and interest under the terms and conditions of the Loan Guarantee Agreement.

X. Default/Audit

As required by sections 1702(g)(1)(A) and 1702(i)(1) of the Act, DOE in the near future will issue regulations pertaining to default and audit requirements that will apply to any loan guarantee issued, and Loan Agreement executed, by DOE.

[FR Doc. E6–13268 Filed 8–11–06; 8:45 am]

BILLING CODE 6450–01–P

DEPARTMENT OF ENERGY

Office of Energy Efficiency and Renewable Energy

[Docket ID: ERRE–BT–2006–WAV–0140]

Energy Conservation Program for Consumer Products: Publication of the Petition for Waiver of Peerless Boilers Heat, LLC From the Department of Energy Residential Furnace and Boiler Test Procedures

AGENCY: Office of Energy Efficiency and Renewable Energy, Department of Energy.

ACTION: Notice of Petition for Waiver and request for comments.

SUMMARY: Today's notice publishes a Petition for Waiver from Peerless Boilers Heat, LLC (PB). This petition (hereafter ''PB Petition'') request a waiver from the Department of Energy's (hereafter ''Department'' or ''DOE'') test procedures for residential furnaces and boilers. Today's notice also includes an alternate test procedure PB has requested DOE to include in the Decision and Order, should the Department grant PB a waiver. The Department is soliciting comments, data, and information with respect to the PB Petition and the proposed alternate test procedure.

DATES: The Department will accept comments, data, and information regarding this Petition for Waiver until, but no later than September 13, 2006.

ADDRESSES: Please submit comments, identified by Docket ID number: EERE–BT–2006–WAV–0140, by any of the following methods:

- *Mail:* Ms. Brenda Edwards-Jones, U.S. Department of Energy, Office of Energy Efficiency and Renewable Energy, Building Technologies Program, Mailstop EE–2J, Forrestal Building, 1000 Independence Avenue, SW., Washington, DC 20585–0121. Telephone: (202) 586–2945. Please submit one signed original paper copy.
- *Hand Deliver/Courier:* Ms. Brenda Edwards-Jones, U.S. Department of Energy, Office of Energy Efficiency and Renewable Energy, Building Technologies Program, Room 1J–018, Forrestal Building, 1000 Independence Avenue, SW., Washington, DC 20585–0121.
- *E-mail: PBPetitiion@ee.doe.gov.* Include either the Docket ID number: EERE–BT–2006–WAV–0140, and/or ''PB Petition'' in the subject line of the message.
- *Federal eRulemaking Portal: http://www.regulations.gov.* Follow the instructions for submitting comments.

Instructions: All submissions received must include the agency name and case number for this proceeding. Submit electronic comments in Microsoft Word, WordPerfect, PDF, or text (ASCII) file format and avoid the use of special characters or any form of encryption. Wherever possible, include the electronic signature of the author. Absent an electronic signature, comments should electronically must be followed and authenticated by submitting the signed original paper document. The Department does not accept telefacsimiles (faxes). Any person submitting written comments must also send a copy of such comments to the petitioner. (10 CFR 430.27(b)(1)(iv)). The contact information for the petitioner in today's notice is: Mr. Jeffrey K. Alexander, Vice President, PB Heat, LLC, 9th & Rothermel Drive, P.O. Box 447, New Berlinville, PA 19545–0477.

According to 10 CFR 1004.11, any person submitting information that he or she believes to be confidential and exempt by law from public disclosure should submit two copies: One copy of the document including all the information believed to be confidential, and one copy of the document with the information believed to be confidential deleted. The Department will make its own determination about the confidential status of the information and treat it according to its determination.

Docket: For access to the docket to read the background comments relevant to this matter, go to the U.S. Department of Energy, Forrestal Building, Room 1J–018 (Resource Room of the Building Technologies Program), 1000 Independence Avenue, SW., Washington, DC 20585–0121, (202) 586–2945, between 9 a.m. and 4 p.m., Monday through Friday, except Federal holidays. Available documents include the following items: This notice, public comments received, the PB Petition, and prior Department rulemakings regarding residential furnace and boilers. Please call Ms. Brenda Edwards-Jones at the above telephone number for additional information regarding visiting the Resource Room.

