



Submittal Data

Quecalor 5 TR

Date: June 16, 2021



Project: Quecalor 5 TR

Plan-ID	Qty	Model No	Description	Page
WM-01	4	W60AC-A0ZXWXXXJ	Wall-Mount™ Air Conditioner 208/230-1 ph	3
		SG/W Series Supply Air Grille Dimensions		8
		RG/W Series Return Air Grille Dimensions		9
		Honeywell T4 Pro, T6 Pro, T6 Pro WIFI		10



AHRI Rated Cooling Performance

AHRI Certified Reference #	203363662	
AHRI Rated Cooling Capacity	57,000	Btuh
EER	11.00	
Rated Airflow	1750	cfm

Cooling Performance @ Project Parameters

Cooling Capacity	57,730	Btuh
Sensible Capacity	42,723	Btuh
Latent Capacity	15,007	Btuh
Efficiency (at AHRI)	11.00	EER
Outdoor DB Temp	95.0	°F
Entering DB Temp	80.0	°F
Entering WB Temp	67.0	°F
Leaving DB Temp	57.8	°F
Leaving WB Temp	56.9	°F

Supply Air Performance

Total Supply Air	1785	cfm
Blower Motor	.75	hp
Low Blower Speed Non-Ducted		

Air flow is based on Wet Coil

Electrical Data

Power Supply	208/230	Volts
	1	Phase
	60	Hertz
Minimum Circuit Ampacity	38	Amps
Maximum External Fuse or Circuit Breaker	50	Amps
Field Power Wire Size	8	
Ground Wire	10	

Based on 75C copper wire, All wiring must conform to the National Electrical Code and all local codes

Caution: When more than one field power circuit is run through one conduit, the conductors must be derated. Pay special attention to note 8 of Table 310 regarding Ampacity Adjustment Factors when more than three (3) current carrying conductors are in a raceway.

NOTE: MOCP (Maximum Overcurrent Protection) value listed is the maximum value as per UL 1995 calculations for MOCP (branch-circuit conductor sizes shown are based on this MOCP). The actual factory installed Overcurrent Protective Device (Circuit Breaker) in this model may be lower than the maximum UL 1995 allowable MOCP value, but still above the UL 1995 minimum calculated value or Minimum Circuit Ampacity (MCA) listed.

Balanced Climate™ Mode Performance

Cooling Capacity	54,216	Btuh
Sensible Capacity	36,663	Btuh
Latent Capacity	17,877	Btuh
Latent Increase	14	%
Water removal per hour	16.87	lb/ hr
Outdoor DB Temp	95.0	°F
Entering DB Temp	80.0	°F
Entering WB Temp	67.0	°F

Factory Options Selected

A - 208/240 Volt 1 phase
0Z - No Heat with Circuit Breaker Disconnect
X - Barometric Fresh Air Damper
W - 1-inch Washable MERV 2
X - Beige
X - Standard Coils
J - Hi Pressure Switch, Low Pressure Switch, Compressor Control Module, Low Ambient Control, Alarm Relay

Field Installed Accessories

RG-5W - Return air grill - Extruded aluminum with blades fixed at 30 degree angle, 2" Flange
SG-5W - Sidewall supply register with 2 sets of individually adjusted blades, 2" Flange
8403-089 - Honeywell T4 Pro Programmable Thermostat 1 heat / 1 cool, (HP 1 heat / 1 cool)



