DISPLAY THIS CARD ON PRINCIPAL FRONTAGE OF WORK



CITY OF PORTLAND BUILDING PERMIT



This is to certify that Gabriel J Zappia

Located At 133 CLINTON ST

Job ID: 2012-08-4682-HVAC

CBL: 136- A-002-001

has permission to Install Prestige Solo 110 boiler

provided that the person or persons, firm or corporation accepting this permit shall comply with all of the provisions of the Statues of Maine and of the Ordinances of the City of Portland regulating the construction, maintenance and use of the buildings and structures, and of the application on file in the department.

Notification of inspection and written permission procured before this building or part thereof is lathed or otherwise closed-in. 48 HOUR NOTICE IS REQUIRED.

A final inspection must be completed by owner before this building or part thereof is occupied. If a certificate of occupancy is required, it must be

Fire Prevention Officer

Code Enforcement Officer / Plan Reviewer

THIS CARD MUST BE POSTED ON THE STREET SIDE OF THE PROPERTY PENALTY FOR REMOVING THIS CARD.

BUILDING PERMIT INSPECTION PROCEDURES

Please call 874-8703 or 874-8693 (ONLY)

or email: buildinginspections@portlandmaine.gov

With the issuance of this permit, the owner, builder or their designee is required to provide adequate notice to the city of Portland Inspections Services for the following inspections. Appointments must be requested 48 to 72 hours in advance of the required inspection. The inspection date will need to be confirmed by this office.

- Please read the conditions of approval that is attached to this permit!! Contact this office if you have any questions.
- Permits expire in 6 months. If the project is not started or ceases for 6 months.
- If the inspection requirements are not followed as stated below additional fees may be incurred due to the issuance of a "Stop Work Order" and subsequent release to continue.

The project cannot move to the next phase prior to the required inspection and approval to continue, REGARDLESS OF THE NOTICE OF CIRCUMSTANCES.

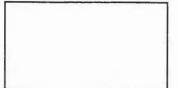
IF THE PERMIT REQUIRES A CERTIFICATE OF OCCUPANCY, IT MUST BE PAID FOR AND ISSUED TO THE OWNER OR DESIGNEE BEFORE THE SPACE MAY BE OCCUPIED.

City of Portland, Maine - Building or Use Permit Application 389 Congress Street, 04101 Tel: (207) 874-8703, FAX: (207) 8716

Job No: 2012-08-4682-HVAC	Date Applied: 8/10/2012		CBL: 136- A-002-001			
Location of Construction: 133 CLINTON ST	Owner Name: Gabriel J Zappia		Owner Address 18 COTTAGE LN CAPE ELIZABET	Phone:		
Business Name:	Contractor Name: Heating Solutions		Contractor Add PO BOX 129 BU	Phone: (207) 232-		
Lessee/Buyer's Name:	Phone:		Permit Type: HVAC	Zone: R-5		
Past Use: Two Residential Condominiums	Proposed Use: Same: Two Residential condos- to install Prestige Solo 110 heating system		Cost of Work: \$13,000.00 Fire Dept: Approved Denied N/A		Inspection Use Group Type:	
Proposed Project Description: Install Prestige Solo 110 boiler Permit Taken By: Brad		Pedestrian Activities District (P.A.D.) Zoning Approval			ignaure:	
 This permit application does not preclude the Applicant(s) from meeting applicable State and Federal Rules. Building Permits do not include plumbing, septic or electrial work. Building permits are void if work is not started within six (6) months of the date of issuance. False informatin may invalidate a building permit and stop all work. 		to conform to all applicable laws		this jurisdiction. In addition,	f a permit for work described in	
GNATURE OF APPLICAN		DDRESS	and the same of th	DATE	PHONE	



