

## VERTEX™ 96% THERMAL EFFICIENCY CONTINUOUS HOT WATER VERSATILE POWER DIRECT VENT

Today's homes demand more hot water than ever before, and the 96% efficient Vertex power direct vent gas water heaters offer unprecedented levels of performance to meet the need. The fully condensing Vertex design is so advanced, it can deliver "continuous hot water for shower after shower" ... a constant flow of over 4 gallons per minute.\*

### FEATURES

#### ENERGY STAR® QUALIFIED

#### HELICAL INTERNAL HEAT EXCHANGER

- Spiral heat exchanger keeps hot combustion gases in the tank longer lengthen the heat transfer cycle
- Positioned in the center of the tank for more even heat distribution
- Operates at 96% thermal efficiency, which saves money on operating costs compared to a standard 80% efficient gas water heater

#### POWER DIRECT VENT DESIGN

- Uses inexpensive PVC, CPVC, ABS or polypropylene pipe for intake and exhaust. Canadian installations require ULC S636 listed PVC, CPVC or polypropylene pipe for venting
- Can be vented vertically thru-the-roof or horizontally thru-the-wall
- 2" pipe, vents up to 45 equivalent feet
- 3" pipe, vents up to 128 equivalent feet
- Optional concentric vent kit available

#### CONDENSING DESIGN

- 96% efficient condensing design
- Equipped with condensate drain tee

#### SIDE-MOUNTED HOT AND COLD RECIRCULATING TAPS

- Allows Vertex to be installed as part of combination space heating/water heating applications

#### ADVANCED ELECTRONIC CONTROL

- Large LCD display
- Precise temperature control
- Advanced diagnostics
- iCOMM™ Compatible and can be monitored from remote locations. Call 1.888.WATER02 for more information.



#### HEAVY-DUTY ANODIC PROTECTION

- Provides even more protection against corrosion

#### COMMERCIAL GRADE GLASS LINING

- A. O. Smith PermaGlas® Ultra Coat™ process provides superior protection against corrosion
- Protects all interior tank surfaces including inside and outside of the helical heat exchanger

#### TOP FIRED ULTRA-LOW NOx GAS BURNER

- Enhanced Ultra-low NOx burner complies with SCAQMD Rule 1121 and other Air Quality Management Districts with similar requirements for NOx emissions of less than 10 ng/j

#### CSA CERTIFIED AND ASME RATED T&P RELIEF VALVE

#### AVAILABLE IN NATURAL GAS OR PROPANE

#### MAXIMUM HYDROSTATIC WORKING PRESSURE: 150 PSI

#### CODES AND STANDARDS

- Design-certified by CSA International according to ANSI Z21.10.3 - CSA 4.3 Standards
- These models meet the thermal efficiency and standby loss requirements of the U.S. Department of Energy and current edition ASHRAE/IESNA 90.1.
- Approved for Canada

#### SIX-YEAR LIMITED TANK AND PARTS WARRANTY

- For complete information, consult written warranty or contact your local sales rep.

### GDHE-50 & GDHE-75



Model Shown  
GDHE-50  
Series 130/131



Model GDHE-50 \*4.31 GPM continuous flow, based on 65°F inlet water temperature, 110°F outlet temperature.



