

EXT-CFU-230-D.. Touch Keypad fan coil unit thermostats are designed to control the room temperature in air-conditioning fan coil unit system or dust pipe channel system. EXT-CFU-230-D.. thermostats with microprocessor and big LCD display.

Basic features:

- LCD with white backlight
- Room temperature setting
- Manual or auto 3-speed changeover
- Defrost (low temperature protection)
- EXT-CFU-230-D222 suits 2-pipe system
- EXT-CFU-230-D422\* suits 4-pipe system
- Touch keypad
- Keypad Lock (Option )
- Auto Restart ( Option )

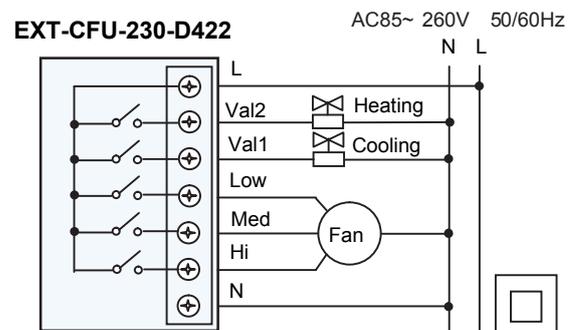
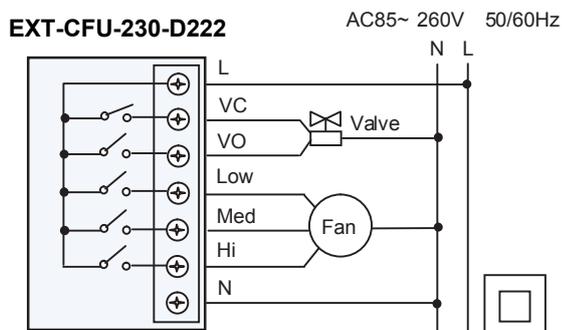


## Technical data

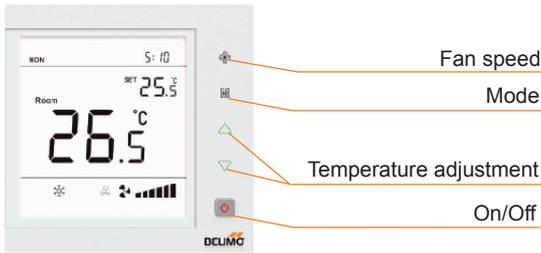
Power supply	AC 85...260V 50/60Hz
Switch current rating	2A (Resistive) 1A (Inductive)
Power consumption	<1W
Display range	0...+55°C
Display accuracy	±0.5°C
Sensing element	NTC
Wiring	Accepting 2x1.5mm <sup>2</sup> or 1x2.5mm <sup>2</sup> wires
Control accuracy	±1°C
Set-point range	+5...+35°C
Operation environment	0...+45°C
Protection class	IP30
Humidity	5...95%RH, non-condensing
Key	Touch keypad + soft touch key
Housing	PC+ABS Flame Retardant
Hole pitch	60mm (Standard)
Dimensions (WxHxD)	90x90x14.2mm

\* EXT-CFU-230-D422 available on request

## Wiring Diagram



Display and touch keypad



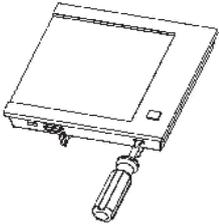
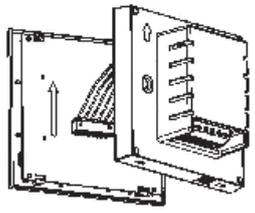
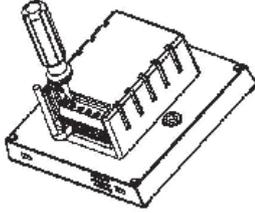
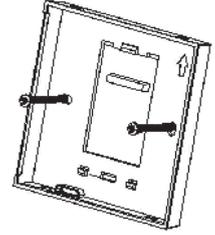
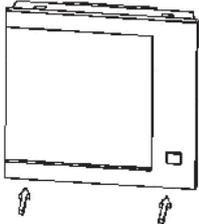
It shows following status:

