

TEC26x7-4 and TEC26x7-4+PIR Series

# BACnet® MS/TP Networked Thermostat Controllers with Two Outputs

## Description

The TEC26x7-4 and TEC26x7-4+PIR Series Thermostat Controllers are BACnet® Master-Slave/Token-Passing (MS/TP) networked devices that provide control of local hydronic reheat valves, pressure dependent Variable Air Volume (VAV) equipment with or without local reheat, or other zoning equipment using an on/off, floating, or proportional 0 to 10 VDC control input. The technologically advanced TEC26x7-4 and TEC26x7-4+PIR Series Thermostat Controllers feature a Building Automation System (BAS) BACnet MS/TP communication capability that enables remote monitoring and programming for efficient space temperature control.

The TEC26x7-4 and TEC26x7-4+PIR Series Thermostat Controllers feature an intuitive user interface with backlit display that makes setup and operation quick and easy. The thermostat controllers also employ a unique, Proportional-Integral (PI) time-proportioning algorithm that virtually eliminates temperature offset associated with traditional, differential-based thermostat controllers.

Refer to the *TEC26x7-4 and TEC26x7-4+PIR Series BACnet MS/TP Networked Thermostats with Two Outputs Product Bulletin (LIT-12011584)* for important product application information.

## Features

- BACnet MS/TP communication—provides compatibility with a proven communication network; BACnet MS/TP is widely accepted by Heating, Ventilating, and Air Conditioning (HVAC) control suppliers
- password protection option—protects against unwanted thermostat controller tampering
- backlit Liquid Crystal Display (LCD)—offers real-time control status of the environment in easy-to-read, English plain text messages with constant backlight that brightens during user interaction
- on/off, floating, or proportional 0 to 10 VDC control—offers additional application flexibility by providing more advanced control signals
- override interface key—allows easy access for temporarily overriding the unoccupied mode
- simplified setpoint adjustment—enables the user to change the setpoint by simply pressing the **UP/DOWN** arrow keys
- two configurable binary inputs—provide additional inputs for advanced functions such as remote night setback, service or filter alarms, motion detector, and window status
- over 20 configurable parameters—enable the thermostat to adapt to any application, allowing installer parameter access without opening the thermostat cover
- optional discharge air sensor—monitors unit efficiency



**TEC26x7-4 and TEC26x7-4+PIR Series BACnet MS/TP Networked Thermostat Controller with Two Outputs**

## Repair Information

If a TEC26x7-4 or TEC26x7-4+PIR Series Thermostat Controller fails to operate within its specifications, replace the unit. For a replacement thermostat, contact the nearest Johnson Controls® representative.

## Selection Chart

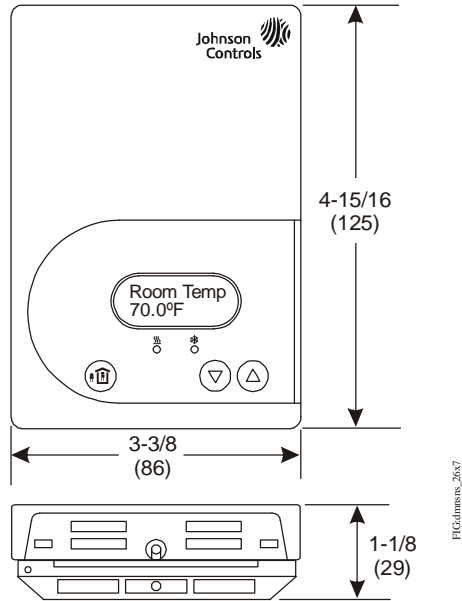
Code Number	Control Outputs
TEC2627-4	Two On/Off or Floating
TEC2647-4	Two Proportional 0 to 10 VDC
TEC2627-4+PIR	Two On/Off or Floating with Onboard Occupancy Sensor
TEC2647-4+PIR	Two Proportional 0-10 VDC with Onboard Occupancy Sensor

## Accessories

Code Number	Description
SEN-600-1	Remote Indoor Air Temperature Sensor
TE-6361M-1 <sup>1</sup>	Duct Mount Air Temperature Sensor
SEN-600-4	Remote Indoor Air Temperature Sensor with Occupancy Override and Light-Emitting Diode (LED)
TE-636S-1	Strap-Mount Temperature Sensor
MS-BACEOL-0	RS485 End-of-Line Terminator

1. Additional TE-636xx-x Series 10k ohm Johnson Controls Type II Thermistor Sensors are available; refer to the *TE-6300 Series Temperature Sensors Product Bulletin (LIT-216320)* for more details.