Project: Quecalor 5 TR
Model Number: W60AC-A0ZXWXXXJ

Plan-ID: WM-01
Quantity: 4

Page: 4

Field Installed Accessories - Continued

CMA-39 - Standard Controls + LAC



Standard Product Features

- **Non-Fiberglass Foil Faced Insulation:** Environmentally friendly high "R" value non-fiberglass insulation that is made with recycled denim and cotton materials used with a FSK foil face that is both durable and cleanable
- **Durable Cabinet Construction:** Multiple cabinet construction options are available for different outdoor conditions. Optional cabinet coatings may be ordered for extreme outdoor environments.
- **Green Fin Hydrophilic Evaporator Coil:** Green fin stock is used to help prevent mold growth, aid with condensate drainage, and provide a limited amount of protection to corrosive particulates in the airstream.
- **Reliable, Easy-to-Use Controls:** Easily accessible through front control panel locations. A lockable hinged access cover to circuit protection is provided. Phase rotation monitor is standard on all 3 phase models. Adjustable compressor on/off delay timer (CCM) with diagnostic lights is standard on all models.
- **ECM Indoor Motor Technology:** 5 speed dual shaft motor provides quiet airflow operation when used with a twin blower assembly. Motor overload protection standard on all models.
- **Electric Strip Heat:** Reliable, comfortable heater packages feature an automatic limit and thermal cut-off safety control.
- **Easy Filter Access:** A separate filter door is provided for ease of filter access during routine unit maintenance.
- **Enclosed Condenser Motor:** An enclosed casing condenser motor with ball bearings is used for reliable operation and extended motor life. Enclosed condenser motors are standard on all units.
- **Improved Condenser Coil Cleaning:** Removable fan shroud side panels allow for easy condenser coil intake surface cleaning.
- **High Efficiency Cooling:** Scroll compressors for quiet, efficient cooling. Designed with R-410A (HFC) non-ozone depleting refrigerant in compliance with the Montreal protocol and 2010 EPA requirements. A liquid line filter-drier to protect the system from moisture is standard on all units.
- **Cooling Operation:** The Bard WA Series WALL MOUNT products offer single stage cooling operation using R410A refrigerant. Copper tube/Aluminum hydrophilic green fin coils are used to provide high efficiency and easy serviceability. Scroll compressor technology delivers years of quiet, reliable operation.
- **Heating Operation:** The Bard WA Series WALL MOUNT products offer optional single or two stage heating operation using resistance heaters. Circuit breaker disconnect protection is standard in all units equipped with electric heat.
- **ECM Indoor Blower Motor:** Energy efficient indoor brush-less DC blower motors use EC constant torque technology with 4 selectable pre-programmed speeds. By selecting the needed speed, the WALL MOUNT product can reduce or increase airflow. A NEMA48® frame enclosure is used. A high speed tap can be selected to offer the maximum CFM possible with the blower assembly.
- **Outdoor Fan Motor:** Outdoor fan motors use ball bearing construction and are fully enclosed for increased life expectancy.

Balanced Climate™

- Patent pending
- (Optional Configuration)
- Increases humidity removal by up to 35%
- Can improve efficiency by allowing occupant to set thermostat higher in cooling mode
- Comes standard on all models
- Remove the Y1/Y2 jumper and use a 2 stage thermostat to activate Balanced Climate™
- Complies with efficiency requirements of ANSI/ASHRAE/IESNA 90.1-2016.
- Certified to ANSI/AHRI Standard 390-2003 for SPVU (Single Package Vertical Units)
- Intertek ETL Listed to Standard for Safety Heating and Cooling Equipment ANSI/UL 1995/CSA 22.2 No. 236-05, Fourth Edition.



