

Daikin Home Controls

Wired analog thermostat

EKWCTRAN1V3

Description

The Daikin Wired Digital Thermostat is a high-quality room thermostat in modern design for the registration and regulation of the desired room temperature, offering maximum user comfort.

The Daikin Wired Digital Thermostat is available for 230 V operating voltage. A simple room-by-room temperature control is already possible with directly connected actuators. In conjunction with the connection unit Daikin UFH Base Station, a perfectly matched overall system for surface temperature adjustment can be realized.

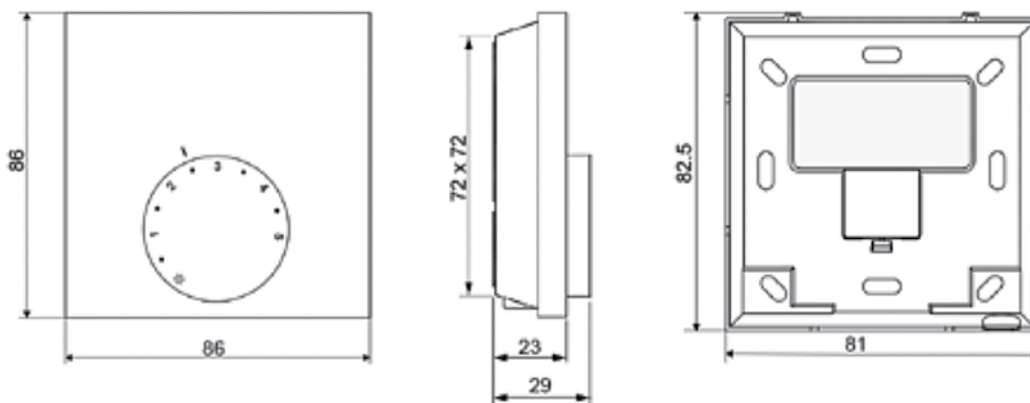
The setting of the desired room temperature and the operation, can be performed comfortably via a rotary control. An optimum price-performance ratio is offered for rooms where only a very good temperature control is desired, without the comfort function of the display variant.



Features

- › Flat design and small dimensions (86 x 86 x 29 mm)
- › Regulation in stand-alone or in the system
- › Equipment for heating and cooling systems
- › Reduction input for room temperature reduction
- › Target value calibration
- › Limitation of the target temperature setting range
- › Valve and antifreeze protection function
- › Change-over input
- › High-quality, modern design
- › High functional security

Dimensions (in mm)

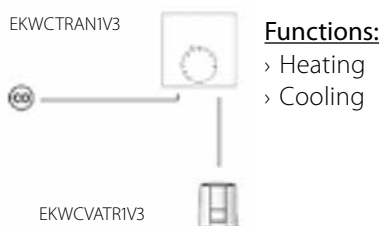


Technical data

Material	EKWCTRAN1V3		
Operating voltage	230 V ±10 % 50 Hz	Fuse	T2AH
Voltage supply	via base/mains connection	Max. number of connectible actuators	10 (max. 3 W/actuator)
Power consumption in idle operation	<0.3 W	Control direction of actuators to be connected	NC
Rated current w/o valve drives	≤2 mA	Switching element	Relay
Max current draw allowed with connected valve drives	1.8 A	Switching power	1.8 A ohmic load, 200 VA inductive
Target temperature setting range	10 to 28°C	Change-over input	switchable via potential-free contact
Target temperature resolution	0.25 °C	Reduction input	yes
Actual temperature measuring range	0 – 40°C	Reduction temperature	2 K
Set value calibration	±2 K	Antifreeze temperature	Normal operation: 10 °C Reduction: 8 °C
Measuring accuracy of actual temperature	±0.5	Valve protection function	Once every 14 days for 6 minutes
Type of installation	On-surface wall installation	Protection class	II
Ingress protection	IP20	Pollution degree	2
Admissible ambient temperature	0 to 50°C	Connection line	NYM-O 5 x 1.5 mm ²
Admissible storage temperature	-25 to +75 °C	Connection terminals	7 screw terminals 0.22 – 1.5 mm ²
Admissible ambient humidity	80%, not condensing		
Rated impulse voltage	1500 V		
Net weight	90 g	Casing material	PC + ABS
Net dimensions (W x H x D)	86 x 86 x 29 mm	Colour	Signal white (RAL 9003)
Gross weight	120 g		
Gross dimensions (W x H x D)	91 x 88 x 42 mm		