## TEC26x7-4 and TEC26x7-4+PIR Series BACnet® MS/TP Networked Thermostat Controllers with Two Outputs (Continued)



TEC26x7-4 Series Thermostat Controller Dimensions, in. (mm)

### Technical Specifications

TEC26x7-4 and TEC26x7-4+PIR Series BACnet MS/TP Networked Thermostat Controllers with Two Outputs		
<b>Power Requirements</b>		19 to 30 VAC, 50/60 Hz, 2 VA (Terminals 4 and 5) at 24 VAC Nominal, Class 2 or Safety Extra-Low Voltage (SELV)
<b>Relay/Triac Contact Rating</b>	<b>On/Off and Floating Control</b>	19 to 30 VAC, 1.0 A Maximum, 15 mA Minimum, 3.0 A In-Rush, Class 2 or SELV
<b>Analog Output Rating</b>	<b>Proportional Control</b>	0 to 10 VDC into 2k ohm Resistance (Minimum)
<b>Auxiliary Output Rating</b>	<b>Triac Output</b>	19 to 30 VAC, 1.0 A Maximum, 15 mA Minimum, 3.0 A In-Rush
<b>Digital Inputs</b>		Voltage-Free Contacts across Terminal Scom to Terminals BI1, BI2, or UI3
<b>Analog Inputs</b>		Resistive Inputs (RS and UI3) for 10k ohm Johnson Controls Type II Negative Temperature Coefficient (NTC) Thermistor Sensors
<b>Temperature Sensor Type</b>		Local 10k ohm Negative Temperature Coefficient (NTC) Thermistor
<b>Wire Size</b>		18 AWG (1.0 mm Diameter) Maximum, 22 AWG (0.6 mm Diameter) Recommended
<b>MS/TP Network Guidelines</b>		32 Devices Maximum; 4,000 ft (1,219 m) Maximum Cable Length
<b>Temperature Range</b>	<b>Backlit Display</b>	-40.0°F/-40.0°C to 122.0°F/50.0°C in 0.5° Increments
	<b>Heating Control</b>	40.0°F/4.5°C to 90.0°F/32.0°C
	<b>Cooling Control</b>	54.0°F/12.0°C to 100.0°F/38.0°C
<b>Accuracy</b>		±0.9F°/±0.5C° at 70.0°F/21.0°C Typical Calibrated
<b>Minimum Deadband</b>		2F°/1C° between Heating and Cooling
<b>Ambient Conditions</b>	<b>Operating</b>	32 to 122°F (0 to 50°C); 95% RH Maximum, Noncondensing
	<b>Storage</b>	-22 to 122°F (-30 to 50°C); 95% RH Maximum, Noncondensing
<b>Compliance</b>	<b>United States</b>	UL Listed, File E27734, CCN XAPX, Under UL 873, Temperature Indicating and Regulating Equipment FCC Compliant to CFR 47, Part 15, Subpart B, Class A
	<b>Canada</b>	UL Listed, File E27734, CCN XAPX7, Under CAN/CSA C22.2 No. 24, Temperature Indicating and Regulating Equipment Industry Canada, ICES-003
	<b>Europe</b>	CE Mark - Johnson Controls, Inc., declares that this product is in compliance with the essential requirements and other relevant provisions of the EMC Directive 2004/108/EC and the RTTE Directive 1999/5/EC.
	<b>Australia and New Zealand</b>	C-Tick Mark, Australia/NZ Emissions Compliant
	<b>BACnet International</b>	BACnet Testing Laboratories™ (BTL) 135-2001 Listed BACnet Application Specific Controller (B-ASC)
<b>Shipping Weight</b>	<b>TEC26x7-4</b>	0.75 lb (0.34 kg)
	<b>TEC26x7-4+PIR</b>	0.77 lb (0.35 kg)

The performance specifications are nominal and conform to acceptable industry standards. For applications at conditions beyond these specifications, consult the local Johnson Controls office. Johnson Controls, Inc. shall not be liable for damages resulting from misapplication or misuse of its products. © 2013 Johnson Controls, Inc. [www.johnsoncontrols.com](http://www.johnsoncontrols.com)