Sound Data

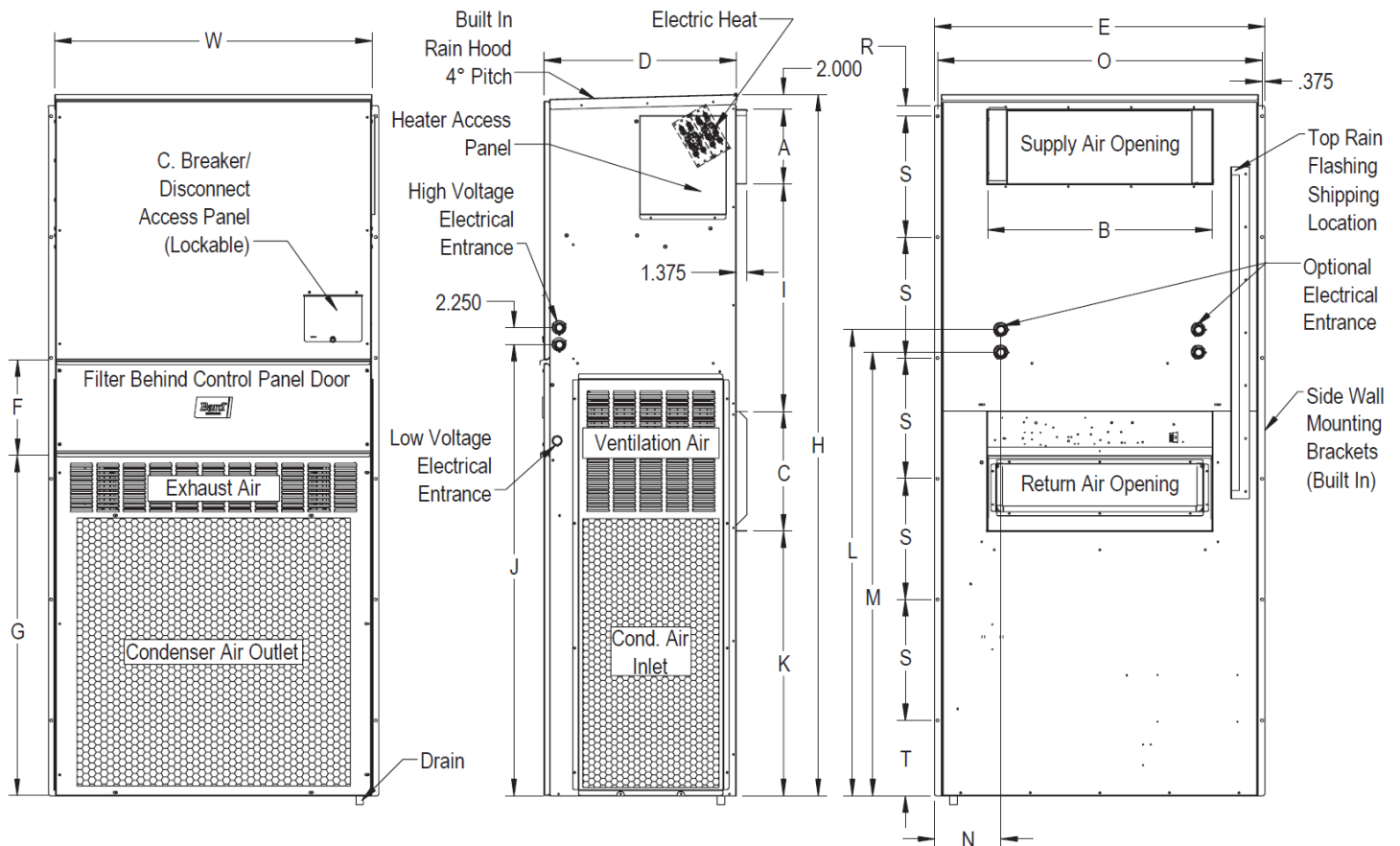
DUCT FREE	INDOOR COOLING OPERATION @ 5 FT.				INDOOR COOLING OPERATION @ 10 FT.				OUTDOOR @ 5 FT.
Unit	STD Grilles	With WMSC5	With WMSC5 and WARP-11	WMSC5, WARP-11, WAPFB51	STD Grilles	With WMSC5	With WMSC5 and WARP-11	WMSC5, WARP-11, WAPFB51	STD Features
W60AC	56.5	52	48.4	47.4	53.3	49.7	47.4	46.5	71.4

DUCT FREE	INDOOR COOLING OPERATION @ 5 FT.				INDOOR COOLING OPERATION @ 10 FT.				OUTDOOR @ 10 FT.
Unit	STD Grilles	With WMSC5	With WMSC5 and WARP-11	WMSC5, WARP-11, WAPFB51	STD Grilles	With WMSC5	With WMSC5 and WARP-11	WMSC5, WARP-11, WAPFB51	STD Features
W60AC	56	47.1	46.6	N/A	52.7	47.1	44.8	N/A	66.8

Integrated values calculated per ANSI/ASA S12.60-2009/Part 2, Section 5.2.2.1. Integrated Sound Values are also applicable for use in learning spaces for LEED schools; EQ Prerequisite 3 - Minimum Acoustical Performance, OPTION 1. Using methods prescribed in ANSI S12.60, classroom must achieve a maximum background noise level of 45 dBA. Results referenced were recorded in The Bard Manufacturing Company, Inc. Sound Lab Facility. Actual field application results may vary with the classroom design and construction methods.