FOR FURTHER INFORMATION CONTACT: Mohammed Khan, U.S. Department of Energy, Office of Energy Efficiency and Renewable Energy, Building Technologies Program, Mail Stop EE–2J, Forrestal Building, 1000 Independence Avenue, SW., Washington, DC 20585–0121, (202) 586–9611; E-mail: *Mohammed.Khan@ee.doe.gov;* or Thomas DePriest, Esq., U.S. Department of Energy, Office of General Counsel, Mail Stop GC–72, Forrestal Building, 1000 Independence Avenue, SW., Washington, DC 20585–0121, (202) 586–9507; E-mail: *Thomas.DePriest@hq.doe.gov.*

SUPPLEMENTARY INFORMATION:

I. Background and Authority

Title III of the Energy Policy and Conservation Act (EPCA) sets forth a variety of provisions concerning energy efficiency. Part B of Title III (42 U.S.C. 6291–6309) provides for the ''Energy Conservation Program for Consumer Products other than Automobiles.'' It specifically provides for definitions, test procedures, labeling provisions, energy conservation standards, and the authority to require information and reports from manufacturers. With respect to test procedures, Part B generally authorizes the Secretary of Energy to prescribe test procedures that are reasonably designed to produce results which reflect energy efficiency, energy use and estimated operating costs, and that are not unduly burdensome to conduct. (42 U.S.C. 6293(b)(3)) EPCA provides that the Secretary of Energy may amend test procedures for consumer products if the Secretary determines that amended test procedures would more accurately reflect energy efficiency, energy use and estimated operating costs, and that they are not unduly burdensome to conduct. (42 U.S.C. 6293(b))

Today's notice involves residential products covered under Part B. The PB Petition requests a waiver from the residential furnace and boiler test procedures for PB's PO–50, PO–60, PO–63 and PO–73 models of oil-fired boilers. The test procedures for residential furnaces and boilers appear at 10 CFR Part 430, Subpart B, Appendix N.

The Department's regulations contain provisions allowing a person to seek a

waiver from the test procedure requirements for covered consumer products (10 CFR 430.27). The waiver provisions allow the Assistant Secretary for Energy Efficiency and Renewable Energy (hereafter ''Assistant Secretary'') to temporarily waive test procedures for a particular basic model when a petitioner shows that the basic model contains one or more design characteristics that prevent testing according to the prescribed test procedures, or when the prescribed test procedures may evaluate the basic model in a manner so unrepresentative of its true energy consumption as to provide materially inaccurate comparative data. (10 CFR 430.27(a)(1)) The Assistant Secretary may grant the waiver subject to conditions, including adherence to alternate test procedures. Petitioners are to include in their petition any alternate test procedures known to evaluate the basic model in a manner representative of its energy consumption. (10 CFR 430.27(b)(1)(iii)) Waivers generally remain in effect until final test procedure amendments become effective, thereby resolving the problem that is the subject of the waiver.

The waiver process also allows the Assistant Secretary to grant an Interim Waiver from test procedure requirements to manufacturers that have petitioned the Department for a waiver of such prescribed test procedures. (10 CFR 430.27(a)(2)) An Interim Waiver remains in effect for a period of 180 days or until the Department issues its determination on the Petition for Waiver, whichever is sooner, and may be extended for an additional 180 days, if necessary. (10 CFR 430.27(h))

II. Petition for Waiver

On March 27, 2006, PB filed a Petition for Waiver from the test procedures applicable to its residential oil-fired boilers. PB seeks a waiver from the applicable test procedures for its PO–50, PO–60, PO–63 and PO–73 models of oil-fired boilers on the grounds that the prescribed test procedures may result in an evaluation of the basic model that is unrepresentative of its true energy consumption characteristics.

Modern residential boilers are typically used with either baseboard convector or radiant floor heating systems, and these heating systems circulate water in a closed-loop fashion. Originating at the boiler, headed water is pumped to the convectors or radiant floor coils. As the water passes through the convectors or floor coils, heat is extracted and the water is cooled. The heated water from the boiler is termed ''supply water'' and the cooled water is termed ''return water''. With any given system, the return water temperature is directly proportional to the supply water temperature which can be set at the boiler. The return water temperature is also a function of a home's heating load and the effectiveness of convector or floor coil system. Different water temperatures are also seen with different systems (and control features); the return and supply water temperatures are lower for radiant floor heating systems compared to convector systems. The DOE test procedures specifies certain supply and return temperatures for boiler efficiency testing. These temperature specifications, according to PB, do not suitably match the expected performance characteristics of the subject boiler units.

