



# Wood Gun SUPER E110

With Convenient Liquid Fuel Back-up Option

**NO  
CORROSION**  
GUARANTEED\*

**DUAL FUEL**  
OPTIONS AVAILABLE

# Wood Gun™



**20 YEAR WARRANTY**

**Alternate Heating Systems, Inc.**

2395 Little Egypt Rd • Harrisonville, PA 17228  
(717) 987-0099 • [sales@woodgun.com](mailto:sales@woodgun.com)  
[www.woodgun.com](http://www.woodgun.com)



ASME H-Stamp  
Certified Boiler  
Option



\*stainless models only; see the warranty for more information.

# Wood Gun™

## Wood Gun™ Super E110

With Convenient Liquid Fuel  
Back-up Option



The Super E110 is part of our Wood Gun model line of indoor wood gasification boilers. It meets and surpasses all EPA emission requirements and is safety-certified for indoor installation without thermal storage. The SE110 is the most efficient Wood Gun yet! This unit will burn 2/3 less wood than traditional updraft wood boilers. Wood Guns have been made since 1980 and have had an excellent track record over the last 40+ years!

### Advantages

The Super E110 is similar to the other Wood Gun models but has a few improvements.

- Upgraded insulation
- Standard low-temperature shutdown
- No thermal storage required
- More effective combustion chamber
- Added a secondary intake
- Smallest Wood Gun available

### NO THERMAL STORAGE



The firebox of the SE110 can accommodate wood sizes ranging from unsplit logs to full rounds and up to 26" long.

Typically, you fill the large firebox 2-3 times daily. This Wood Gun™ will handle wood of relatively high moisture content, as high as 35% moisture, freeing you from curing a 12-18 month supply of wood (30% moisture or less is preferred). Unlike European-style gasifiers, the Wood Gun excels on full rounds.

### PRESSURIZED BOILER



Weekly cleaning allows for optimal performance. Clean the firebox and lower chamber bi-weekly and clean the upper chamber weekly.

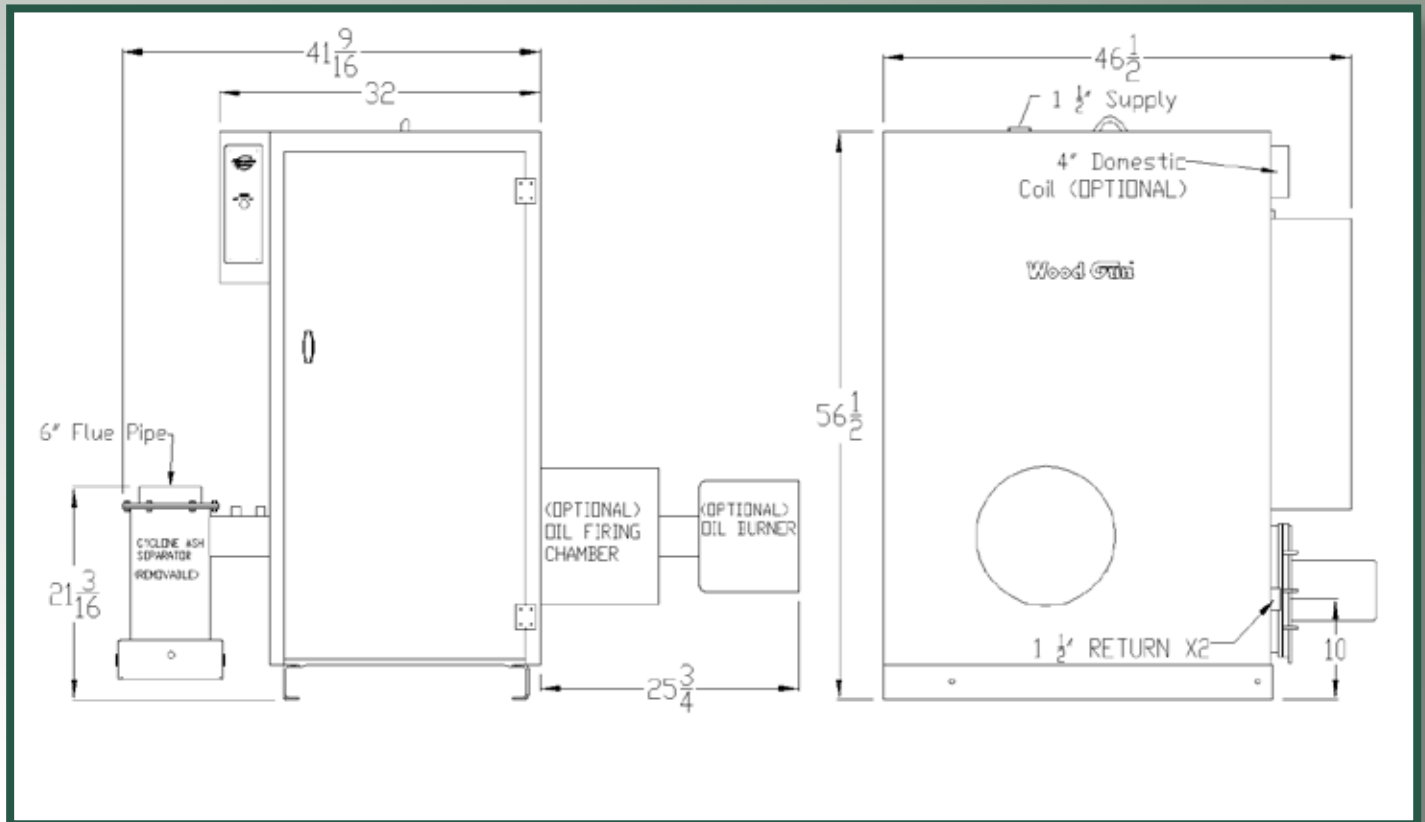
You can easily access these from the front of the wood boiler. Open the front inspection door to clean the lower and upper chambers. We include an ash rake to make cleaning fast and convenient.



