

Vantix[™] Line Gas Furnaces





S801V

80% A.F.U.E.† EcoNet® Enabled

Heating Stages: Single Stage Motor Type: Constant CFM

Input Rates: 50-150 kBTU [14.65-44.0 kW] Configuration Options: Upflow/Horizontal





† A.F.U.E. (Annual Fuel Utilization Efficiency) calculated in accordance with Department of Energy test procedures.

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Features and Benefits

- Diagnostics: With the Sure Comfort Contractor & EcoNet® Apps, built-in EcoNet® & Bluetooth® technology makes monitoring, troubleshooting and repairing the product easier than ever before
- Dip Switch Free Installation Commissioning via Bluetooth® Technology: Seamless final install step without DIP switch configuration using the Sure Comfort Contractor App
- Ignition System: Proven Direct Spark Ignition (DSI) for reliability and longevity
- Constant CFM Motor: Truly variable speed technology allows for ultimate humidity control, quieter sound levels and year-round energy savings

- Quieter Operation¹: A fully insulated blower cabinet, solid bottom and truly variable speed airflow technology makes this furnace one of the quieter options available
- EcoNet® Enabled Furnace: The latest in sensor technology and the EcoNet® monitoring system provides a new level of protection, control and energy savings
- Allows on-the-go control and receipt of system alerts by the homeowner via the EcoNet® Smart Thermostat and EcoNet® App²

¹Based on manufacturer's furnace offering, and the product's heating stages, motor type and cabinet insulation. Sound levels are also dependent on furnace location and installation.

²Wifi broadband internet connection required. Download the EcoNet® App from the App Store® or Google Play® to set up your EcoNet® Smart Thermostat. Receipt of notifications depend on home WiFi set up. Amazon, Alexa and all related logos are trademarks of Amazon.com, Inc. or its affiliates.

Ga	s Furi	naces										
<u>s</u>	<u>80</u>	1	<u>v</u>	<u>50</u>	<u>3</u>	<u>A</u>	<u>14</u>	<u>ин</u>	<u>s</u>	<u>B</u>	<u>A</u>	<u>P</u>
Brand	Furnace Efficiency	Stages of Heating	Motor Type	Heating Input (BTUH)	AC Max. Capacity	Major Series	Width	Position	NOx	Controls	Minor Series	Option Code
S - Sure Comfort	80-80% AFUE	1 - Single-Stage	V - ECM Variable Speed		4 - 4 ton drive	Series	14 - 14" Width 17 - 17.5" Width 21 - 21" Width 24 - 24.5" Width	Horizontal	S - Standard N - Low NOx	B - Communicating, Bluetooth®, EcoNet®	A - 1st Series	P - Premium Grade

[] Designates Metric Conversions

AVAILABLE MODELS	
S801V0503A14UH*BAP	
S801V0504A17UH*BAP	
S801V0754A17UH*BAP	
S801V0755A21UH*BAP	
S801V1004A17UH*BAP	
S801V1005A21UH*BAP	
S801V1255A24UH*BAP	
S801V1505A24UH*BAP	

^{*} S = Standard, N = Low NOx

STANDARD EQUIPMENT					
100% Safety Lock Out					
29-4C Stainless Steel Secondary Heat Exchanger Design					
Adjustable Cool Fan Off Delay					
Aluminized steel primary heat exchanger design					
Blower Compartment Door Safety Switch					
Bluetooth® setup and diagnostics					
Completely assembled and wired					
Direct Drive Motor					
EcoNet® Thermostat Connections					
Electronic On/Off Blower Time Control					
Fully Insulated Heat Exchanger Cabinet					
Humidfier Terminal Connection					
Induced Draft Motor					
Limit Controls					
Low Speed Continuous Fan Option					
Manual Shut-Off Valve					
Marked condensate hoses					
One Hour Automatic Retry					
Power And Self-Test Diagnostics					
Pressure Switch					
Constant CFM Electrically Communicated Blower Motor					
Redundant Main Gas Control					
Single Stage Heating Thermostat Connection					
Solid Bottom					
Blower Insulation					
Two Plus* Stage Cooling Thermostat Connection					
Dehumidification using either Bluetooth® App or EcoNet® Thermostat					