Dimensions of Basic Unit for Architectural and Installation Requirements (Inches)

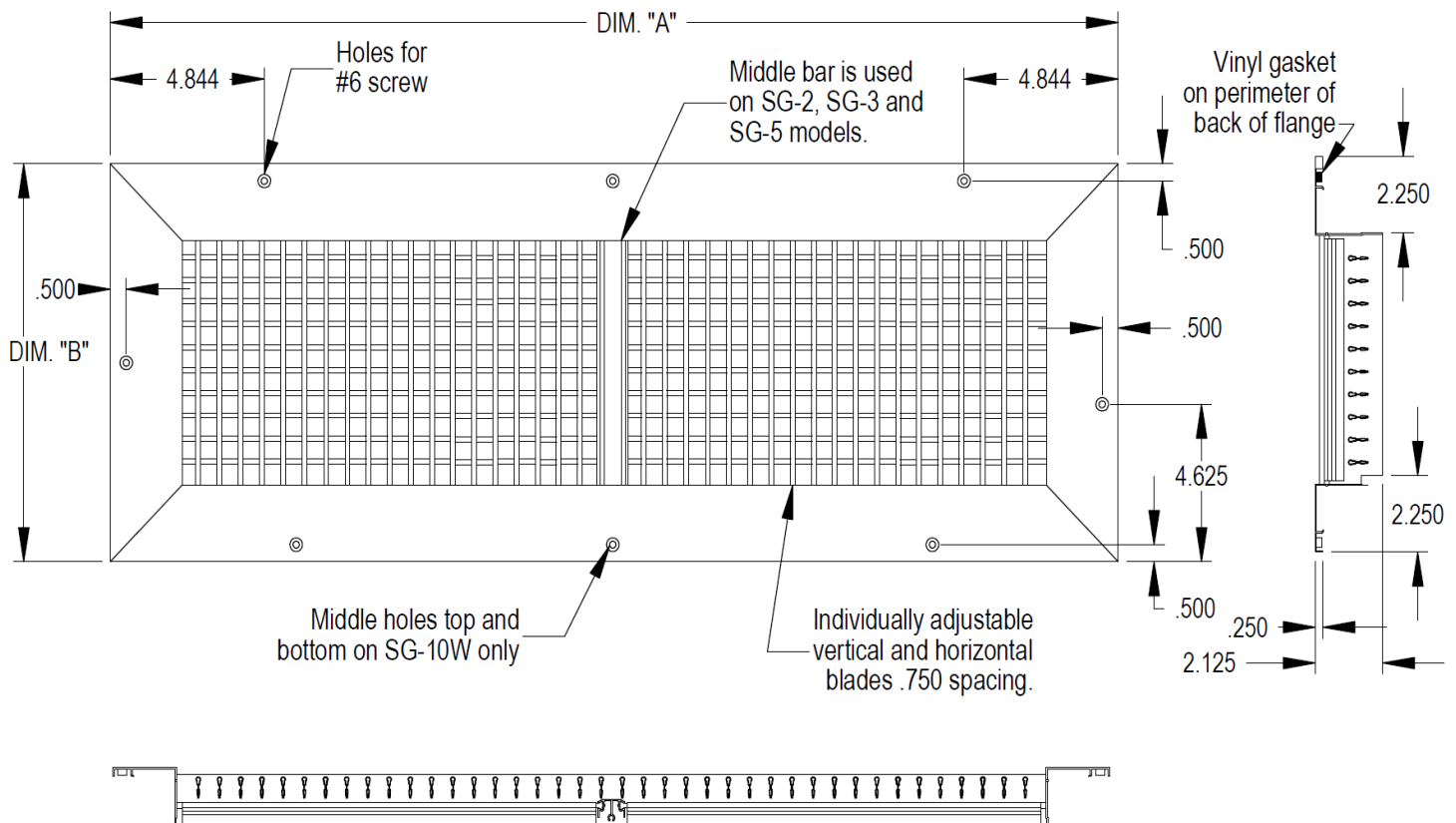
Width (W)	Depth (D)	Height (H)	Supply		Return		E	F	G
			A	B	C	B			
42	25.52	93	9.88	29.88	15.88	29.88	43.88	12.63	45
I	J	K	L	M	N	O	R	S	T
30	59.75	35.06	61.72	58.72	8.82	43	1.438	16	10



