Honeywell

Wi-Fi VisionPRO® 8000

Job Name	
Engineer	
Mechanical Contractor	
Contractor's P.O. No.	
Representative	
Notes	

Model(s)				
TH8321WF1001	Qty.		Notes	
Approval				
Service				
Tag No.				

APPLICATION

Wi-Fi VisionPRO allows remote access through a Smartphone, Tablet or Computer. It controls up to 3H/2C heat pump or dual fuel systems and up to 2H/2C conventional systems. Thermostat is selectable for Residential or Light Commercial applications. The thermostat has a Universal Relay to control humidification, humidification or ventilation.

- The thermostat is equipped with a touchscreen display with a 2-line message center.
- Provides Remote Access through Smartphone, Tablet or Computer when connected to Wi-Fi and registered to mytotalconnectcomfort.com
- Provides compressor lockout in Heat Pump system with aux heat (electric or dual fuel). Provides lockout temperatures for auxiliary heat in Heat Pump system with electric aux heat. (Lockouts require a wired outdoor sensor or outdoor information from the cloud with thermostat connected to Wi-Fi and registered).

SPECIFICATIONS

Terminal Designations:

TH8321WF Thermostat: R, RC, S C, W-O/B, W2-AUX/E, Y, Y2, G, A-L/A, K, U1 U1, S1 S1

Electrical Ratings:

Terminal	Voltage (50/60Hz)	Max. Current Rating
W - O/B	18 to 30 VAC	1.00A
Y (cooling)	18 to 30 VAC	1.00A
G (fan)	18 to 30 VAC	0.50A
W2 – Aux/E	18 to 30 VAC	0.60A
Y2 (Cooling)	18 to 30 VAC	0.60A
A-LA (Output)	18 to 30 VAC	1.00A
U1, U1	18 to 30 VAC	0.50A

Power Consumption of TH8321WF Thermostat:
Backlight on: 2.35 VA
Backlight off: 1.40 VA

Wi-Fi Communication Requirements:
802.11 b/g/n routers
Android or IOS Smartphone, tablet or device

Temperature Setting Range:
(Adjustable high limit for heat. Adjustable low limit for cool.)
Heating: 40 to 90 °F (4.5 to 32 °C)
Cooling: 50 to 99 °F (10 to 37 °C)

Temperature Sensor Accuracy:
± 1.5 °F at 70 °F (0.75 °C at 21.0 °C)

Humidification Setting Range: 10% to 60% RH

Dehumidification Setting Range: 40% to 80% RH

Humidity Display Range: 0% to 99%

Humidity Sensor Accuracy:
± 5% RH from 30% to 50% RH at 75 °F (24 °C)

Cool Indication:
Displays "Cool On" when the thermostat turns the cooling on.

Heat Indication:
Displays "Heat On" when the thermostat turns the heating on.

Auxiliary Heat Indication:
Displays "Aux Heat On" when the thermostat turns the auxiliary heat on.

Interstage Differential:
Comfort: The thermostat keeps the indoor temperature within 1 degree of the setpoint (droop less control). The thermostat turns on stage 2 when the capacity on stage 1 reaches 90%.
When the interstage differential is set to 1.0 or higher, the thermostat stages the equipment based on how far the indoor temperature is from the setpoint.
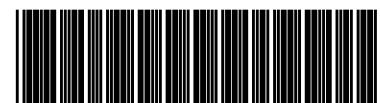
Clock Accuracy:
If not connected to Wi-Fi: 1 minute per month at 77 °F (25 °C). ± 2 minutes per month over the operating ambient temperature range.
If connected to Wi-Fi and registered to Total Connect Comfort: the current time is synced via the Internet.
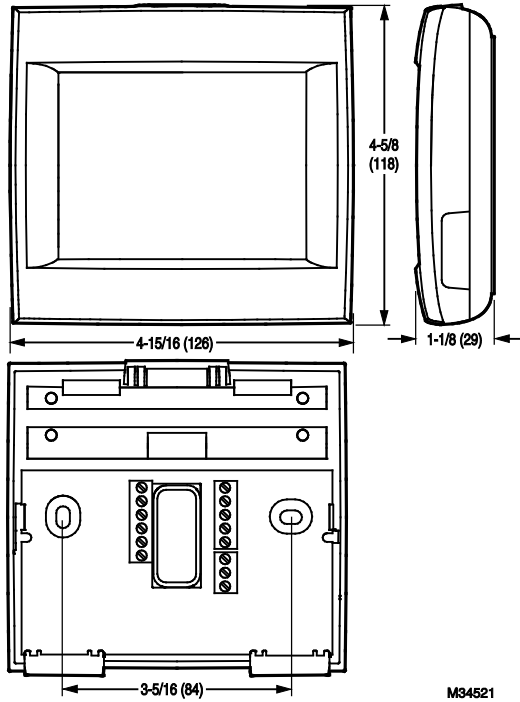
Mounting Means:
Thermostat mounts directly on the wall in the living space using mounting screws and anchors provided. Fits a horizontal 2 x 4 in. junction box. Use a cover plate and its mounting bracket to mount the thermostat onto a vertical 2 x 4 in. junction box.
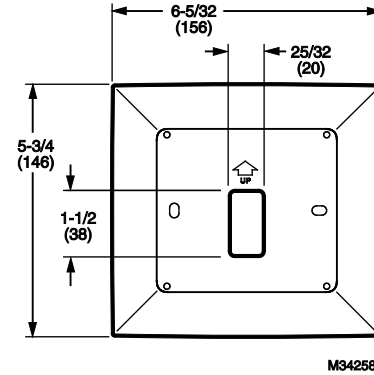
33-00072-02

Product	Part Number	Operating Ambient Temperature	Operating Relative Humidity	Shipping Temperature	Physical Dimensions in Inches (mm)	Color(s)
Thermostat	TH8321WF1001	32 to 120 ºF (0 to 48.9 ºC)	5% to 90% Non-Condensing	-20 to 120 ºF (-28.9 to 48.9 ºC)	4-15/16 x 4-5/8 x 1-1/8 (126 x 118 x 29)	Arctic White

Dimensions of thermostat in in. (mm).

M34521

Dimensions of VisionPRO cover plate in in. (mm).

M34258

Honeywell