MAINLINE®
Reliably Comfortable.™

Performance® Gas Furnaces

MP801W

80% A.F.U.E.†
Heating Stages: Single Stage
Motor Type: Constant CFM
Input Rates: 50–125 kBTU [4.7–29.3 kW]
Configuration Options: Downflow

Manufactured for
Mainline®
HVACmainline.com

† *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 BluArch™ Contractor App & 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 BluArch™ 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

Gas Furnaces

MP	80	1	W	050	3	A	14	DZ	S	B	A	S
Brand	**Furnace Efficiency**	**Stages of Heating**	**Motor Type**	**Heating Input**	**AC Max. Capacity**	**Major Series**	**Width**	**Position**	**NOx**	**Controls**	**Minor Series**	**Option Code**
MP - Mainline Performance	80 - 80% AFUE	1 - Single-Stage	W - ECM Variable Speed	050 - 50,000 075 - 75,000 100 - 100,000 125 - 125,000	3 - 3 ton drive 4 - 4 ton drive 5 - 5 ton drive	A - 1st Design Series	14 - 14" Width 17 - 17" Width 21 - 21" Width 24 - 24.5" Width	DZ - Downflow Zero Clearance	S - Standard N - Low NOx	B - Communicating, Bluetooth®	A - 1st Series	S - Standard

[ ] Designates Metric Conversions

AVAILABLE MODELS
MP801W0503A14DZ*BAS
MP801W0754A17DZ*BAS
MP801W0755A21DZ*BAS
MP801W1005A21DZ*BAS
MP801W1255A24DZ*BAS

* 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® diagnostics
Completely assembled and wired
Direct Drive Motor
Thermostat Connections
Electronic On/Off Blower Time Control
Humidistat 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
PWM Controlled Constant Torque Electrically Commutated Blower Motor.
Redundant Main Gas Control
Single Stage Heating Thermostat Connection
Two Plus* Stage Cooling Thermostat Connection

* 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—Downflow Models

U.S. Models

MODEL NUMBERS MP801W 1 STG VS-CT DOWNFLOW SERIES	MP801W 0503A14DZ*BAS	MP801W 0754A17DZ*BAS	MP801W 0755A21DZ*BAS	MP801W 1005A21DZ*BAS	MP801W 1255A24DZ*BAS
Input-BTU/Hr [kW]	50,000 [15]	75,000 [22]	75,000 [22]	100,000 [29]	125,000 [37]
Heating Capacity BTU/Hr [kW] ①	40,000 [12]	60,000 [18]	60,000 [18]	80,000 [23]	100,000 [29]
Blower (D x W) [mm]	11 x 6 [279 x 152]	11 x 7 [279 x 178]	11 x 7 [279 x 178]	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)	1 [746] VS-CT(ECM)	1 [746] VS-CT(ECM)	1 [746] VS-CT(ECM)
Min. Circuit Ampacity	9	12	15	15	15
Min. Overload Protection Device	15	15	20	20	20
Max. Overload Protection Device	15	15	25	25	25
Motor Full Load Amps	6.1	9.6	12.4	12.4	12.4
Heating CFM [L/s]	975 [460]	1175 [555]	1480 [698]	1710 [807]	1850 [873]
MAX Cooling CFM [L/s]	1240 [585]	1650 [779]	1980 [934]	1980 [934]	1980 [934]
MIN Cooling CFM [L/s]	300 [142]	500 [236]	500 [236]	500 [236]	500 [236]
Fan CFM [L/s]	600 [283]	800 [378]	800 [378]	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]
Temperature Rise Range °F [°C]	25-55 [13.9-30.6]	35-65 [19.4-36.1]	25-55 [13.9-30.6]	30-60 [16.7-33.3]	35-65 [19.4-36.1]
Approx. Shipping Weight (Lbs.) [kg]	108.5 [49]	120.5 [55]	128.5 [58]	140 [63]	151 [68]
AFUE ②	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.
① In accordance with D.O.E. test procedures.
② See Conversion Kit Index Form for high altitude derate.
*S=Standard, N=Low NOx

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 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.