"SG/W" Series Supply Air Grilles



Climate Control Solutions



Grille Size Chart			
Grille part number	Use with unit(s)	Dim. "A"	Dim. "B"
SG-1W (5"x 17")	W12AB	21.25	9.25
SG-2W (8"x 20")	WA,WL,WH 18-24	24.25	12.25
SG-3W (8"x 28")	WA,WG,WL,WH 30-36	32.25	12.25
SG-5W (10"x 30")	WA,WG,WL,WH 42-72	34.25	14.25
SG-10W (16" X 43")	W090AP*,W120AP*,W150AP*	47.00	20.00
SG-15W (16" X 55")	W180BP*	59.00	20.00

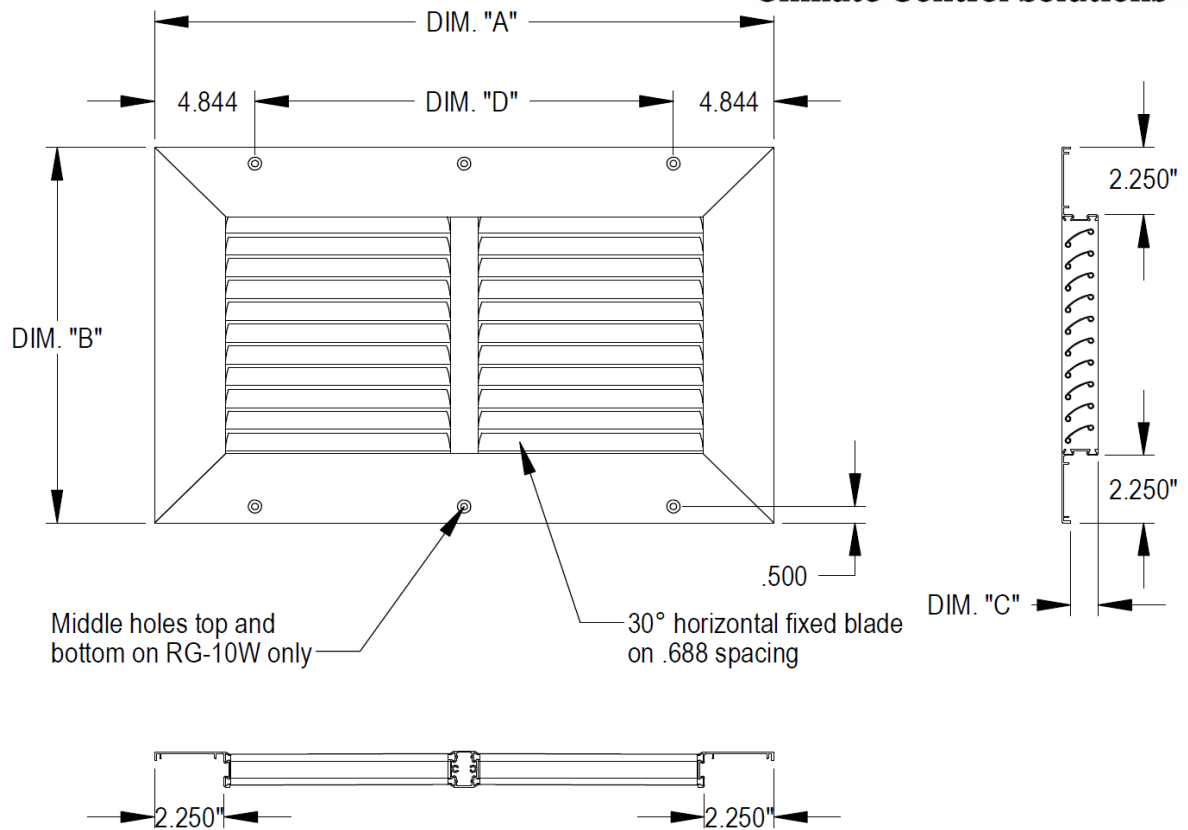
Standard industry tolerances apply. Specs. are subject to change without notice.