In particular, PB claims that one of the test conditions (*i.e.,* return water temperature) in the DOE test procedures is not representative of what would occur with radiant floor heating systems and for boilers equipped with outdoor reset controls. The PB Petition requests that DOE grant a waiver from existing test procedures and allow the use of an alternate test procedure. In its petition, PB requests use of the American Society of Heating, Refrigerating and Air-Conditioning Engineers (ASHRAE) Standard 103–2003 Public Review Draft, ''Determination of Boiler Performance for Low Water Temperature Applications'' (hereafter ''draft ASHRAE Standard 103–2003'').

Pending public comment, it is not clear if DOE would grant PB a waiver in the Decision and Order. PB seeks a waiver of the temperature requirements for return water in the applicable test procedure on the grounds that the prescribed test procedures may result in an evaluation of the basic model that is unrepresentative of its true energy consumption characteristics. PB also requests permission to use an alternate test procedure, draft ASHRAE Standard 103–2003, which specifies lower test temperatures that the DOE test procedure requires. PB claims boilers for which it seeks a test procedure waiver are capable of achieving condensing operating conditions with return water temperatures that are lower than those specified in the DOE test procedure. In particular, PB states that if a boiler is used with radiant floor heating systems, the return and supply water temperatures are far lower than those seen with baseboard convector systems. Similarly, PB states that if a boiler is used with baseboard convector heating systems, in combination with outdoor reset controls, the supply water temperatures can be lower than the DOE test procedure for some fraction of the heating season. In its petition, PB also asserts that because its boilers are supplied with an outdoor reset control, the boilers installed with either radiant floor heating systems or baseboard convector heating systems are capable of achieving condensing conditions and increased efficiency and reduced energy use, during warmer periods of the heating season.

DOE finds, however, that the reliability of this approach depends upon different parameters, which can vary from home to home. It depends, for example, on the home's heating load profile, which is a function of the geographic location, the temperature of the return water necessary for condensation, and the performance characteristics of the home's baseboard convectors. The draft ASHRAE Standard 103–2003 does not estimate, or take into account, how often the boiler will function in the condensing mode with a baseboard convector system and may not accurately reflect an ''annualized'' efficiency rating and may confuse consumers who purchase boilers for use with baseboard heating systems. Furthermore, there are no guarantees the boiler would be installed with outdoor reset controls. Finally, DOE is concerned that granting PB a waiver could result in energy efficiency ratings for its PO–50, PO–60, PO–63 and PO–73 models of oil-fired boilers that are not comparable to the ratings of other models of oil-fired boilers.

III. Alternate Test Procedure

The Department will make a judgment on the PB Petition after the period for public comment. The Department is publishing the proposed alternate test procedure in this notice, though it has not yet made a determination on the petition, to account for the potential need for an alternate test procedure and to allow the public to comment on a proposed alternate test procedure. PB proposed the use of draft ASHRAE standard 103–2003 as an alternate test procedure in its petition. DOE is considering including in the Decision and Order an alternate test procedure that is based on draft ASHRAE Standard 103–2003 for residential furnaces and boilers.

The Department proposes for comment the following language: 10 CFR Parts 430 Subpart B, Appendix N—''Uniform Test Method for Measuring the Energy Consumption of Furnaces and Boilers,'' as amended by adding:

Section 8.4.1

Determination of Boiler Performance for Low-Water-Temperature Applications

This section contains procedures for determining the seasonal performance of a hot water boiler used in a low-water-temperature application, specifically, for radiant floor heating systems. This performance is expressed as Low-Water-Temperature Seasonal Efficiency (LWTSE).

Note: When applying this criteria to noncondensing boilers, it should be recognized that such boilers used for low-water-temperature applications need to address the potential for the formation of condensation within the boiler's heat exchanger, in addition to the boiler's venting system. This can be addressed either by the design of the boiler and its venting system, or by the boiler's return/supply water piping, or both.