APPLICATION FOR PERMIT HEATING OR POWER EQUIPMENT



The undersigned hereby applies for a permit to instance accordance with the Laws of Maine, the Building Code of the Location / CBL / 33 Clinton St. Name and address of owner of appliance Gaprie Zizabal Installer's name and address Heating Solutions	all the following heating, cooking or power equipment in the City of Portland, and the following specifications of the City of Building Renta Date 8/10/212 Use of Building Renta Date 8/10/212 Date 8/10/212
Location of appliance: Basement	Type of Chimney: Masonry Lined Factory built
Type of Fuel: Gas Oil Solid	□ Metal Factory Built U.L. Listing #
U.L. Approved \(\text{Yes} \) No	Direct Vent Type UL#
Will appliance be installed in accordance with the manufacture's installation instructions? Yes No IF NO Explain:	Type of Fuel Tank Oil RECEIVED Gas AUG 10 2012 Size of Tank Dept of Building Inspections City of Portland Maine
The Type of License of Installer: Master Plumber #	Number of Tanks
□ Solid Fuel # □ Oil # □ Gas # PN T 8 0 8 □ Other	Distance from Tank to Center of Flame feet. Cost of Work: \$ 150 Permit Fee: \$ 150
Approved Fire: Ele.:	Approved with Conditions See attached letter or requirement
Signature of Installer Vollow File Di	Inspector's Signature Date Approved

Strengthening a Remarkable City, Building a Community for Life . www.portlandmaine.gov

Receipts Details:

Tender Information: Check, Check Number: 1120

Tender Amount: 150.00

Receipt Header:

Cashier Id: bsaucier Receipt Date: 8/10/2012 Receipt Number: 46967

Receipt Details:

Referance ID:	7594	Fee Type:	BP-Constr
Receipt Number:	0	Payment Date:	
Transaction Amount:	150.00	Charge Amount:	150.00

Job ID: Job ID: 2012-08-4682-HVAC - Install Prestige Solo 110 boiler

Additional Comments: 133 Clinton

Thank You for your Payment!



-prestige_ Solo 110 Water Boiler







INSTALLATION AND MAINTENANCE MANUAL

NOTICE

Warranty Registration Card must be filled out by the customer and mailed within thirty (30) days of installation in order to gain warranty coverage.

When receiving the PRESTIGE Solo unit, any claims for damage or shortage in shipment must be filed immediately against the transportation company by the consignee.

Leave all documentation received with appliance with owner for future reference.



If the information in this manual is not followed exactly, a fire or explosion may result causing property damage, personal injury or death.

FOR YOUR SAFETY

- Do not store or use gasoline or other flammable vapors and liquids in the vicinity of this or any other appliance.
- WHAT TO DO IF YOU SMELL GAS
 - Do not try to light any appliance
 - Do not touch any electrical switch; do not use any phone in your building.
 - Immediately call your gas supplier from a neighbor's phone. Follow the gas supplier's instructions.
 - If you cannot reach your gas supplier, call the fire department.

Installation and service must be performed by a qualified installer, service agency or the gas supplier.

Pre-Installation Items

Triangle

Maxi-F

Reference the appropriate vent supplement for clearance requirements.

BEST PRACTICE

To provide serviceability to the unit it is recommended that the following clearances be maintained:

Top boiler jacket - 24 inches [610 mm].

Front - 24 inches [610 mm].

Bottom boiler piping - 24 inches [610 mm].

Rear - 0 inches

Sides - 6 inches [153 mm]

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If the clearances listed above cannot be maintained or the enclosure in which the boiler is installed is less than 85 cubic feet, the space must be ventilated. See page 6 for ventilation requirements.

NOTICE

When maintaining zero clearance or less than recommended clearances, some product labeling may become hidden and unreadable.

A WARNING

When installing the PRESTIGE Solo in a confined space, sufficient air must be provided for proper combustion and venting and to allow, under normal operating conditions, proper air flow around the product to maintain ambient temperatures within safe limits to comply with the National Fuel Gas Code NFPA 54 - latest edition.

Residential Garage Installations

When installing the PRESTIGE Solo dential garage, the following special pr per NFPA 54/ANSI Z223.1 must be ta

- Mount the unit a minimum 1 [458 mm] above the floor lev garage. Ensure the burner and devices / controls are no less inches [458 mm] above the flo
- Locate or protect the unit in a macannot be damaged by a moving

Boiler Freeze Protection Feature

The TriMax boiler management syst freeze protection feature built in. Th monitors the boiler temperature and re follows when no call for heat is preser

- 46°F [8°C] CH (1) & Auxilia Pumps ON
- 42°F [6°C] CH (1), Auxiliary System Pumps ON, Burner o low fire
- 60°F [15°C] Freeze protecti Burner & all pumps OFF after ing CH Post Pump Time.



CAUTION

The boiler freeze protection f disabled during a hard lockout, the circulators will operate.



CAUTION

The boiler freeze protection f designed to protect the boiler. I should be installed in a prinondary piping arrangement installed in an unheated sexposed to water temperatures cless. See Section IV for prinondary piping examples. See S for antifreeze guides.



