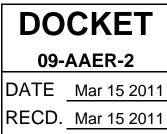


## NRDC Comments on CEC Battery Chargers Proceeding

### 2010 Rulemaking Proceeding Phase II on Appliance Efficiency Regulations: Docket Number 09-AAER-2

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Submitted by: Pierre Delforge, Senior Scientist Natural Resources Defense Council



On behalf of the Natural Resources Defense Council and our more than 250,000 members and online activists in California, we respectfully submit these comments on the Energy Commission draft Staff Analysis of Battery Charger Standards posted on February 22, 2011.

NRDC commends CEC for taking action on the important issue of battery charger systems (BCS) efficiency. Battery chargers are becoming increasingly common in consumer and commercial products and account for approximately 170 million products in use in California's homes, offices, retail stores, medical facilities, and warehouses, per PG&E and Ecos estimates. As noted in the Staff Report, battery chargers currently use an estimated 8,000 GWh/year of electricity in California, the equivalent output of nearly 3 medium-size power plants. However, the actual useful amount of energy delivered to batteries is only 2,900 GWh/year. This represents a staggering 63% of the power which is currently wasted as excess heat and not providing any useful function to the user. In addition, this excess heat often has to be removed from buildings through air conditioning, resulting in further energy waste.

At a time when climate protection is a key imperative to protect Californians from the economic, environmental and security impacts of climate change, and when air pollution from power plants using fossil fuels is responsible for serious health issues such as cancer and birth defects, this waste of energy is unacceptable to NRDC and our members. Technology exists today to significantly reduce the energy wasted by battery charger systems while lowering consumers' energy bills at the same time. We therefore strongly support CEC's proposed efficiency standard and urge industry to support it too in the interest of public health and climate protection.

We provide additional comments on the Staff Report below.

#### Pursuing a standard in California is important despite the current federal effort on consumer battery chargers.

US Department of Energy (DOE) is currently pursuing the establishment of a federal efficiency standard for consumer battery charger systems as directed by the Energy Independence and Security Act (EISA) of 2007. The rulemaking is in-progress, no draft standard has been issued yet. NRDC believes it is important for California to pursue its own standard in parallel with DOE for the following reasons:

- With its AB32 Global Warming law and its Zero Net Energy goals, California has set itself ambitious greenhouse gas and energy goals. AB32 enjoys strong support by California's population as evidenced by the overwhelming defeat of Proposition 23 in Fall 2010. California's goals require strong energy efficiency standards to reduce energy waste while developing alternative energy supplies. Given that these goals are not currently shared by the rest of the nation, California cannot rely on DOE to define a standard that meets California's needs, it must develop its own standard to meet its own needs.
- 2. While the DOE rulemaking is progressing and the preliminary technical analysis provided a strong detailed analysis of energy efficiency opportunities, there remains many uncertainties relative to the stringency, effectiveness and timing of the federal standard: no draft standard has been released yet, DOE's proposed metrics and categories are different from those proposed by CEC. NRDC believes that CEC's approach will be the most effective at saving energy as explained in comments further below. The ability for DOE to meet its schedule is also uncertain given that no draft standard has been released less than 4 months before the final rule is due to be published. In light of these uncertainties, it is important that California pursues its own process so that a final standard is released by July 2011. This will provide the industry with the regulatory certainty they need to make the required investments, and will prevent any delays in customer savings and environmental benefits.
- 3. A strong California standard will provide leadership and influence the federal regulatory rulemaking to extend these benefits to the rest of the US.

# NRDC supports modal efficiency limits proposed by CEC vs. the estimated annual energy use approach proposed by DOE.

NRDC understands the intent of the annual Unit Energy Consumption (UEC) approach proposed by DOE to provide manufacturers with the flexibility to meet the standard at the lowest cost. However in the case of BCS, UEC is not as effective as modal limits due to the diversity of the BCS market: the UEC approach relies on estimated duty cycles for each of the 10 product categories, i.e. an estimated amount of time spent in each mode. Given that battery charger systems have very different duty cycles even within each category, the estimated UEC will be significantly different from actual energy consumption for many products, resulting in suboptimal energy savings.

Instead CEC's approach sets simple limits for each usage mode: charging, maintenance and no-battery. This approach guarantees energy savings irrespective of the time users

spend in each mode, therefore maximizing energy savings and associated benefits, while still being cost-effective as determined by CEC.

#### Conclusion

NRDC thanks the Energy Commission for its leadership in establishing an effective standard to capture cost effective energy efficiency opportunities in battery chargers in California. We look forward to continuing to participate in this proceeding.

Thank you for your consideration of NRDC's comments.

Respectfully submitted,

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