Installation examples

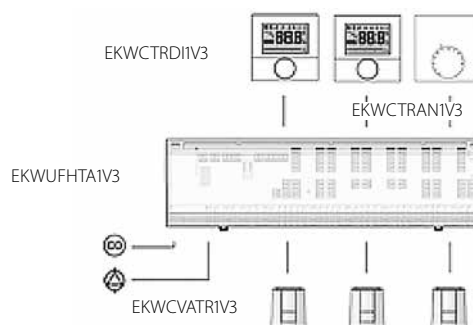
Stand alone



Functions:

- › Heating
- › Cooling

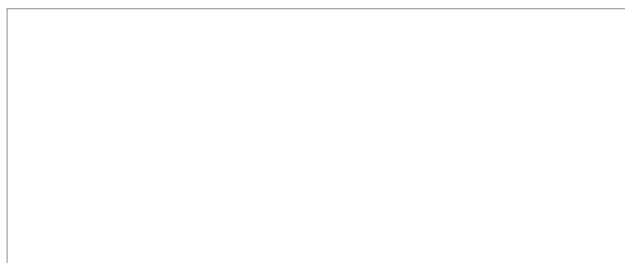
With UFH base station



Functions:

- › Heating
- › Cooling
- › Extended pump/boiler control with lead time and follow-up time
- › Connection for external system clock (opt.)

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ECPEN19-717

01/19



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Daikin Home Controls

Wired digital thermostat

EKWCTRDI1V3

Description

The Daikin Wired Digital Thermostat is a high-quality room thermostat in modern design for the registration and regulation of the desired room temperature, offering maximum user comfort.

The Daikin Wired Digital Thermostat is available for 230 V operating voltage. A simple room-by-room temperature control is already possible with directly connected actuators. In conjunction with the connection unit Daikin UFH Base Station, a perfectly matched overall system for surface temperature adjustment can be realized.

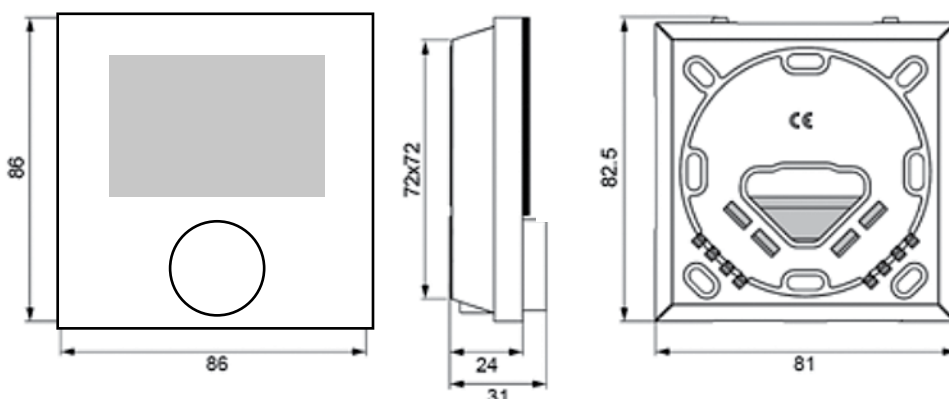
The setting of the desired room temperature and the operation, can be performed comfortably via a rotary control with rotary-push action and soft ratchet. The well-structured and language-neutral symbols of the display always clearly indicate all settings.



Features

- › Large, clearly structured LCD with background illumination allows reading the display even in the dark
- › Flat design and small dimensions (86 x 86 x 31 mm)
- › Smart Start / Smart Stop function
- › Selectable operating modes
- › Comfort programs for heating and cooling operation
- › Correction of actual temperature registration
- › Limitation of the target temperature setting range
- › Valve and antifreeze protection function
- › Change-over input
- › Suitable for NC and NO operation
- › Easy, intuitive installation, operation and maintenance

Dimensions (in mm)