NOTE: A thermostat is not included as standard equipment *When Connected to Three Speed Or Modulating AC/HP Product

WARNING
THIS FURNACE IS NOT APPROVED OR RECOMMENDED FOR USE IN MOBILE HOMES

Physical Data and Specifications—Upflow Models

MODEL NUMBERS S801V 1stg VS-CT UP/HZ SERIES	\$801V0503 A14UH*BAP	\$801V0504 A17UH*BAP	\$801V0754 A17UH*BAP	\$801V0755 A21UH*BAP	\$801V1004 A17UH*BAP	\$801V1005 A21UH*BAP	\$801V1255 A24UH*BAP	\$801V1505 A24UH*BAP
Input-BTU/Hr [kW]	50,000 [15]	50,000 [15]	75,000 [22]	75,000 [22]	100,000 [29]	100,000 [29]	125,000 [37]	150,000 [44]
Heating Capacity BTU/Hr [kW] ①	40,000 [12]	40,000 [12]	60,000 [18]	60,000 [18]	80,000 [23]	80,000 [23]	100,000 [29]	120,000 [35]
Blower (D x W) [mm]	11 x 6 [279 x 152]	11 x 7 [279 x 178]	11 x 10 [279 x 254]	11 x 10 [279 x 254]	11 x 10 [279 x 254]			
Motor H.P. [W] Type	1/2 [373] VS-CT(ECM)	3/4 [560] VS-CT(ECM)	3/4 [560] VS-CT(ECM)	1 [746] VS-CT(ECM)	3/4 [560] VS-CT(ECM)	3/4 [560] VS-CT(ECM)	3/4 [560] VS-CT(ECM)	1 [746] VS-CT(ECM)
Min. Circuit Ampacity	9	13	9	15	12	12	12	15
Min. Overload Protection Device	15	15	15	20	15	15	15	20
Max. Overload Protection Device	15	20	15	25	20	15	15	25
Motor Full Load Amps	6.1	9.6	9.6	12.4	9.6	9.6	9.6	12.4
Heating CFM [L/s]	960 [453]	930 [439]	1450 [684]	1425 [673]	1285 [606]	1550 [732]	1900 [897]	1850 [873]
MAX Cooling CFM [L/s]	1240 [585]	1650 [779]	1650 [779]	1980 [934]	1650 [779]	1980 [934]	1980 [934]	1980 [934]
MIN Cooling CFM [L/s]	300 [142]	500 [236]	500 [236]	500 [236]	500 [236]	500 [236]	500 [236]	500 [236]
Fan CFM [L/s]	600 [283]	800 [378]	800 [378]	1000 [472]	800 [378]	1000 [472]	1000 [472]	1000 [472]
Max. E.S.P. (In. W.C.) [kPa]	1.0 [0.25]	1.0 [0.25]	1.0 [0.25]	1.0 [0.25]	1.0 [0.25]	1.0 [0.25]	1.0 [0.25]	1.0 [0.25]
Temperature Rise Range °F [°C]	25-55 [13.9-30.6]	25-55 [13.9-30.6]	25-55 [13.9-30.6]	25-55 [13.9-30.6]	40-70 [23-39]	35-65 [19.4-36.1]	40-70 [23-39]	45-75 [25-42]
Approx. Shipping Weight (Lbs.) [kg]	104.5 [47]	110 [50]	117.5 [53]	135 [61]	131.5 [60]	140 [64]	143.5 [65]	155.5 [71]
AFUE ②	80.0%	80.0%	80.0%	80.0%	80.0%	80.0%	80.0%	80.0%

NOTES: All models are 115V, 60HZ, 1 Ph. Gas connection size for all models is 1/2" [13 mm] N.P.T.

This furnace does not meet air district requirements of 14 ng/J NOx emissions limit, and thus is subject to a mitigation fee of up to \$450. This furnace is not eligible for the Clean Air Furnace Rebate Program: www.CleanAirFurnaceRebate.com.

This furnace is to be installed for propane firing only in air districts requiring 14 ng/J NOx emission limits. Operating in natural gas mode is in violation of these Rules.

① In accordance with D.O.E. test procedures.

② See Conversion Kit Index Form for high altitude derate.