For Noncondensing Hot Water Boilers

The water flow rate shall be adjusted to produce a water temperature rise between 19.5 °F and 20.5 °F during the steady-state test described under Section 8.0, Test Procedure. During the steady-state and heat-up tests, the hot water boiler shall be supplied with water having a temperature of a least 90 °F, but not more than 94 °F.

For Condensing Hot Water Boilers

The water flow rate shall be adjusted to produce a water temperature rise between 19.5 °F and 20.5 °F during the steady-state test described under Section 8.0, Test Procedure. During the steady-state and heat-up tests, the condensing boiler shall be supplied with return water having a temperature of at least 90 °F, but not more than 94 °F. The maximum permissible variation of the return water temperature from the required value during the steady-state and heat-up tests shall not exceed ± 2 °F, except during the first 30 seconds after start-up, when it shall not exceed ± 10 °F, and between 30 and 60 seconds after start-up, when it shall not exceed ± 5 °F.

Calculations

The boiler's LWTSE shall be determined by using the applicable calculations to determine AFUE specified under Section 10.0, Calculation of derived results from test measurement.

V. Summary and Request for Comments

Today's notice announces PB's Petition for Waiver from the test procedures applicable to PB's PO–50, PO–60, PO–63 and PO–73 models of oil-fired boilers. The Department is publishing the PB Petition for Waiver in its entirety. The Petition contains no confidential information. Furthermore, PB requests the use of draft ASHRAE Standard 103–2003 as an alternate test procedure. In this alternate test procedure, the Department would replace the supply water temperature requirements in the DOE test procedure with the requirements in draft ASHRAE Standard 103–2003.

The Department is interested in receiving comments on all aspects of this notice. The Department is particularly interested in receiving comments and views of interested parties concerning whether to grant the PB Petition and regarding the proposed alternate test procedure. Specifically, the Department would like to receive comment on the following questions:

- Does the DOE test procedure provide results that are unrepresentative of the PB PO–50, PO–60, PO–63 and PO–73 models of oil-fired boilers' energy consumption so as to provide materially inaccurate comparative data in all installations?
- Were PB to be granted a waiver, would it lead to a proliferation of petitions for waiver for other oil-fired boilers?
- Is the DOE test procedure appropriate for boilers used with baseboard convector heating systems?
- Are there other metrics that can be used to assess the performance of low-water-temperature boilers used with baseboard heating systems?
- Is it appropriate for PB to use the proposed alternate test procedure for ratings and representations, and compliance with energy efficiency standards, building codes and regulatory requirements?
- Should the Department prescribe for manufacturers the LWTSE for low-water-temperature boilers?

In addition, the Department is interested in receiving comments on possible modifications to any test procedures or alternative rating methods which the Department could use to fairly represent the energy efficiency of PB's PO–50, PO–60, PO–63 and PO–73 models of oil-fired boilers. Any person submitting written comments must also send a copy of such comments to the petitioner, whose contact information is cited above.

Issued in Washington, DC, on August 4, 2006.

Alexander A. Karsner,

Assistant Secretary, Energy Efficiency and Renewable Energy.

BILLING CODE 6450–01–P

PeerlessBoilers.com

March 15, 2006

Assistant Secretary for Conservation and Renewable Energy
United States Department of Energy
1000 Independence Ave., SW
Washington, DC 20585

Re: 430.27 Petitions for Waiver

Dear Secretary:

Pursuant to 10 CFR Part 430, "Energy Conservation Program for Consumer Products" specifically Part 430.27, "Petitions for the waiver and applications for interim waiver," PB Heat, LLC is hereby petitioning for a waiver of the temperature requirements listed in ASHRAE Standard 103-1993 as referenced in Part 430, Subpart B, Appendix N. Our Petition for Waiver is based on the grounds that "the prescribed test procedures may evaluate the basic model in a manner so unrepresentative of its true energy consumption characteristics."