The gasification process produces intense flames and high temperatures in the combustion chamber, which we transfer into the water using our Swirl Chamber heat exchanger.

The Swirl Chamber cools the exhaust to under 350F. We use the residual ash to scrub the heat exchanger as it swirls through.





You can upgrade your Wood Gun™ wood boiler with either fuel oil, natural gas, or LP gas backup (non-UL version only). The Riello fuel oil burner will allow you the option of automatic backup. Upgrading your wood boiler enables you to save money by burning a renewable fuel source and the convenience of burning oil. The oil backup system is rated over 84% efficient. You can't go wrong with an efficiency rating that rivals top-of-the-line oil units.



## How It Works

The process of pulling wood gas from wood using a high-temperature environment is called pyrolysis. The induction fan pulls the wood gases and fire down into the combustion chamber, where the gasses burn entirely. From here, the super-heated, spent gases pass through the interconnected refractory tunnels into our uniquely designed swirl chamber.

The swirl chamber is where the bulk of heat exchange takes place. Above the heat exchanger, the super-heated refractory continues to gasify the wood remaining in the firebox. After combustion, the residual ash is combined with high-velocity airflow to scrub the heat exchanger preventing any build-up. This process leads to unparalleled consistency in heat exchange.

The Wood Gun™ will cycle on and off like an oil or gas-fired boiler. During the off cycle, the wood boiler does not consume fuel because there is no oxygen in the combustion chamber. With the large super-heated refractory mass, reignition of the fuel occurs automatically when a drop in water temperature signals the need for heat. Automatic reignition can take as long as 4 hours after the last firing cycle, depending on boiler size.

During the off cycle, wood gas inside the firebox condenses on the inner walls forming a solid that will eventually fall off. The fallen solids combine with the remaining fuel, adding energy that in many other boilers goes up the chimney.





# Wood Gun<sup>TM</sup> SUPER E110

## SPECIFICATIONS

## SE110

HIGHEST EFFICIENCY (%)	82
MAX BTU/HR	120,000
TYPICAL HEATING CAPACITY (SQ FT)**	3,000
FIREBOX CAPACITY (CUBIC FT)	5.6
FIREBOX LENGTH (IN)	28
STANDARD DOOR OPENING (IN)	14 x 14
WATER CAPACITY (GAL)	60
FLUE SIZE (IN)	6
WEIGHT (WITHOUT GAS/OIL BACKUP) (LBS)	1,600
SUPPLY AND RETURN FITTING SIZE (IN)	1 ½
MINIMUM CLEARANCE TO COMBUSTIBLES (IN)	18

\* Based on loading firebox with seasoned hardwood

\*\*Subject to building design/construction

Specifications subject to change without notice

## Optional Wood Gun<sup>TM</sup> Accessories

- Domestic hot water coil
- Liquid or gas fuel backup package
- Automatic switchover option from burning wood to fuel oil.
- Draft cycle timer – extends reignition period for times of low demand
- Low water cutoff - safety shutdown device if the water level drops
- Canister-type pool heater (titanium steel or stainless steel)
- Low-temperature shutdown if the fire goes out (STANDARD ON ALL MODELS)
- Smoke exhaust hood-485 CFM
- ASME Certified on request
- UL standards certification for indoor installation.

**TESTED AT  
82% EFFICIENT**

## Industries BEST Warranty

We make the Super E110's firebox and heat exchanger from ¼" thick type 304 stainless steel. We combine that with a closed or pressurized heating system to give you an exceptionally durable product. Our customers who have been using a Wood Gun for 20-30 years will attest to that!

The Stainless Steel Vessel's Warranty - 20 years - with the first ten years 100% covered. A copy of the complete warranty text detailing coverage, limitations, warranty claim procedure, and state law rights is available from Alternate Heating Systems.

**ELIGIBLE FOR THE  
FEDERAL TAX REBATE**

*As advertised, the burn length varied from 8 to 12 hours depending on temperature. This meant that it was not necessary to load the boiler in the middle of the night, a welcome change. Also, the absence of any requirement for heat storage tanks meant that the WoodGun fit into the foot print of the boiler I replaced. Besides avoiding the cost of tanks and extra plumbing, it allowed the use of basement space for other important uses.*

*--Christopher Robbins, Vermont*



**(717) 987-0099**

[www.woodgun.com](http://www.woodgun.com)

Alternate Heating Systems manufactures alternative fuel burning heating equipment and sells (primarily direct) throughout the US, Canada, and internationally. Call us today to schedule a tour of our facilities, visit our showroom, and see a working demonstration of our boilers.

**Alternate Heating Systems, Inc.**

2395 Little Egypt Rd • Harrisonville, PA 17228

*Time is the best friend of Truth*