^{*}S=Standard, N=Low NOx

Upflow Application

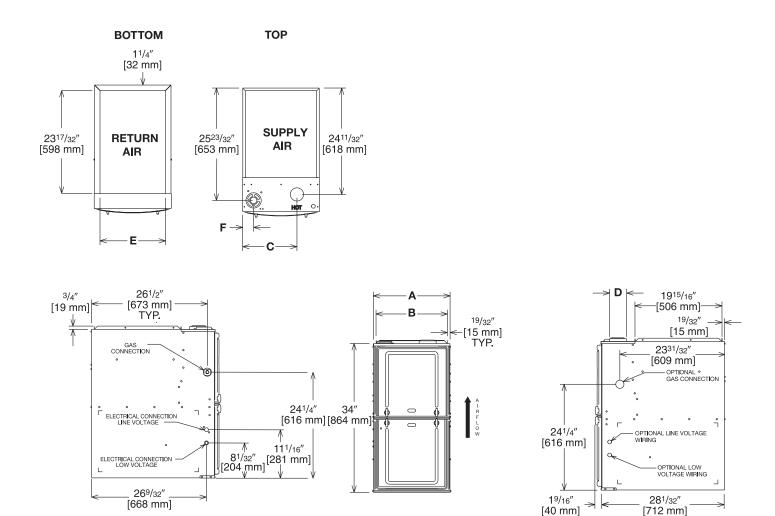


Illustration ST-A1220-04-00 FIGURE 1

RIGHT SIDE

Dimensional Data: Upflow Model

LEFT SIDE

MODEL								MINIMU	IM CLEA	RANCE (N.) [mm]	
MODEL S801V-	A	В	C	D	E	F	LEFT SIDE	RIGHT SIDE	BACK	ТОР	FRONT	VENT
503A14	14 [356]	12 ²⁷ /32 [326]	105/8 [270]	1)	111/2 [292]	1 ⁷ /8 [48]	0	4 [102] ②	0	1 [25]	3 [76]	6 [152] ③
0504A17/ 754A17/1004A17	171/2 [445]	1611/32 [415]	123/8 [314]	1	15 [381]	21/2 [64]	0	3 [76] ②	0	1 [25]	3 [76]	6 [152] ③
0755A21/1005A21	21 [533]	19 ²⁷ / ₃₂ [504]	141/8 [359]	1	181/2 [470]	21/2 [64]	0	0	0	1 [25]	3 [76]	6 [152] ③
1255A24/1505A24	241/2 [622]	2311/32 [593]	15 ⁷ /8 [403]	1	22 [559]	21/2 [64]	0	0	0	1 [25]	3 [76]	6 [152] ③

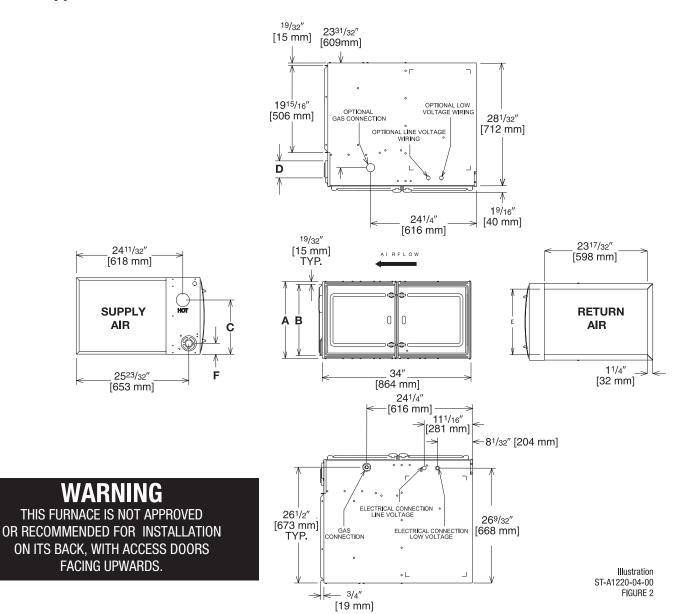
FRONT

NOTES: ① May require a 3" [76 mm] to 4" [102 mm] or 3" [76 mm] to 5" [127 mm] adapter.