[ ] Designates Metric Conversions

Downflow Dimensions

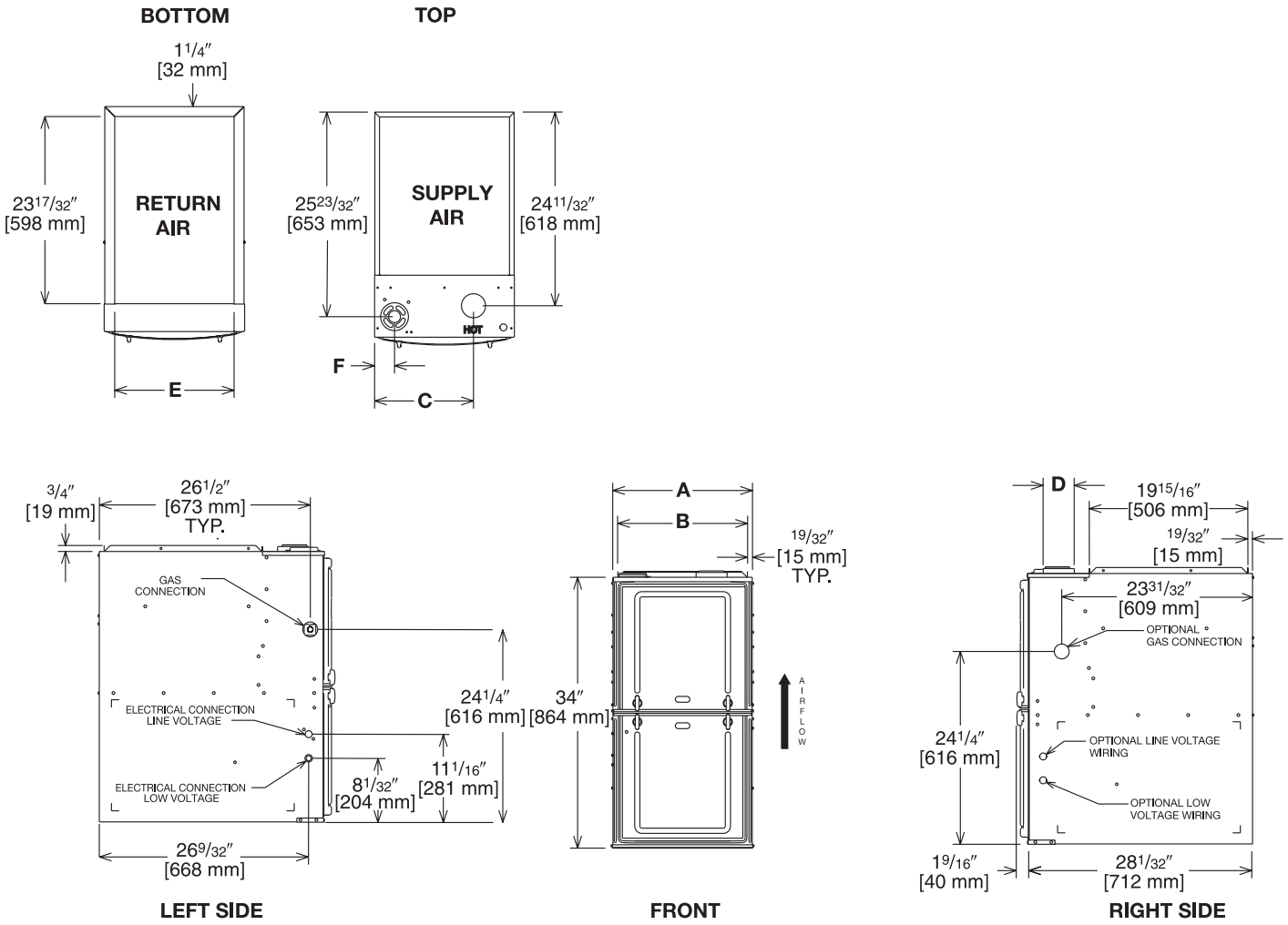


Illustration
ST-A1220-04-00
FIGURE 1

Dimensional Data—Downflow Models

MODEL MP801W DZ	A	B	C	D	E	REDUCED CLEARANCES (IN.) [mm]					
						LEFT SIDE	RIGHT SIDE	BACK	TOP	FRONT	VENT
050	14 [356]	12 27/32 [326]	10 3/8 [264]	①	13 1/8 [333]	0	4 [102] ②	0	1 [25]	3 [76]	6 [152] ③
050417	17 1/2 [445]	16 11/32 [415]	12 1/8 [308]	①	16 5/8 [422]	0	3 [76] ②	0	1 [25]	3 [76]	6 [152] ③
075521	21 [533]	19 27/32 [504]	13 7/8 [352]	①	20 1/8 [511]	0	0	0	1 [25]	3 [76]	6 [152] ③
100	21 [533]	19 27/32 [504]	13 7/8 [352]	①	20 1/8 [511]	0	0	0	1 [25]	3 [76]	6 [152] ③
125	24 1/2 [622]	23 11/32 [593]	15 5/8 [397]	①	23 5/8 [600]	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.
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.

