**



Functionality of external interfaces, potential range, contacts

- E1 – E3: switching, dimming, blinds
- E3: external actual value
- Connect the bus cable to the bus line (red +/black -). (Note the polarity!)



The inputs with the functionality “switching” can also be used as window contact or presence indicator.

**Dimensional drawing**

