Appliance Standards Awareness Project
Natural Resources Defense Council

September 12, 2019

Ms. Catherine Rivest
U.S. Department of Energy
Office of Energy Efficiency and Renewable Energy
Building Technologies Program, EE-5B
1000 Independence Avenue SW
Washington, DC 20585

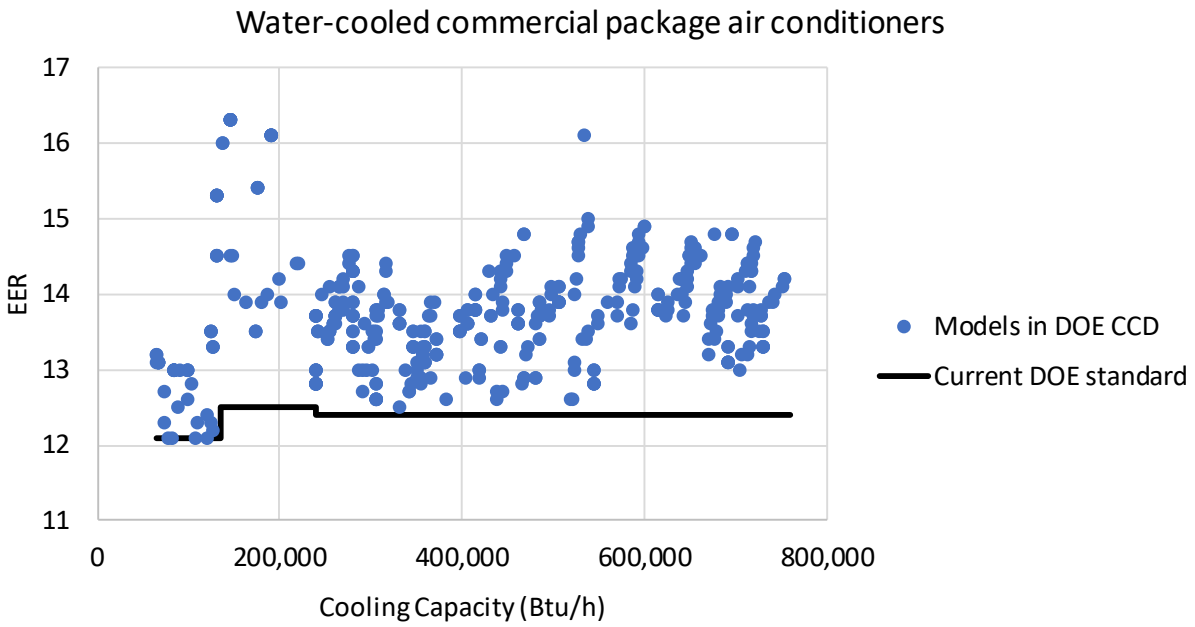
RE: Docket Number EERE–2017–BT–STD–0032 / RIN 1904-AE07: Request for Information for Energy Conservation Standards for Evaporatively-Cooled Commercial Package Air Conditioners and Water-Cooled Commercial Package Air Conditioners

Dear Ms. Rivest:

This letter constitutes the comments of the Appliance Standards Awareness Project (ASAP) and Natural Resources Defense Council (NRDC) on the request for information (RFI) for energy conservation standards for evaporatively-cooled commercial package air conditioners (ECUACs) and water-cooled commercial package air conditioners (WCUACs). 84 Fed. Reg. 36480 (July 29, 2019). We appreciate the opportunity to provide input to the Department.

We encourage DOE to analyze the potential for energy savings from amended standards for ECUACs and WCUACs, and in particular for "large" and "very large" WCUACs. DOE's analysis of the current market efficiency distribution presented in the RFI shows that the average and maximum EERs of ECUACs and WCUACs are significantly higher than the current minimum standards. For example, for "large" WCUACs (with cooling capacities greater than or equal to 135,000 Btu/h and less than 240,000 Btu/h), the average and maximum EERs are 15.0 and 16.3, respectively, while the current EER standard is 12.5.[1] Furthermore, as shown in the graph below, for WCUACs there is wide availability of models that significantly exceed the current standard levels across the range of cooling capacities.[2] (For ECUACs, there are only 15 models listed in DOE's Certification Compliance Database [CCD] with cooling capacities greater than or equal to 65,000 Btu/h.)

[1] 84 Fed. Reg. 36485.
[2] Models in DOE's Certification Compliance Database (CCD) as of 8/30/19.



We note that while the RFI shows that the minimum EER value for "large" WCUAC models is 12.5, as of August 2019 it appears that the minimum EER of models listed in DOE's CCD is 13.5, which is 1 EER point higher than the current standard.

We encourage DOE to investigate appropriate test points and weighting factors for a part-load metric for ECUACs and WCUACs. As DOE notes in the RFI, in our comments on the July 2017 test procedures RFI we encouraged DOE to adopt IEER as the metric for ECUACs and WCUACs.[3] We appreciate the discussion in the RFI regarding the current IEER weighting factors and how for ECUACs in particular, the weighting factors may not reflect the climates where ECUACs are typically used. We continue to believe that it would make sense to move to a part-load metric for ECUACs and WCUACs to better represent field performance and reflect the efficiency benefits of technologies that improve part-load performance. We encourage DOE to investigate appropriate test points and weighting factors that could be used for a part-load metric for ECUACs and WCUACs.

Thank you for considering these comments.

Sincerely,

Joanna Mauer
Technical Advocacy Manager
Appliance Standards Awareness Project

Joe Vukovich
Energy Efficiency Advocate
Natural Resources Defense Council

[3] 84 Fed. Reg. 36485.