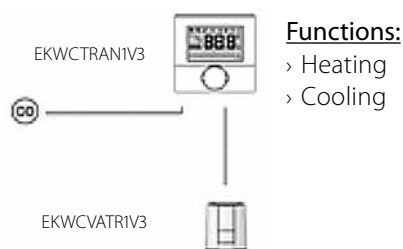


Technical data

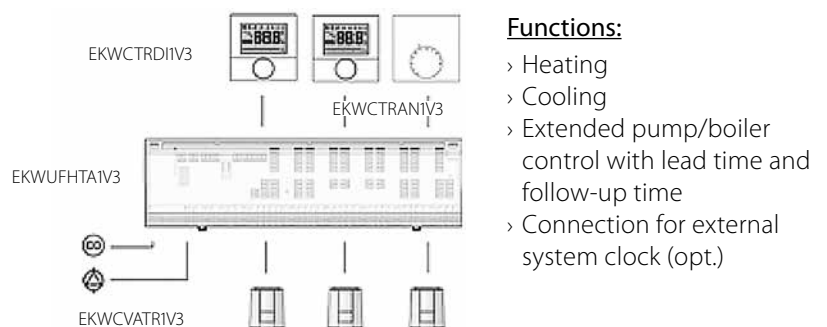
Material	EKWCTRD11V3		
Operating voltage	230 V ±10 % 50 Hz	Fuse	T1AH
Voltage supply	via base/mains connection	Max. number of connectible actuators	5 (max. 3 W/actuator)
Power consumption in idle operation	<0.3 W	Control direction of actuators to be connected	NC/NO
Rated current w/o valve drives	≤2 mA	Switching element	Relay
Max current draw allowed with connected valve drives	1 A	Switching power	1 A ohmic load, 200 VA inductive
Target temperature setting range	5 to 30°C	Change-over input	electronically
Target temperature resolution	0.2 °C	Reduction input	yes
Actual temperature measuring range	0 – 40°C	Reduction temperature	Adjustable value for day and night temperature (heating & cooling)
Set value calibration	±2 K	Antifreeze temperature	5 °C
Measuring accuracy of actual temperature	±0.5 K between 17 and 24 °C	Valve protection function	Once every 14 days for 10 minutes
Controlling precision	±0.5 K between 17 and 24 °C		
Type of installation	On-surface wall installation	Protection class	II
Ingress protection	IP20	Pollution degree	2
Admissible ambient temperature	0 to 50°C	Connection line	NYM-O 5 x 1.5 mm ²
Admissible storage temperature	-20 to +70 °C	Connection terminals	6 screw terminals 0.22 – 1.5 mm ²
Admissible ambient humidity	80%, not condensing		
Rated impulse voltage	1500 V		
Net weight	105 g	Background illumination	yes
Net dimensions (W x H x D)	86 x 86 x 31 mm	Casing material	ABS
Gross weight	140 g	Decorative panel material	Acrylic glass XT
Gross dimensions (W x H x D)	91 x 88 x 42 mm	Colour	Signal white (RAL 9003)

Installation examples

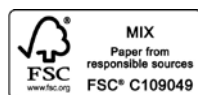
Stand alone



With UFH base station



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Daikin Home Controls

Valve actuator
EKWCVATR1V3

Description

The Daikin Valve Actuator is a thermoelectric valve drive for opening and closing valves on heating circuit distributors of concealed floor heating and cooling systems.

The main field of application is the energy-efficient individual room temperature control in the range of building management systems and home automation. The Valve Actuator is controlled by a 230 V room thermostat with two point output or pulse-width modulation.

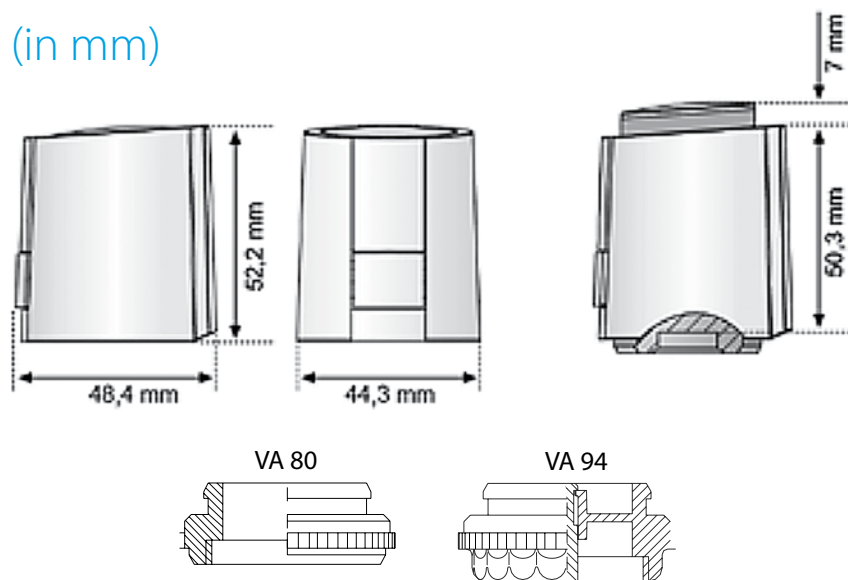


Features

- › Modern design
- › Stroke 4.0 mm
- › Normally closed (NC)
- › Power consumption 1 watt
- › Simple snap-on installation
- › 360° installation position
- › Protection against leaky valves
- › First-Open function*
- › Adaptation check on valve
- › Alignment aid on the valve
- › Compact size, small dimensions
- › All around function indicator
- › Noiseless and maintenance-free
- › High functional safety and long expected service life
- › Surge protection guarantee

*In its delivery condition, the Valve Actuator is kept open when de-energized due to the First-Open function. This enables heating operation during the construction phase even when the electric wiring is not yet complete. During the later electrical start-up, the First-Open function is unlocked by applying the operating voltage for more than 6 minutes. The Valve Actuator will then be completely operable.