PB Heat, LLC is a manufacturer of heating boilers and has it products' AFUE (Annual Fuel Usage Efficiency) ratings certified by the Hydronics Industry Division of GAMA. Specifically, our products tested and about to be marketed, under the name of Peerless® Pinnacle® Oil, Models PO-50, PO-60, PO-63, and PO-73 are designed to operate under fully condensing conditions at return water temperatures lower than that indicated in Part 430. In addition, the control supplied with the boiler is capable of providing outdoor reset to keep the boiler water temperature at a minimum until design conditions dictate that a higher temperature is required.

As the attached email message to David Scearce, P.E., of American Design Associates, LLC, the engineering firm that designs and tests our boilers, from Dr. Thomas Butcher, of Brookhaven National Laboratories, indicates, condensing in oil-fired boilers begins at return water temperatures below the 120°F prescribed in the ASHRAE Standard. Since our condensing oil fired boilers are designed to operate in low temperature applications and are equipped with an outdoor reset control that allows the boiler to run at low temperatures for much of the heating season, the procedure described in ASHRAE Standard 103-2003 (Public Review Draft), Appendix F which utilizes a nominal return water temperature of 90°F and a nominal supply water temperature of 110°F, will better

PB Heat, LLC · 9th & Rothermel Drive · PO Box 447 · New Berlinville, PA 19545-0447

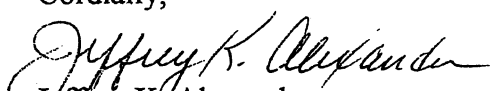
indicate a reasonable seasonal efficiency under the conditions that this boiler is designed for and is likely to be used.

With this waiver, PB Heat, LLC will be allowed to publish a LWTSE (Low Water Temperature Seasonal Efficiency) in addition to the AFUE. This will allow our customers that are using our boiler models indicated above, in low temperature applications, to receive the greatest seasonal efficiency, save money on fuel costs and apply for the Energy Tax Credit that is part of the Federal Energy Bill of 2005.

The only competitor, that we are aware of, using condensing oil technology in a space heating application is Monitor Products who manufactures the FCX boiler.

Your immediate attention to this petition is appreciated.

Cordially,



Jeffrey K. Alexander

Vice President

cc: Dr. Thomas A. Butcher

David Scearce

enci.

Alexander, Jeff

From: Scearce, David
Sent: Wednesday, March 08, 2006 8:28 AM
To: Alexander, Jeff
Subject: FW: Condensing Boilers

-----Original Message-----
From: Butcher, Thomas A [mailto:butcher@bnl.gov]
Sent: Tuesday, March 07, 2006 10:18 PM
To: Scearce, David
Subject: Condensing Boilers

Dave,

As a followup to our discussion, I think it is great that Peerless is seeking to reduce oil consumption by introducing condensing boilers. I wanted to make a few points on this technology:

Condensation, and the recovery of latent heat from flue gas, starts when the return water temperature falls about 5 F below the flue gas water vapor saturation temperature. The saturation temperature in turn depends upon the fuel, excess air level, and combustion air humidity ratio. For typical winter conditions with oil-firing our research has found that recovery of latent heat starts when the return water temperature falls below 115 F.

Most boilers are used with baseboard convectors where the design water temperature is typically 165 F and the return water temperature is always well above the temperature required to achieve condensation. When used with radiant floor heating, supply and return water temperatures are far lower and condensation can easily be achieved. Further, if used with baseboard convectors with an outdoor reset control, supply temperatures for some part of the heating season can be low enough to achieve condensation. The fraction of the heating season for which this is possible depends upon the baseboard oversize factor as we described in a recent paper published in ASHRAE Transactions. For most systems used in this way condensation can occur most of the heating season.

In our research we have also looked at the possibility of latent heat recovery in domestic hot water service when a boiler is used in combination with an indirect tank. Here the return water temperature depends upon the size of the heat exchanger in the indirect tank and the flow rate between the boiler and the tank heat exchanger. Generally, condensing operation even in domestic hot water service is not difficult to achieve.

The AFUE test procedure for boilers requires a return water temperature of 120 F and so will not reflect the achievable efficiency of these boilers if used in the ways discussed above.

T. Butcher
Brookhaven National Laboratory

[FR Doc. 06–6897 Filed 8–11–06; 8:45 am]
BILLING CODE 6450–01–C