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SECTION I - Pre-Installation Items

Code Compliance

This product must be installed in accordance to the following:

- All applicable local, state, national and provincial codes, ordinances, regulations and laws.
- For installations in Massachusetts, code requires the boiler to be installed by a licensed plumber or gas fitter, and if antifreeze is utilized, the installation of a reduced pressure backflow preventer device is required in the boiler's cold water fill or make up water supply line.
- For installation in Massachusetts all direct vented appliances must comply with the guidelines as outlined on page 11.
- The National Fuel Gas Code NFPA54/ ANSI Z 223.1 - Latest edition.
- National Electric Code ANSI/NFPA 70.
- For installations in Canada "Installation Code for Gas Burning Equipment" CGA/B149.1 or B149.2 Canadian Electrical Code Part 1 CSA C22.1.
- Standards for Controls and Safety Devices for Automatically Fired Boilers, ANSI/ASME CSD-1, when required.

NOTICE

The PRESTIGE Solo boiler gas manifold and gas controls meet the safe lighting and other performance requirements as specified in ANSI Z21.13 latest edition.

Determining Product Location

Before locating the PRESTIGE SOLO check for convenient locations to:

- Heating system piping
- Venting
- Gas supply piping
- Electrical service

Ensure the boiler location allows the combustion air/vent piping to be routed directly through the building and terminate properly outside with a minimum amount of length and bends.

Ensure the area chosen for the installation of the PRESTIGE Solo is free of any combustible materials, gasoline and other flammable liquids.



Failure to remove or maintain the area free of combustible materials, gasoline and other flammable liquids or vapors can result in severe personal injury. death or substantial property damage.

Ensure the PRESTIGE Solo and its controls are protected from dripping or spraying water during normal operation or service.

The PRESTIGE Solo should be installed in a location so that any water leaking from the boiler or piping connections or relief valve will not cause damage to the area surrounding the unit or any lower floors in the structure.

Boiler Replacement

If the PRESTIGE Solo is replacing an existing boiler, the following items should be checked and corrected prior to installation:

- Boiler piping leaks and corrosion.
- Improper location and sizing of the expansion tank on the boiler heating loop.
- If applicable, level and quality of freeze protection within the boiler system.

Recommended Clearances

The PRESTIGE Solo is approved for zero clearance to combustibles, excluding vent and boiler piping.

 Boiler Piping - 1/4 inch from combustible materials.

TriangleTube

Methods of Accessing Combustion Air Into A Space - Category IV

Indoor Combustion Air

NOTICE

The methods listed in this section for accessing Indoor Combustion Air assume that the infiltration rate is adequate and not less than .40 ACH. For infiltration rates less than .40 ACH, reference the NFPA 54 National Fuel Gas Code for additional guidance.

Opening Size and Location

Openings used to connect indoor spaces shall be sized and located in accordance with the following see Fig. 1:

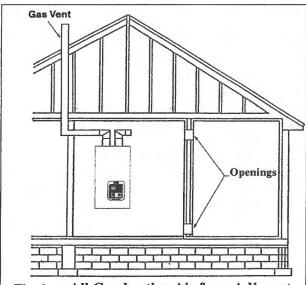


Fig. 1: All Combustion Air from Adjacent Indoor Spaces Through Indoor Combustion Openings

- Combining spaces on the same story. Each opening shall have a minimum free area of 1 sq. in./1000 Btu/hr of the total input rating of all gas utilization equipment in the space, but not less than 100 sq. inches. One opening shall commence within 12 inches of the top, and one opening shall commence within 12 inches of the bottom of the enclosure.

The minimum dimension of air openings shall be not less than 3 inches.

Combining spaces in different stories. The volumes of spaces in different stories shall be considered as communicating spaces where such spaces are connected by one or more openings in doors or floors having a total minimum free area of 2 sq. in./1000 Btu/hr of total input rating of all gas utilization equipment.

Outdoor Combustion Air

BEST PRACTICE

Isolating the combustion appliance room from the rest of the building and bringing in uncontaminated outside air for combustion and ventilation is always preferred.

