

FCP Non-Programmable and Progammable Fan Coil or PTAC Thermostat Product Bulletin

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Description

The FCP Non-Programmable and FCP 7-Day Programmable Fan Coil Unit (FCU) or Packaged Terminal Air Conditioner Unit (PTAC) Thermostats provide simpleto-use control of 2-pipe or 4-pipe FCU or PTAC. These thermostats provide on/off control, up to three speeds of fan control, and dry contact unoccupied or occupied control. Use the thermostats as stand-alone devices in commercial buildings, such as schools, offices, and hotels, and to provide access to parameters such as system mode, fan mode, and temperature setpoints.

The FCP Thermostats feature a quick setup menu, are prewired for fast installation, and are Johnson Controls® 10k ohm negative temperature coefficient (NTC) Type II and Type III remote sensor ready (order separately). You can equip the FCP Thermostats with a remote temperature sensor, remote pipe sensor, and a remote wired occupancy sensor to enable flexible options. Flexible options include 2-pipe FCU heat/cool switchover or pipe sensor for automatic switching. The large display with adjustable backlight makes it easy to optimize user preferences. In addition, both FCP Thermostat models include min and max temperature protection, key pad lockout, occupied and unoccupied modes.

Figure 1: FCP Thermostat



Product overview

Figure 2: FCP Thermostat

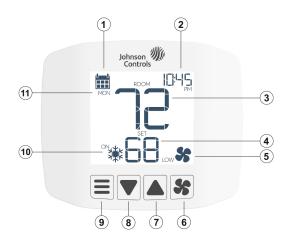
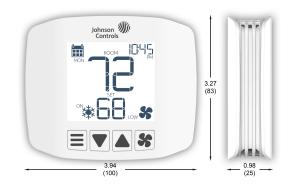


Table 1: FCP Thermostat UI call outs

Feature	Description
1	Schedule, available only on FCP-PA-701
2	Time, available only on FCP-PA-701
3	Room temperature
4	Temperature setpoint
5	Fan speed
6	Fan
7	Up
8	Down
9	Mode
10	Cool or heat indication
11	Day, available only on FCP-PA-701

Figure 3: FCP Thermostat dimensions, in. (mm)



Features and benefits

- Compatible with 2-pipe and 4-pipe FCU with up to a 3-speed fan, conventional PTAC, and heat pump PTAC with or without auxiliary heat
- Pre-installed lead wires for fast installation
- Pre-set installer and user configurations—Configure your thermostat easily with 20 pre-set installations
- Configurable normally open (NO)/normally closed (NC) contact to set the occupied or unoccupied mode
- Onboard and remote temperature sensor available
- White LED backlight—Adjustable brightness for easy operation in the dark
- FCP-PA-701 features up to six programmable periods per day
- FCP-PA-701 features battery backup—RTC backup with a minimum backup time of 48 hours
- Temperature in °F or °C

Applications

The FCP Thermostat is compatible with most 24 VAC FCU or PTAC applications.

The following list shows the compatible configurations of the equipment:

- 2-Pipe with up to a 3-speed fan
- 4-Pipe with up to a 3-speed fan
- Conventional PTAC
- Heat pump PTAC with or without auxiliary heat

Ordering information

Table 2: FCP digital room thermostat for fan coil or PTAC selection chart

Product code	Non-	Backup	Johnson	Color
number	programmable/	battery	Controls	
	programmable	for RTC	logo	
FCP-NA-701-N	Non-	No	No	White
	programmable			
FCP-NA-701-B	Non-	No	Yes	White
	programmable			
FCP-PA-701-N	7-day	Yes	No	White
	programmable			
FCP-PA-701-B	7-day	Yes	Yes	White
	programmable			

The FCP Thermostat ships from the factory with a Quick Start Guide, four mounting screws, one lock screw, seven pre- installed terminal wires, and one wire label. The FCP- PA- 701 also includes one coin cell battery.

Technical specifications

Table 3: FCP non-programmable and programmableFCU or PTAC Thermostats technical specifications

Specification		Description			
Models		Non-programmable: FCP-NA-701-N, FCP-NA-701-B			
		Programmable: FCP-PA-701-N, FCP-PA-701-B			
Power requirements		20 VAC to 30 VAC, 60 Hz, max. 3 A (3 VA at 24 V nominal)			
Output rating Valve and		1 A maximum per each relay channel			
	outputs	(Max. relays ON combination: 3 relays), 20 VAC to 30 VAC			
Analog inputs	Remote sensor	10K ohm at 77°F (25°C) NTC sensor			
	Pipe sensor	10K ohm at 77°F (25°C) NTC sensor			
	Set back	NC/NO dry contact switch			
Local temperature sensor type		NTC temperature sensor, accurate to $\pm 1^{\circ}F(\pm 0.6^{\circ}C)$ at 77°F (25°C)			
Remote temperature sensor type		NTC temperature sensor, accurate to ±2°F (±1.2°C) at 70°F (21°C)			
Wire size		18 AWG (100 ft [30.5 m] maximum) to 24 AWG (36 ft [11 m] maximum)			
Temperature	Heat mode	45°F to 90°F (7°C to 32°C)			
adjustment range	Cool mode	60°F to 95°F (15°C to 35°C)			
Accuracy	Local temperature sensor	±1°F (±0.6°C)			
	Remote temperature sensor	±2°F (±1.2°C) at 70°F (21°C)			
	Remote pipe sensor	±5°F (±3.0°C)			
Deadband		2°F to 5°F (1°C to 3°C)			
Ambient conditions	Operating	14°F to 122°F (-10°C to 50°C); 5% RH to 90% RH, noncondensing			
	Storage	-4°F to 140°F (-20°C to 60°C); 5% RH to 90% RH, noncondensing			
Disconnection means		Type 1B			
Pollution degree		2			
Rated impulse voltage		330 V			
Automatic Action		100,000 cycles			
Ratings for supply and loading		20 VAC to 30 VAC			
Dimensions H x W x D		3.27 in. x 3.94 in. x 0.98 in. (83 mm x 100 mm x 25 mm)			
Dimensions H					
Dimensions H Shipping weig	jht	Product with packing and accessories: 10.1 oz (285 g)			
	Jht	Product with packing and accessories: 10.1 oz (285 g) Thermostat only: 4.9 oz (138 g)			
	lht				
	ht	Thermostat only: 4.9 oz (138 g)			
Shipping weig	jht	Thermostat only: 4.9 oz (138 g) Trim plate: 1.2 oz (33 g)			

The performance specifications are nominal and conform to acceptable industry standards. For application at conditions beyond these specifications, consult the local Johnson Controls office. Johnson Controls shall not be liable for damages resulting from misapplication or misuse of its products.

Repair information

If the FCP Thermostat fails to operate within its specifications, replace the unit. For a replacement

thermostat, contact the nearest Johnson Controls representative.

Product warranty

This product is covered by a limited warranty, details of which can be found at <u>www.johnsoncontrols.com/</u><u>buildingswarranty</u>.

Patents

Patents: <u>https://jcipat.com</u>

Contact information

Contact your local branch office: <u>www.johnsoncontrols.com/locations</u> Contact Johnson Controls: <u>www.johnsoncontrols.com/</u> <u>contact-us</u>

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