Dimensions (in mm)

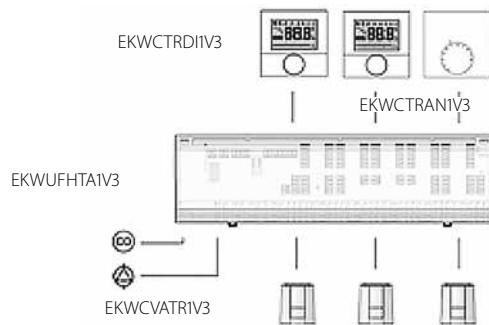


Technical data

Operating voltage	230 V / ±10% / 50/60 Hz	Degree of protection	II
Max. inrush current	< 550 mA during 100 ms max.	Ingress protection	IP 54
Operating power	1 W	Surge protection according to EN 60730-1	2.5 kV
Stroke (actuator travel)	4.0 mm	CE conformity according to	EN 60730
Actuating force	100 N +10 %	Housing material	Polyamide
Fluid temperature	0 to +100°C	Housing colour	light grey (RAL 7035)
Ambient temperature	0 to +60°C	Connecting cable/colour	2 x 0.75 mm ² PVC / light grey (RAL 7035)
Storage temperature	-25°C to +60°C	Cable length	1 m
Included adapter	VA80 & VA94		
Measuring accuracy of actual temperature	±0.5		
Net weight	100 g	Gross weight	130 g
Net dimensions (W x H x D)	52 x 48 x 44 mm	Gross dimensions (W x H x D)	74 x 50 x 89 mm

Installation examples

With UFH base station



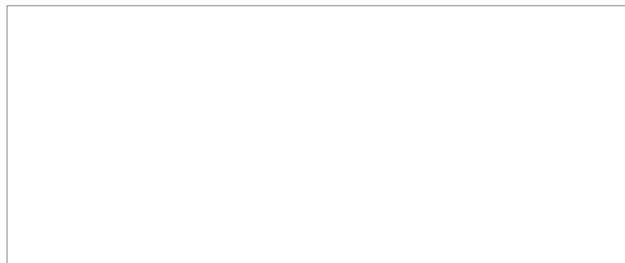
Functions:

- › Heating
- › Cooling
- › Extended pump/boiler control with lead time and follow-up time
- › Connection for external system clock (opt.)
- › Temperature limiter or dew point sensor (opt.)

Compatibility

VA 80		VA 94	
Thread	M30x1,5	Thread	M30x1,0
Compatible models			
663 & 664 (3-way), AO-Therm brass manifold, Aquatechnik Italy (Multirapid, before 2007, from 2009), Belparts NV2D15, Bianchi 4-way-valve, Bianchi 662 (2-way), Brugman, Caleffi (with manufacturer Threading), Carlo Poletti (V1521), Cosmo (Objekt-Line) (CMV Modul manifold) 10,50, Empur brass manifold, EQ-Therm brass manifold, Frese Optima Compact Low 2,5, Gomacal, Herz 3-way-valves (1 7762 xx), Herz 3-way-valves with bypass (1 7763 xx), Herz controlvalve (1 7760 xx), Herz Thermostatic valves Serie TS 98 VH, Honeywell (H) (Typ: V9050, VSOF 215), Honeywell (V5823, V5833), Honeywell V2020 (MNG), Honeywell V58x2A1063, Inteca, IVR stainless steel HKV, Jaga, Johnson-Controls (Typ: V5210KC, V5510KC, V5810DC), Kemper stainless steel, Nereus corner valve DN 10, Onda-Therm HKV-Module, Pexep, Presblock (RTEV-M), radiodaemm, RDZ (brass manifold), Roversy, Sauter (BUT010 F410), Sauter (VXL F200 & F210)(BXL F200 & F210) (BUL), Siemens VPI46 & VPP46, Siemens VVI46, VXI46, VVP47, VXP47, VMP47, SKV manifold, Strasshofer, Taco (Vogel & Noot, Cosmo stainless.), Therminon HKV-Modul, TKM, Tobler Stramax (220TT2-06-06S), Tobler Stramax (220TTT-06-04S), Unicorn brass manifold, Uponor brass-/stainless steel manifold (from 2014), VIR (Serie 9520, 9700), Voogel & Noot (Cosmo brass manifold), VSMF 315, V5823A, VSMF-215, VSMF-220, VSMF415, VTE cornervalve (H), Watts (Voogel & Noot, Finimetall, Myson), Wittigsthal (FT2)			Lavagrund Polytech Aqua Seal redex

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Daikin Home Controls

Wired UFH Base Station

EKWUFHTA1V3

Description

The Daikin Wired Underfloor Heating Base Station is the central connection unit of a room-by-room temperature control for the surface temperature adjustment of heating and cooling systems.