Opening Size and Location

The minimum dimension of air openings shall be not less than 3 inches

Openings used to supply combustion and ventilation air shall be sized and located in accordance with the following:

One Permanent Opening Method. See Fig. 2

One permanent opening, commencing within 12 in. of the top of the enclosure, shall be provided. The equipment shall have clearances of at least 1 inch from the sides and 6 in. from the front of the appliance. The opening shall directly communicate with the outdoors or shall communicate through a vertical or horizontal duct to the outdoors or spaces that freely communicate with the outdoors and shall have a minimum free area of the following:

- 1sq. in./3000 Btu/hr of the total input rating of all equipment located in the enclosures, and



SECTION II - Combustion Air and Venting

Combustion Air Contamination



If the PRESTIGE Solo combustion air inlet is located in any area likely to cause or contain contamination, or if products, which would contaminate the air cannot be removed, the combustion air must be repiped and terminated to another location. Contaminated combustion air will damage the unit and its burner system, resulting in possible severe personal injury, death or substantial property damage.

A WARNING

Do not operate a PRESTIGE Solo if its combustion air inlet is located near a laundry room or pool facility. These areas will always contain hazardous contaminants.

Pool and laundry products and common household and hobby products often contain fluorine or chlorine compounds. When these chemicals pass through the burner and vent system, they can form strong acids. These acids can create corrosion of the heat exchanger, burner components and vent system, causing serious damage and presenting a possible threat of flue gas spillage or water leakage into the surrounding area.

Please read the information listed below. If contaminating chemicals are located near the area of the combustion air inlet, the installer should pipe the combustion air inlet to an outside area free of these chemicals per SECTION V of this installation manual.

Potential contaminating products

- Spray cans containing chloro/fluorocarbons
- Permanent Wave Solutions
- Chlorinated wax
- Chlorine based swimming pool chemicals / cleaners
- Calcium Chloride used for thawing ice
- Sodium Chloride used for water softening
- Refrigerant leaks
- Paint or varnish removers
- Hydrochloric acid / muriatic acid
- Cements and glues
- Antistatic fabric softeners used in clothes dryers
- Chlorine-type bleaches, detergents, and cleaning solvents found in household laundry rooms
- Adhesives used to fasten building products and other similar products

Areas likely to contain these products

- Dry cleaning / laundry areas and establishments
- Beauty salons
- Metal fabrication shops
- Swimming pools and health spas
- Refrigeration Repair shops
- Photo processing plants
- Auto body shops
- Plastic manufacturing plants
- Furniture refinishing areas and establishments
- New building construction
- Remodeling areas
- Garages with workshops

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Gas Vent AR opening Fig. 2: **All Combustion Air from Outdoors** Through One Permanent Air **Opening**

Not less than the sum of the areas of all vent connectors in the space.

Two Permanent Openings Method.

Two permanent openings, one commencing within 12 in. of the top and one commencing within 12 in. of the bottom of the enclosure, shall be provided. The openings shall communicate directly, or by ducts, with the outdoors or spaces that freely communicate with the outdoors, as follows:

- Where directly communicating with the outdoors or where communication to the outdoors is through vertical ducts, each opening shall have a minimum free area of 1 sq. in./4000 Btu/hr of total input rating of all equipment in the enclosure. See Fig.3.
- Where communicating with the outdoors is through horizontal ducts, each opening shall have a minimum free area of not less than 1 sq.in./2000 Btu/hr of total input rating of all equipment in the enclosure. See Fig. 4.

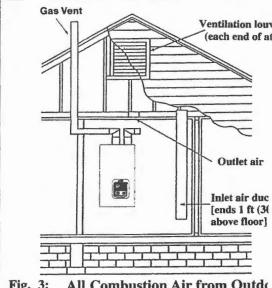
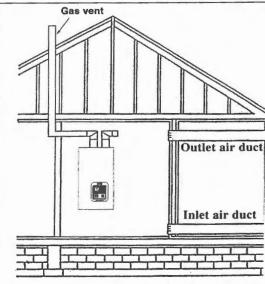


Fig. 3: All Combustion Air from Outdo **Through Ventilated Attic**



All Combustion Air from Outdo Fig. 4: **Through Horizontal Ducts**

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Maxi-Flo a

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Ventilation and Combustion Air Requirements - Direct Vent

A Direct Vent appliance utilizes uncontamined outdoor air (piped directly to the appliance) for combustion.

For Direct Vent installations, involving only the PRESTIGE Solo, in which the minimum service clearances are maintained as listed on page 4, no ventilation openings are required.

