

December 19, 2006

California Energy Commission  
Docket No. 07-AAER-1  
Docket Unit  
1516 Ninth Street, Mail Station 4  
Sacramento, CA 95814-5504

The Air-Conditioning and Refrigeration Institute (ARI) submits these written comments on the California Energy Resources Conservation and Development Commission (CEC) proposed amendments to the appliance efficiency regulations Title 20, Docket No. 07-AAER-1

ARI is a North American trade association representing the manufacturers of over 90% of U.S. produced air conditioning and commercial refrigeration equipment. ARI represents a domestic industry of approximately 200 air conditioning and refrigeration companies, employing approximately 150,000 men and women in the United States. The total value of member shipments by these companies is over \$30 billion annually. We have reviewed the proposed amendments to the appliance efficiency regulations and would like to make the following comments:

#### **Section 1604. Test Methods for Specific Appliances**

ARI supports the adoption of ANSI/ARI/ASHRAE/ISO 13256-1-1998 as the test procedures for water-source heat pumps. The standard is applicable to all water-source heat pumps regardless of their cooling capacities. Therefore, ARI does not understand why CEC is limiting the applicability of the standard to products less than 240,000 Btu/h only. In addition, ARI 340/360 is not applicable to water-source equipment and cannot be used to rate these products as suggested by the CEC. We ask that the CEC adopt ANSI/ARI/ASHRAE/ISO 13256-1-1998 for all water-source heat pumps.

In addition, we would like to point out to the CEC that the federal test procedure for evaporatively cooled equipment is ARI 210/240 for products less than 135,000 Btu/h and ARI 340/360 for products greater or equal to 135,000 Btu/h<sup>1</sup>. Consequently, we urge CEC to remove the reference to ARI 320-98.

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<sup>1</sup> Federal Register 69FR61962, October 21, 2004

**Section 1606. Filing by Manufacturers; Listing of Appliances in Database; Table V**

**Appliance B: Package Terminal Equipment**

In its initial statement of reasons, the CEC states that as a result of the final Court Order, it is restoring four voluntary fields for package terminal equipment as mandatory. We fail to understand the reason behind this decision. These four voluntary fields, as well as all the other voluntary fields in Table V, were not part of the litigation. The Court ruled on the mandatory fields of Table V only. In fact, the CEC intentionally opted to list these fields as voluntary so as not to subject them to the litigation. Therefore, we believe that the CEC cannot use the results of the federal Court Order to restore voluntary fields as mandatory. We urge the CEC to keep all voluntary fields in Table V unchanged.

In addition, information on fan nominal horsepower (indoor and outdoor) is not readily available to HVAC manufacturers. In fact, no test procedure exists today that rates the performance of fractional horsepower motors used in package terminal equipment. Therefore, we ask that these fields be either eliminated or made voluntary.

**Appliance C: All Central Air Conditioners and Central Air Conditioning Heat Pumps**

**Compressor Motor Horsepower** - ARI supports CEC's proposal to change the "compressor motor horsepower" field from mandatory to voluntary. Information on compressor motor horsepower is not available from compressor manufacturers and therefore cannot be collected by HVAC manufacturers. The same is true for the compressor motor type field. We ask that this field be either eliminated or made voluntary as HVAC manufacturers do not possess the information.

**Voluntary Fields** - As discussed above, we believe that the CEC cannot use the results of the federal Court Order to restore voluntary fields as mandatory. These fields were not part of the litigation and therefore should be left unchanged.

**Indoor Fan Motor Nominal Horsepower** – Back in July 2006, ARI met with the CEC and explained that commercial air conditioners and heat pumps with cooling capacities greater than 65,000 Btu/h are shipped with two or three different horsepower indoor fan motors depending on the job specifications. Manufacturers do not know before hand what motor would be specified and shipped with the equipment. Consequently, we do not see how the information requested could be accurately reported. For these reasons we request that the CEC either eliminate the field or make it voluntary.

**Fan motor horsepower, Design, Type, and Power Factor** - The information requested on the indoor and outdoor fan is either irrelevant or not available to HVAC manufacturers. As previously indicated, no test procedure exists to rate the performance of fractional horsepower motors used in residential central air conditioners and heat pumps. Therefore, information on motor horsepower and power factor is not available to HVAC manufacturers. In addition, asking for indoor and outdoor fan motor type is irrelevant when the program being referenced by the CEC (i.e.; NEMA Premium program) does not apply to fractional horsepower motors used in residential central air conditioners and heat pumps. Consequently we ask that the CEC eliminate or make these fields voluntary.

Appliance C: Water-Source Single Package and Split System HP < 240,000 Btu/h

In our previous discussion with the CEC, we informed staff that the current federal test procedure for water-source heat pumps is ANSI/ARI/ASHRAE/ISO 13256-1-1998. The federal test procedure does not require testing water-source heat pumps at 75°F entering water temperature. Therefore, we request that the CEC delete this requirement from Table V.

We appreciate the opportunity to submit these comments. If you have any questions regarding this submission, please feel free to contact me.

Sincerely,



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