With minimum expense, the UFH Base Station can be wired to all system components as e. g. thermostats and actuators. The system components are supplied directly with the voltage supply of the UFH Base Station. All switching commands for the thermostats are forwarded directly to the connected system components via the Underfloor Heating Base Station.



Features

The Daikin Wired UFH Base Station includes extensive functions for an energy-efficient and system-considerate comfort operation. It lets you offer easy installation and maximum surface temperature adjustment comfort to your customers.

- › Control up to 10 zones
- › A maximum of 18 actuators can be connected
- › Equipment for heating and/or cooling systems
- › Simple, intuitive installation and operation
- › Status signaling by LEDs
- › Proven cable guide and standard-complying strain relief
- › Screwless terminal connection technique
- › Clearly structured connection terminals
- › Reduction channel for a time-controlled room temperature reduction
- › Pump and boiler control
- › Adjustable follow-up time for pump and boiler control
- › Connection for a temperature limiter or dew point sensor
- › Selectable control direction via DIP switch: NC or NO (NO: normally open / NC: normally closed)
- › High functional security
- › Maintenance-free

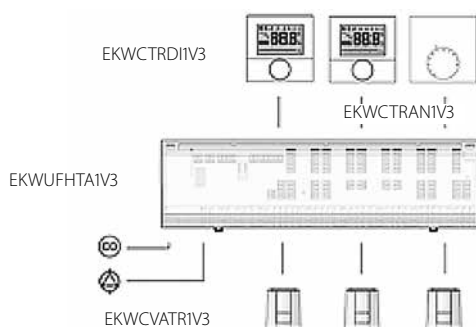
Dimensions (in mm)



Technical data

Material	EKWUFHTA1V3		
Operating voltage	230 V / $\pm 10\%$ / 50 Hz	Boiler circuit	Closing contact (monopolar switching)
Voltage supply	external voltage source	Switching element	Relay
Power consumption in idle operation ¹	<1 W	Switching power	2 A, 200 VA inductive
Max. power consumption (without pump/boiler consumer)	max. 50 VA	Turn-on delay	2 min (Switching pulses below 2 minutes will be suppressed)
Fuse	T4AH	Follow-up time	2 min, additionally 0-15 minutes adjustable by DIP switch
Max. number of thermostats	10	Pump protection function	14 days/1 min
Max. number of connection terminals for actuators	21	Control direction	NC/NO adjustable via DIP switch
Max. number of connectible actuators	18 (max. inrush current 500 mA per actuator)	Change-over input	switchable via potential-free contact
Pump circuit	Closing contact (monopolar switching) Direct connection possible via L'/N'	Temperature limiter or dew point sensor	switchable via potential-free contact
Type of installation	Wall installation/DIN rail (TS35/35 x 7.5 mm)	Connection line	massive: NYM-J/NYM-O (max. 5 x 1.5 mm ²) flexible: H03V2V2H2-F / H05V2V2H2-F
Admissible ambient temperature	0° to +50° C	Strain relief	integrated
Admissible storage temperature	-20° to +70° C	Standards and regulations	EN 60730-1, EN 60730-2-9
Admissible ambient humidity	80%, not condensing	ERP class acc. to EU 811/2013	1=1 %
Pollution degree	2	Protection class	II
Rated impulse voltage	1500 V	Ingress protection	IP 20
Connection terminals	screwless terminals for 0.2 to 1.5 mm ² , vertical cable entry		
Net weight	472 g	Material	Cover: ABS / Casing: ABS
Net dimensions (W x H x D)	90 x 52 x 326.5 mm	Colour	Cover: transparent / Casing: light grey (RAL7035)
Gross weight	610 g		
Gross dimensions (W x H x D)	98 x 66 x 333		

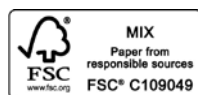
Installation examples



Functions:

- › Heating
- › Cooling
- › Extended pump/boiler control with lead time and follow-up time
- › Connection for external system clock (opt.)

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