For Direct Vent, zero clearance installations involving only the PRESTIGE Solo, the space / enclosure must provide two openings for ventilation. The openings must be sized to provide 1 square inch of free area per 1,000 BTUH of boiler input. The openings shall be placed 12 inches from the top of the space and 12 inches from the floor of the space.

For installations in which the PRESTIGE Solo shares the space with air movers (exhaust fan, clothes dryers, fireplaces, etc.) and other combustion equipment (gas or oil) the space must be provided with adequate air openings to provide ventilation and combustion air to the equipment. To properly size the ventilation / combustion air openings, the installer must comply with the National Fuel Gas Code NFPA 54, ANSI Z223.1 for installations in the U.S or CSA B149.1 and B149.2 for installations in Canada.

WARNING

The space must be provided with ventilation / combustion air openings properly sized for all make-up air requirements (exhaust fans, clothes dryers, fireplaces, etc.) and the total input of all appliances located in the same space as the PRESTIGE Solo, excluding the input of a Direct Vent PRESTIGE Solo which uses combustion air directly from the outside, thus additional free area for the openings is not required. Failure to provide or properly size the openings could result in severe personal injury, death or substantial property damage.

Ventilation and Combustion Air Requirements - Category IV

A Category IV appliance utilizes un nated indoor or outdoor air (surrour appliance) for combustion.

BEST PRACTICE

In order to reduce the potential associated with indoor contal (listed on page 5), flammable valuable tight housing construction (little infiltration air), it is recomme pipe uncontaminated combust directly from the outdoors to thance. This practice also promote system efficiency by reducing indoor air from being exhaust the house and replaced by cold tion air into the house.

For installations in which the PRESTIC shares the space with air movers (exhiclothes dryers, fireplaces, etc.) and oth bustion equipment (gas or oil) the space provided with adequate air openings to ventilation and combustion air to the equal To properly size the ventilation / combustional Fuel Gas Code NFPA 54, ANS for installations in the U.S or CSA B14 B149.2 for installations in Canada, as refin this section of the manual and titled of Accessing Combustion Air into a Spa

A WARNING

The space must be provided with lation / combustion air openings | ly sized for all make-up air requir (exhaust fans, clothes dryers, fire etc.) and the total input of all applincluding the PRESTIGE Solo located in the same space. Failure vide or properly size the opening result in severe personal injury, desubstantial property damage.



Combination of Indoor and Outdoor Combustion Air

Indoor Openings: Where used, openings connecting the interior spaces shall comply with the Indoor Combustion Air section on page 7.

Outdoor Opening(s) Location. Outdoor opening(s) shall be located in accordance with the Outdoor Combustion Air section.

Outdoor Opening(s) Size. Outdoor opening(s) shall be calculated in accordance with the following:

- The ratio of the interior spaces shall be the available volume of all communicating spaces divided by the required volume.
- The outdoor size reduction factor shall be 1 minus the ratio of interior spaces.
- The minimum size of outdoor opening(s) calculated in accordance with the above outdoor air section multiplied by the reduction factor. The minimum dimension of air openings shall not be less than 3 in.

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DANGER

Do not install the PRESTIGE Solo into a common vent with other gas or oil appliances. This may cause flue gas spillage or appliance malfunction, resulting in possible severe personal injury, death or substantial property damage.

Combustion Air and Vent Piping

The PRESTIGE Solo requires a Category IV tenting system, which is designed for pressurized venting and condensate.

The PRESTIGE Solo is certified per ANSI Z21.13 as a Category IV or Direct Vent (sealed combustion) appliance. A Category IV appliance utilizes uncontamined indoor or outdoor air (surrounding the appliance) for combustion. A Direct Vent appliance utilizes uncontaminated outdoor air (piped directly to the appliance) for combustion.

BEST PRACTICE

In order to reduce the potential risks associated with indoor contaminates (listed on page 5), flammable vapors and tight housing construction (little or no infiltration air), it is recommended to pipe uncontaminated combustion air directly from the outdoors to the appliance. This practice also promotes higher system efficiency by reducing heated indoor air from being exhausted from the house and replaced by cold infiltration air into the house.

NOTICE

Install combustion air and vent pipe as detailed in the PRESTIGE Solo Vent Supplement included in the boiler installation envelope. Refer to optional vent kit instructions for addition vent installation instructions.



DANGER

Verify installed combustion air and vent piping are sealed gas tight and meet all provided instructions and applicable codes, failure to comply will result in severe personal injury of death.