Construction: Aluminum frame - brushed anodized aluminum finish.

"RG/W" Series Return Air Grilles



Climate Control Solutions



Grille Size Chart					
Grille part number	Use with unit(s)	Dim. "A"	Dim. "B"	Dim. "C"	Dim. "D"
RG-1W (10"x 17")	W12AB	21.250	14.250	0.813	11.562
RG-2W (12"x 20")	WA,WL,WH 18-24	24.250	16.250	0.813	14.562
RG-3W (14"x 28")	WA,WG,WL,WH 30-36	32.250	18.250	0.813	22.562
RG-5W (16"x 30")	WA,WG,WL,WH 42-72	34.250	20.250	0.813	24.562
RG-10W (22" X 43")	W090AP*, W120AP*, W150AP*	47.000	26.000	0.813	37.313
RG-15W (22" X 55")	W180BP*	59.000	26.000	0.813	49.313

Standard industry tolerances apply. Specs. are subject to change without notice.

Construction: Aluminum frame - brushed aluminum finish.

MIS-2408 C

Introduction

Every T Series thermostat features on-screen menus with familiar installer setup (ISU) steps, helping to eliminate the learning curve that can come with a new product. With the new UWP mounting system, you can standardize your training program, install process and truck stock – helping your techs get in and out and on their way more quickly. The T Series has a snap-together design that enables you to easily move customers from a non-connected to a connected thermostat without having to replace the cover plate.



Thermostat Features

Standard Features

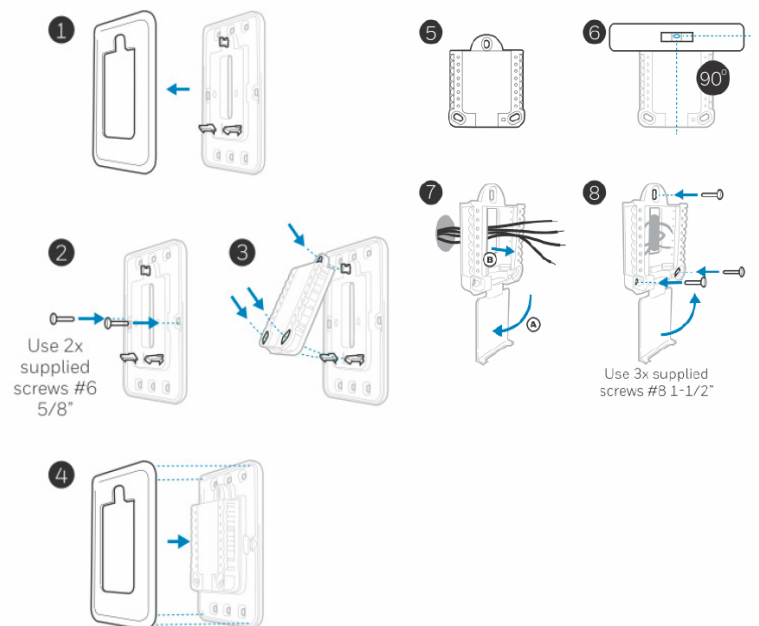
- Snap-Together design.
- Programmable scheduling.
- Battery backup.
- Easy to use interface.
- No tools required for wiring.
- Interchange between °C/°F
- Universal inputs and outputs including:
 - ° CO2 sensor input
 - ° Fresh air station input
- Configurable Economizer
- Configurable Scheduler

Options and accessories

- Outdoor sensor may be used with 8403-090.
- Outdoor or Indoor sensor may be used with 8403-092.
- Ventilation control by schedule may be used with 8403-092.

Integration

- Optional Wi-Fi when using 8403-092. Using the Lyric software, settings may be adjusted with a smartphone or tablet remotely. Easy to connect using standard Wi-Fi settings.





