

March 20, 2015

VIA E-MAIL

Ms. Brenda Edwards U.S. Department of Energy Building Technologies Program Mailstop EE-5B 1000 Independence Avenue, SW Washington, DC 20585-0121

RE: American Gas Association Requests Opportunity to Speak at March 27 Public Meeting (Docket No. EERE-2014-BT-STD-0031/RIN 1904-AD20)

Pursuant to the Department of Energy's (DOE) Notice of Proposed Rulemaking and Announcement of Public Meeting regarding Energy Conservation Standards for Residential Furnaces, 80 Fed. Reg. 13120 (Mar. 12, 2015), the American Gas Association (AGA) respectfully requests the opportunity to make an oral statement at DOE's March 27, 2015 public meeting.

AGA, founded in 1918, represents over 200 local energy companies that deliver clean natural gas throughout the United States. There are more than 70 million residential, commercial and industrial natural gas customers in the United States, of which 91 percent — more than 64 million customers — receive their gas from AGA members. AGA members are directly affected by DOE-established energy conservation standards applicable to natural gas appliances such as gas furnaces. AGA is particularly concerned about standards that could skew consumers' choice of fuel for space heating and water heating.

Attached, please find an advance copy of AGA's summary statement as requested in the March 12 Notice.

Please contact me if you have any questions about AGA's request to speak at the public meeting.

Respectfully,

Vice President, Policy Strategy American Gas Association

For more information, please visit <u>www.aga.org</u>.

## **Summary Statement of American Gas Association**

## March 27, 2015 Public Meeting Notice of Proposed Rulemaking Regarding Energy Conservation Standards for Residential Furnaces Docket No. EERE-2014-BT-STD-0031

The American Gas Association (AGA) appreciates the opportunity to present its views on the Department of Energy's (DOE) notice of proposed rulemaking (NOPR) regarding energy conservation standards for residential furnaces.

AGA and its member companies are strong advocates for energy efficiency in all direct use applications of natural gas. Nationwide, natural gas utilities supported energy efficiency programs with investments nearing \$1.1 billion in 2012, and similar investments in 2013 reached \$1.5 billion. Through these energy efficiency investments, AGA members helped customers save 136 trillion Btu of energy and offset 7.1 million metric tons of carbon dioxide in 2012.

AGA is concerned that DOE's proposal to adopt a 92 percent AFUE standard will have unintended consequences, comes with significant economic burdens to American consumers, and overestimates the associated energy savings. AGA is also deeply concerned by the Department's consistent lack of transparency throughout this rulemaking process. AGA offers the following preliminary comments on the NOPR:

**DOE** has erred by conducting a non-transparent process. The DOE process associated with this rulemaking has consistently obscured the assumptions, data, and methodologies contained in their technical documents in support of the rule. Despite written inquiries, questions submitted by AGA to the DOE have gone almost completely unanswered. This is particularly troubling given the immense complexity of the proposed rule and its reliance on highly sophisticated and opaque modeling methodologies. Much of the DOE analysis relies on methodologies that are proprietary or otherwise outside the public domain. Because DOE has failed to provide sufficient information needed by AGA – or any member of the public – to develop a clear understanding of the technical analysis supporting this rulemaking, it is impossible to ascertain whether or not the proposed rule meets the criteria established by EPCA for establishing new and/or amended standards.

In light of this, AGA respectfully requests that DOE provide all information requested that had previously been withheld as deliberative information, and extend the comment period to allow for all parties to have suitable time to analyze this newly provided information.

**DOE's economic analysis underestimates the costs to consumers and other adverse impacts that amended standards would impose.** AGA is concerned that DOE's cost and energy impact estimates do not fully reflect the costs that the proposed standard of 92 percent AFUE would impose on consumers and the nation. If finalized, AGA believes the rule would impose burdensome costs and renovations on many homeowners replacing their natural gas furnaces.

According to the Department's own analysis, 66 percent of affected households would see no benefit or bear higher net costs under the proposed rule. In particular, this rule will place an undue burden on low income consumers who will be unable to overcome the initial barrier presented by the higher unit costs of condensing furnaces.