- 2 May be 0" [0 mm] with type B vent.3 May be 1" [25 mm] with type B vent.

Furnaces must be vented in accordance with the National Fuel Gas Code, ANSI Z223.1 and in accordance with local codes.

Horizontal Application



Dimensional Data: Horizontal Model

MODEL									MINIMU	M CLEAP	RANCE (IN	.) [mm]	
\$801V-		A	В	C	D	E	F	SUPPLY AIR SIDE	RETURN AIR SIDE	BACK	ТОР	FRONT	VENT
0503A14	14	[356]	12 ²⁷ /32 [326]	105/8 [270]	1	111/2 [292]	17/8 [48]	4 [102] ②	4 [102] ②	0	1 [25]	3 [76]	6 [152] ③
0504A17/ 0754A17/1004A17	171/	2 [445]	16 ¹¹ /32 [415]	123/8 [314]	1	15 [381]	21/2 [64]	3 [76] ②	3 [76] ②	0	1 [25]	3 [76]	6 [152] ③
0755A21/1005A21	21	[533]	1927/32 [504]	141/8 [359]	1	181/2 [470]	21/2 [64]	0	0	0	1 [25]	3 [76]	6 [152] ③
1255A24/1505A24	241/	2 [622]	2311/32 [593]	15 ⁷ /8 [403]	1	22 [559]	21/2 [64]	0	0	0	1 [25]	3 [76]	6 [152] ③

NOTES: ① May require a 3" [76 mm] to 4" [102 mm] or 3" [76 mm] to 5" [127 mm] adapter.

Furnaces must be vented in accordance with the National Fuel Gas Code, ANSI Z223.1 and in accordance with local codes.

² May be 0" [0 mm] with type B vent.
3 May be 1" [25 mm] with type B vent.

Blower Performance Data

	TARGET GAS HEATING AIRFLOWS											
	\$801V0503 A14UH*BAP	\$801V0504 A17UH*BAP	\$801V0754 A17UH*BAP	\$801V0755 A21UH*BAP	\$801V1004 A17UH*BAP	\$801V1005 A21UH*BAP	\$801V1255 A24UH*BAP	\$801V1505 A24UH*BAP				
Factory High Heating CFM [L/s]	960 [453]	930 [439]	1450 [684]	1425 [673]	1285 [606]	1550 [732]	1900 [897]	1850 [873]				
High Heat Side Return CFM [L/s]	960 [453]	930 [439]	1450 [684]	1425 [673]	1325 [625]	1380 [651]	1900 [897]	1850 [873]				
High Heat Approx. ±7°F CFM	864 [408]	837 [395]	1305 [616]	1283 [606]	1155 [545]	1395 [658]	1710 [807]	1655 [781]				
High Heat Approx. ±12°F CFM	796 [376]	772 [364]	1204 [568]	1183 [558]	1065 [503]	1287 [607]	1577 [744]	1536 [725]				

^{*} S = Standard, N = Low NOx

^[] Designates Metric Conversions

BOTTOM RETURN FILTER RACK FOR UPFLOW APPLICATION: RXGF-CB

SIDE RETURN FILTER RACK: RXGF-CD

FILTER RACK FILTER SIZES* INCHES [mm]						
MODEL	RXGF-CB (UPFLOW/ Horizontal)	RXGF-CD (UPFLOW) SIDE RETURN				
S801V0503A14	12 ¹ / ₄ x 25 [311 x 635]	15 ³ /4 x 25 [400 x 635]				
S801V0504A17/ S801V0754A17/S801V1004A17	15 ³ / ₄ x 25 [400 x 635]	15 ³ / ₄ x 25 [400 x 635]				
S801V0755A21/S801V1005A21	19¹/4 x 25 [489 x 635]	15 ³ / ₄ x 25 [400 x 635]				
S801V1255A24/S801V1505A24	22 ³ /4 x 25 [578 x 635]	15 ³ / ₄ x 25 [400 x 635]				

4" FLUE ADAPTER: RXGW-C01

Indoor Coil Casings

MODEL Number
RXBC-D14AI
RXBC-D17AI
RXBC-D21AI
RXBC-D21BI
RXBC-D24AI

WARNING: IMPORTANT NOTICE

A SOLID METAL BASE PLATE (SEE TABLE) MUST BE IN PLACE WHEN THE FURNACE IS INSTALLED WITH SIDE AIR RETURN DUCTS. FAILURE TO INSTALL A BASE PLATE COULD CAUSE PRODUCTS OF COMBUSTION TO BE CIRCULATED INTO THE LIVING SPACE AND CREATE POTENTIALLY HAZARDOUS CONDITIONS.