[ ] Designates Metric Conversions

Target Gas Heating Airflows

	MP801W0503A14DZ*BAS	MP801W0754A17DZ*BAS	MP801W0755A21DZ*BAS	MP801W1005A21DZ*BAS	MP801W1255A24DZ*BAS
Factory Heating CFM [L/s]	975 [460]	1175 [555]	1480 [698]	1710 [807]	1850 [873]
Heating Approx. ±7°F CFM	878 [414]	1058 [499]	1332 [629]	1539 [726]	1665 [786]
Heating Approx. ±12°F CFM	810 [382]	976 [461]	1229 [580]	1420 [670]	1536 [725]

* S = Standard, N = Low NOx

[ ] Designates Metric Conversions

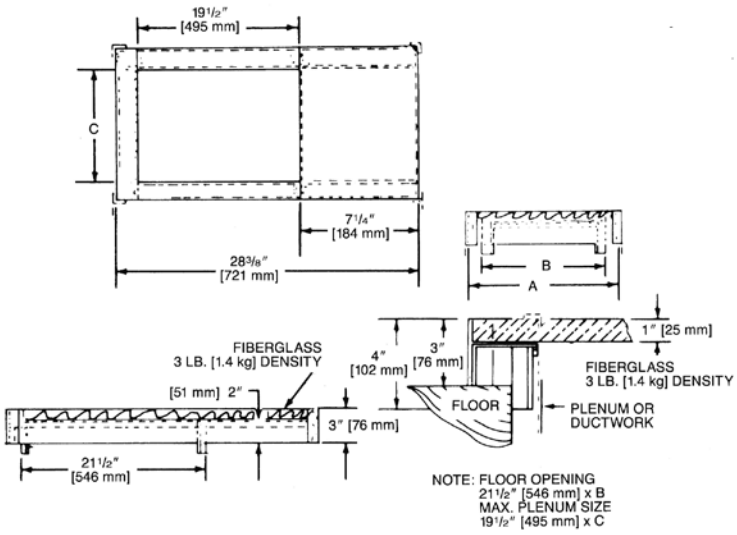
Downflow Accessories

DOWNFLOW WARNING: Unit design is certified for installation on non-combustible floor. A special factory supplied combustible floor sub-base is required when installing on a combustible floor. Failure to install the sub-base may result in fire, property damage and personal injury.

Combustible Floor Base Dimensions

COMBUSTIBLE FLOOR BASE	USE WITH FURNACE SIZES	A IN. [mm]	B IN. [mm]	C IN. [mm]
RXGC-B14	MP801W050	14 1/2 [368]	13 1/4 [337]	11 1/4 [286]
RXGC-B17	MP801W075317	18 [457]	16 3/4 [425]	14 3/4 [451]
RXGC-B21	MP801W100521, MP801W075521	21 1/2 [546]	20 1/4 [514]	18 1/4 [464]
RXGC-B24	MP801W125	25 [635]	23 3/4 [603]	21 3/4 [552]

[ ] Designates Metric Conversions



RXGF-CC*

FILTER RACK—Downflow top return mount. Requires (2) 14 x 20 Filters.

NOTE: Filter racks are shipped without filters.

*Filters available through PROSTOCK ®.

For High Altitudes:

HIGH ALTITUDE OPTION CODE: U.S. & Canada –
None required for high altitudes.

HIGH ALTITUDE CONVERSION KITS: U.S. & Canada –
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.

NOTE: For Canadian installations only, an optional derate (manifold gas pressure reduction) method may be used to adjust the furnace for altitude. See Installation Instructions for more information. This optional method may **NOT** be used for U.S. installations.

L.P. CONVERSION KIT: RXGJ-FP15

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GENERAL TERMS OF LIMITED WARRANTY*

Mainline® 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 .....Ten (10) 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.

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

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