Thermostat Summary

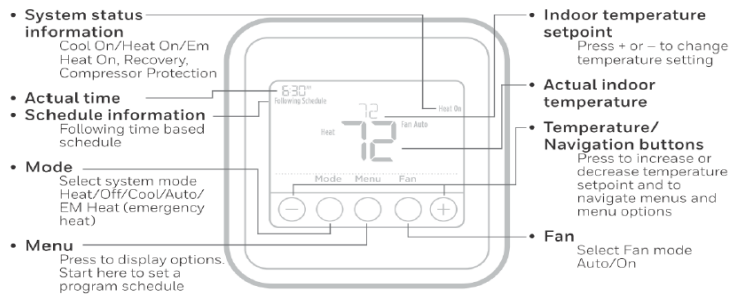
Bard #	Honeywell #	Stages	Programmable	Terminals
8403-089	TH4110U2005	1H/1C (HP or AC)	Temp. Settings per Day 4, 2, 1, 0, Programs per Week 7, 5-2, 5-1-1 or Nonprogrammable	RC, R, C, W, W2, AUX, Y, O/B, G, K, E
8403-090	TH6320U2008	3H/2C (HP) 2H/2C (AC)	Temp. Settings per Day 4, 2, 1, 0, Programs per Week 7, 5-2, 5-1-1 or Nonprogrammable	RC, R, C, W, W2, AUX, Y, Y2, O/B, G, K, E, L/A, S, S
8403-092	TH6320WF2003/V	3H/2C (HP) 2H/2C (AC)	Temp. Settings per Day 4, 2, 1, 0, Programs per Week 7, 5-2, 5-1-1 or Nonprogrammable	RC, R, C, W, W2, AUX, Y, Y2, O/B, G, K, E, U, U, L/A, S, S

Bard #	Display Color	Control Range	Languages	Replacements for Focus Pro Thermostats
8403-089	Blue	37°F to 102°F	English, Spanish, French	TH6320U1000, TH6220D1028 TH6220D1002, TH6110D1021 TH6110D1005, TH5320U1001 TH5220D1029, TH5220D1003 TH5110D1022, TH5110D1006 TH4210D1005, TH4110D1007 TH3210D1004, TH2210DV1006 TH2210DH1000, TH2110DV1008 TH2110DH1002, TH1210DV1007 TH1210DH1001
8403-090	Blue	37°F to 102°F	English, Spanish, French	
8403-092	Blue	37°F to 102°F	English, Spanish, French	

Bard #	System Switching	Programmable Fan	Ventilation Output	Humidification Control	Dehumidification Control	Auto Changeover	Backlit Display	Wi-Fi with Lyric	Keypad Lockout	Battery Backup	Low Battery Indicator	Wired Power from Unit	Service Reminder	Temporary Program Override	Temporary Temperature Hold	Remote wired Sensor
8403-089	Y	Y	N	N	N	Y	Y	N	N	Y	Y	Y	N	Y	Y	N
8403-090	Y	Y	N	N	N	Y	Y	N	N	Y	Y	Y	N	Y	Y	Outdoor only*
8403-092	Y	Y	Y	N	N	Y	Y	Y	N	Y	Y	Y	Y	Y	Y	Y*

*Optional Outdoor Sensor: Honeywell part #C7089U1006, Optional Indoor Sensor: Honeywell part #C7189U1005

Thermostat Interface - 8403-089 (T4 Pro) and 8403-090 (T6 Pro)