FURNACE WIDTH IN. [mm]	SOLID BOTTOM KIT NO.	BASE PLATE NO.	BASE PLATE SIZE IN. [mm]
14 [356]	RXGB-D14	AE-61874-01	115/8 x 239/16 [295 x 598]
17 ¹ / ₂ [445]	RXGB-D17	AE-61874-02	151/8 x 239/16 [384 x 598]
21 [533]	RXGB-D21	AE-61874-03	185/8 x 239/16 [473 x 598]
24 ¹ / ₂ [622]	RXGB-D24	AE-61874-04	255/8 x 239/16 [651 x 598]

For High Altitudes:

OPTION CODE FOR HIGH ALTITUDE: U.S.

None required for high altitudes.

HIGH ALTITUDE CONVERSION KITS: U.S.

None required for high altitudes.

80+ HIGH ALTITUDE INSTRUCTIONS

CAUTION: Always follow National Fuel Gas Code (NFGC) guidelines when converting for high altitudes.

High altitude option codes are not required for these models. However, the burner orifice size needs to be recalculated and verified at elevations above 2000 ft. See Installation Instructions for more information.

Integrated Controls



EcoNet® is smart, technology that allows Heating and Cooling, products to communicate with each other on one integrated network.

THE ECONET® SMART THERMOSTAT

BUILT-IN WIFI

4.3" LCD TOUCH SCREEN

LOCAL WEATHER – Current conditions plus 6-day forecast

5 OPERATING MODES - Heat, Cool, Auto, Emergency Heat and Fan Only

7-DAY PROGRAMMABLE SCHEDULE - Offers comfort without thought

ONE-TOUCH AWAY – Quickly switch to your energy-saving away preferences

VACATION SCHEDULING - Allows you to save while you're away and come home to comfort

STANDBY SCREEN - Displays indoor temperature and current weather



CETST800SYS

OPERATIONAL FEATURES

AUTOMATIC CHANGEOVER – Transitions between heating and cooling automatically to keep the house comfortable

INTEGRATED WATER CONTROL – Enables easy water heater management

SMOOTH ARRIVAL - Prompts the system to start ahead of schedule to ensure the home is at the desired temperature at the scheduled time

HUMIDITY CONTROL – Supports humidifier accessories or over-cool based dehumidification

DETAILED OPERATING STATUS – View pertinent equipment status information and run times

CONTINUOUS FAN – Offers 5 speeds (Low, Medium Low, Medium, Medium High, High)

SHORT-CYCLE PROTECTION - Avoids damage to equipment from short run cycles

MONITORING & REMOTE CONTROL FEATURES

ACTIVE MONITORING – Alerts to problems that need immediate attention

REMOTE CONTROL – Allows adjusting of comfort and settings from anywhere using a mobile device

SERVICE ALERTS – Sends routine maintenance reminders

AIR FILTER MONITORING – Detects when it's time to replace the air filter

ALARM HISTORY – Displays time-stamped alarm codes with clear descriptions



GENERAL TERMS OF LIMITED WARRANTY*

Sure Comfort® will furnish a replacement for any part of this product which fails in normal use and service within the applicable period stated, in accordance with the terms of the limited warranty.

*For complete details of the Limited and Conditional Warranties, including applicable terms and conditions, contact your local contractor or the Manufacturer for a copy of the product warranty certificate.

Conditional Parts	
(Registration Required)	Ten (10) Years
Heat Exchanger	Twenty (20) Years

Before proceeding with installation, refer to installation instructions packaged with each model, as well as complying with all Federal, State, Provincial, and Local codes, regulations, and practices.

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In keeping with its policy of continuous progress and product improvement, Sure Comfort reserves the right to make changes without notice.

5600 Old Greenwood Road Fort Smith, Arkansas 72908 • www.surecomfort.com