- working status: cool ❄️, heating 🔥 or ventilation 🌀
- fan speed: low 📊, Mid 📊, High 📊, or Auto AUTO
- FCU valve status 🚪
- Room temperature
- Temperature setpoint
- Time, week display

Operation instructions

<b>On/Off</b>	Press “⏻” to turn on, press “⏻” again to turn off thermostat and its output.
<b>Setting Temperature</b>	Press “▼” to reduce temperature, press “▲” to raise temperature (0.5°C per step).
<b>Mode Selection</b>	Press “M” to change system working in cooling “❄️”, heating “🔥” or ventilation “🌀” mode.
<b>Fan Speed Selection</b>	Press “🌀” to select 📊 (Hi), 📊 (Med), 📊 (Low), AUTO(Auto). In “Auto” mode, the fan-speed changes automatically. When the differential temperature between room temperature and setpoint exceeds 1°C, 2°C and 3°C, thermostat operates at Auto LOW-speed, Auto MED-speed and Auto HI-speed respectively.
<b>Control Motorised Valve Under 2-pipe Configuration</b>	If the differential temperature between room temperature and setpoint exceeds 1°C, FCU valve will be opened; if room temperature and setpoint are equal, the thermostat will close the FCU valve with the fan kept running.
<b>4-pipe Configuration</b>	In cooling, when the room temperature is higher than set-point, the cooling Valve will be opened. Otherwise it will be closed. Heating valve is always closed. In heating, When the room temperature is lower than set-point, the heating valve will be opened. Otherwise it will be closed. Cooling valve is always closed.
<b>Keypad Lock Function</b>	<b>Keypad Lock:</b> If there is no key operation for 30 seconds, the keypad will be locked automatically. <b>Keypad Unlock:</b> Press “🌀” for 5 seconds to unlock.
<b>Low Temperature Protection Function</b>	<b>Turn on:</b> When the room temperature is lower than 5°C, the thermostat will automatically turn on the fan and valve (with “🔥” showing). When the room temperature is increased to 7°C, the thermostat will automatically stop output.
<b>Low Temperature Protection Setting</b>	<b>Turn off:</b> Press “M” and hold for 3 seconds, it will display “OF” or “ON”. Press “▲” or “▼” to adjust the parameter. “OF” indicates low temperature protection is turned off, “ON” indicates low temperature protection function is turned on (Factory default setting is “OF”).
<b>Offset adjustment of temperature display</b>	In case that the user wants the displayed temperature on the thermostat higher or lower than the real temperature(±5°C), the following operations could be taken: <b>Turn off:</b> Press “▲” and “▼” at the same time for 3 seconds, it will display “XX°C”, press “▲” or “▼” to adjust the temperature value, it will be automatically confirmed after 6 seconds.
<b>Alarm</b>	If the sensor has failure, the thermostat will close the fan and valve, displaying “E1” or “E2”. E1: Sensor in short circuit alarm E2: Sensor in open circuit alarm It displays “HI” when the temperature is higher than 55°C , displaying “LO” when the temperature is lower than 0°C.

**Installation instruction**

<p><b>1.</b></p>  <p>Open the left clip and right clip with screw driver.</p>	<p><b>2.</b></p>  <p>Open the front cover. Take off the wires.</p>
<p><b>3.</b></p>  <p>Connect the wire according to the wiring diagram.</p>	<p><b>4.</b></p>  <p>Mount the housing to the wall using the two screws in the packing box.</p>
<p><b>5.</b></p>  <p>Close the front cover.</p>	<p><b>Note:</b> Make sure the wires are connected per the wiring diagram. Avoid water, mud, paints and other substances from getting into the PCB of thermostat.</p>

**Dimensions**