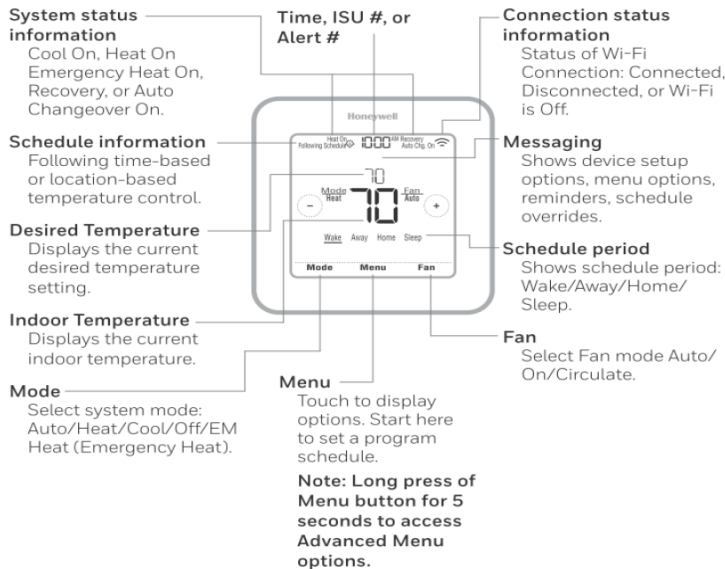


The screen will wake up by pressing any of the five buttons. If powered by the C wire, the screen stays lit for 45 seconds after you complete changes. If powered by battery only, the screen stays lit for 8 seconds. Depending on how your thermostat was installed, the screen light may always be on.



4.77" (121mm) Square

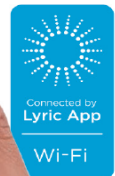
Thermostat Interface - 8403-092 (T6 Pro with Wi-Fi Lyric)



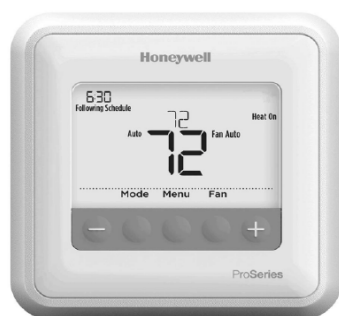
The screen will wake up by pressing the center area of the displayed temperature. The screen will stay lit for 45 seconds. Brightness can be adjusted in the Menu.



4.77" (121mm) Square



Thermostat Terminals - 8403-089 (T4 Pro)



S	Not used	L/A	Not used
S		O/B	Changeover valve
Y	Compressor contactor (stage 1)	AUX - W2	Auxiliary heat (TH4210U only)
Y2	Not used	E	Emergency heat (TH4210U only)
G	Fan Relay	W	Heat relay (stage 1)
C	24VAC common. For 2 transformer systems, use common wire from cooling transformer.	K	Connect to K on Wire Saver Module**
U	Not used	R	24VAC power from heating transformer*
U		Rc	24VAC power from cooling transformer*

Note: Not all terminals may be used, depending on the system type that is being wired. The most commonly used terminals are shaded.

* Terminal can be jumped using Slider Tab. See "Setting Slider Tabs" above.

Thermostat Terminals - 8403-090 (T6 Pro)



S	Universal input for wired indoor or outdoor sensors	L/A	Heat Pump fault input (most common case)
S		O/B	Changeover valve
Y	Compressor contactor (stage 1)	AUX - W2	Auxiliary heat relay Heat relay (stage 2)
Y2	Compressor contactor (stage 2)	E	Emergency Heat relay
G	Fan Relay	W	Heat relay (stage 1)
C	24VAC common. For 2 transformer systems, use common wire from cooling transformer.	K	Connect to K on Wire Saver Module**
U	Unused	R	24VAC power from heating transformer*
U		Rc	24VAC power from cooling transformer*

Note: Not all terminals may be used, depending on the system type that is being wired. The most commonly used terminals are shaded.

* Terminal can be jumped using Slider Tab. See "Setting Slider Tabs" above.

Thermostat Terminals - 8403-092 (T6 Pro with Wi-Fi)



Conventional Systems		Heat pump systems	
Terminal	Description	Terminal	Description
S/S	Input for a wired indoor, outdoor sensor	S/S	Input for a wired indoor, outdoor sensor
Y	Compressor Stage 1	Y	Compressor Stage 1
Y2	Compressor Stage 2	Y2	Compressor Stage 2
G	Fan Relay	G	Fan Relay
C	24VAC Common wire from secondary side of cooling transformer (if 2 transformers)	C	24VAC Common wire from secondary side of cooling transformer
K*	Connect to K on Wire Saver Module	K*	Connect to K on Wire Saver Module
U/U**	Relay for ventilation	U/U**	Relay for ventilation
A		L/A	Connect to compressor monitor
W	Heat Stage 1	O/B	Changeover valve for heat pumps
W2	Heat Stage 2	Aux	Backup Heat
		E	Emergency Heat
R	24 VAC Heating transformer	R	24 VAC Heating transformer
Rc	24 VAC Cooling transformer	Rc	24 VAC Cooling transformer