A 92 percent AFUE standard is not cost justified. Even based on DOE's own analysis, AGA believes that the DOE proposal to adopt TSL 3 would be too burdensome on consumers. Under DOE's own analysis, TSL 3 will lead to increased costs for a significant number of consumers. Specifically, according to DOE's own analysis, 20 percent of households nationwide would see a net life cycle cost increase; 31 percent of consumers in the South region would experience net life cycle cost increase. Low-income consumers would be disproportionately affected – 39 percent of low-income consumers in the South would bear net life-cycle costs. EPCA is intended to be a pro-consumer statute, and a proposed standard that makes many consumers worse off, should not be considered economically justified.

AGA has jointly, along with the American Public Gas Association (APGA), retained the Gas Technology Institute (GTI) to assist it in analyzing the NOPR, and more specifically the GTI is an independent, not-for-profit technology organization engaged in research, development and training addressing energy and environmental challenges to enable a secure, abundant, and affordable energy future. It develops technology-based solutions for industry, government, and consumers. Members of the GTI team are available to participate in this public meeting, with the goal of securing as much information as possible about the NOPR and underlying TSD, concerning which we have many unanswered questions.

Our analysis to date has identified the following key concerns:

**DOE underestimates adverse impacts from fuel switching.** In particular, DOE has failed to properly estimate the economic and energy costs associated with fuel switching. For DOE's proposed standard – Trial Standard Level 3 (TSL 3) – DOE's own analysis already acknowledges that fully 60 percent of the energy savings from reduced natural gas consumption will be offset by increased electricity usage due to fuel switching. DOE's own analysis already shows that harmful emissions associated with electricity generation will also rise as a result of fuel switching, and that nearly 3,000 megawatts of additional generation capacity – including more than 600 megawatts of additional coal-fired capacity – will be required if DOE adopts its proposal. Importantly, AGA is concerned that, because of consumer sensitivity to first costs (particularly for income-constrained consumers), DOE's estimates of fuel switching costs are too low.

**DOE** overestimates product lifetime. Although industry estimates indicate that the average lifetime of a non-weatherized gas furnace is 15 or 16 years, DOE's estimate of 21.5 years is significantly longer. DOE's optimistic assumption has the effect of inflating DOE's estimates of net economic benefits and energy savings to consumers, and increasing estimates of the share of consumers who experience life-cycle benefits.

**DOE** overestimates the size of the affected market. AGA has questions and concerns with the methodologies and data used in key components of DOE's Life Cycle Cost analysis/model. A

critical component for identifying the potential benefits a new or amended efficiency standard will have on the market is to determine the size of the market that will actually be affected by the new standard. Based on our technical expert's review of the NOPR and TSD documents for the proposed rule, there appears to be flaws in the methodologies used by DOE that would overestimate the size of the market that would be affected by the proposed standard which would result in overstating the savings associated with the new standard.

DOE uses unexplained and inconsistent installation costs in its Life Cycle Cost analysis. When comparing DOE's 2011 Life Cycle Cost analysis with the Life Cycle Cost analysis used in the proposed standard, our technical experts identified a large differential in the installed costs of a baseline 80 percent NWGF and the installed cost of condensing NWGFs. The installed cost for the 80 percent NWGF have increased while the installed costs of the condensing NWGF have decreased. These large, unexplained changes in installed costs have contributed to improved Life Cycle Cost savings of condensing furnaces. In addition, the installed cost differential between the 80 percent NWGF and the condensing NWGFs in DOE LCC analysis used for the proposed rule is significantly less than the cost differential data AGA members have collected from a national survey of contractors in their market areas.

**DOE** uses unexplained and inconsistent payback criteria in its Life Cycle Cost analysis. Our technical experts have also identified inconsistencies in the payback criteria used in the Product Switching methodology section of the NOPR and the payback criteria used in the Life Cycle Cost analysis The Product Switching methodology assumes switching will not take place in cases where a payback is less than 3.5 years. However, in the LCC model if the payback for the specified efficiency level is less than 3.5 years, switching does take place if switching options with paybacks over 3.5 years are present.

**DOE** has erred in not considering the performance characteristics of non-condensing furnaces. EPCA precludes DOE from setting a standard if the standard will result in the unavailability of products with a particular performance characteristic. Non-condensing gas furnaces provide consumers with performance characteristics and utility that are distinct from those of condensing furnaces, because non-condensing furnaces can be easily vented through masonry chimneys. Consumers place significant value on this venting utility, in part because non-condensing furnaces can be installed in existing masonry chimneys found in much of the nation's housing stock.