# Residential Gas Water Heaters

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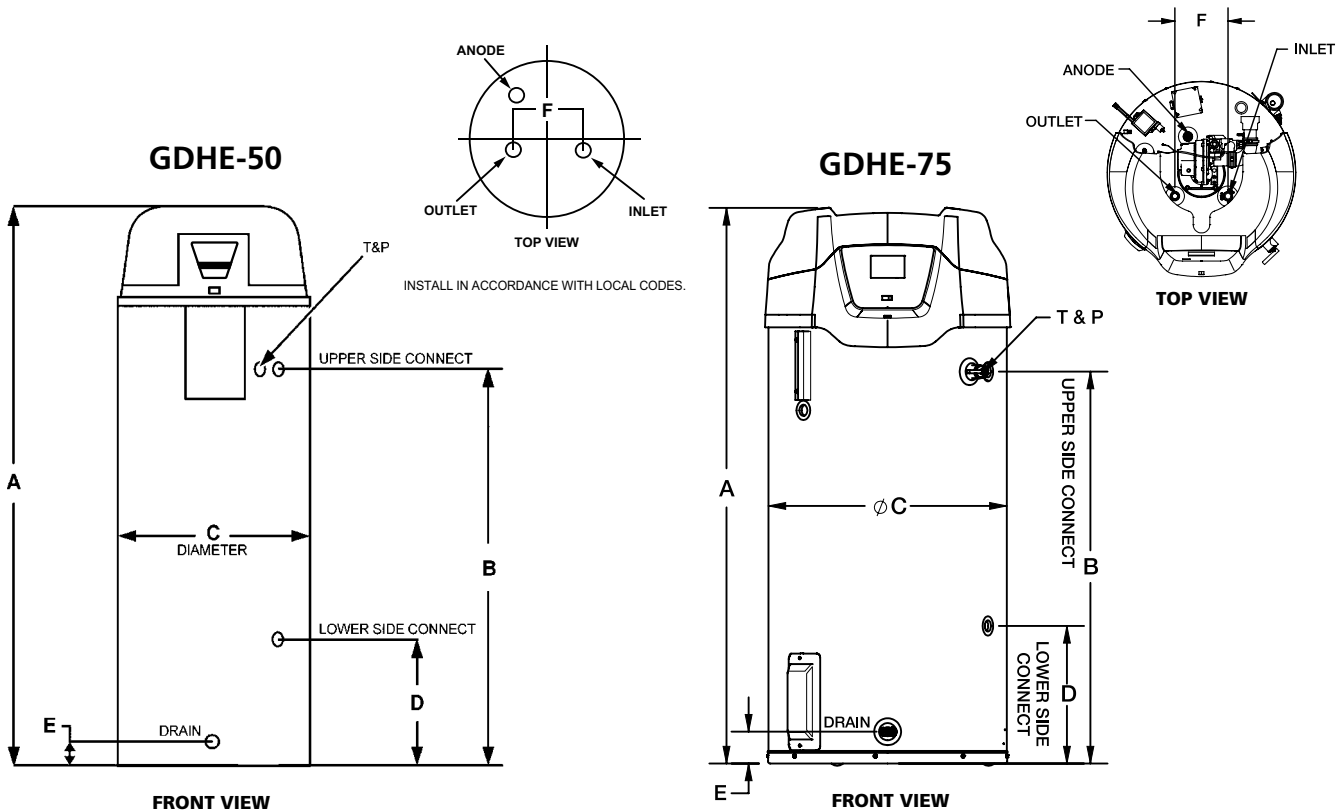
### SPECIFICATIONS

| MODEL NUMBER | BTU INPUT PER HOUR | GALLONS (LITRES) | RECOVERY GPH (LPH) 90°F / 50°C RISE | SHIPPING WEIGHT lb (kg) |
|--------------|--------------------|------------------|-------------------------------------|-------------------------|
| GDHE-50      | 100,000            | 50 (189)         | 129 (488)                           | 255 (116)               |
| GDHE-75      | 100,000            | 75 (284)         | 129 (488)                           | 382 (173)               |

### DIMENSIONS IN INCHES (CM)

| MODEL NUMBER | A              | B              | C             | D           | E           | F        |
|--------------|----------------|----------------|---------------|-------------|-------------|----------|
| GDHE-50      | 66-3/4 (169.5) | 49-1/4 (125.1) | 22 (55.9)     | 15-3/4 (40) | 3 (7.6)     | 8 (20.3) |
| GDHE-75      | 64-3/4 (164.4) | 45-5/8 (116)   | 27-3/4 (70.5) | 16 (40.6)   | 3-3/4 (9.4) | 8 (20.3) |

Available in Propane (LP) Gas (Series becomes 131)  
 Inlet and outlet connections: 3/4" male for GDHE-50 and 1" for GDHE-75  
 Circulation loop connections: 3/4" female  
 Gas inlet: 1/2"  
 Maximum Supply Pressure: 14 inches W.C. (3.48kPa)  
 Minimum Supply Pressure for Natural Gas: 3.50 inches W.C. (.87kPa)  
 Minimum Supply Pressure for Propane Gas: 8.00 inches W.C. (1.99kPa)  
 Minimum pressure must be maintained under both load and no load (dynamic and static) conditions.  
 Electrical Characteristics - 120V, 60Hz, Amperes <5



For Technical Information and Automated Fax Service, call 800-527-1953. A. O. Smith reserves the right to make product changes or improvements without prior notice.