DOCKET
07-AAER-3C
DATE JAN 14 2009
RECD. JAN 20 2009

NATURAL RESOURCES DEFENSE COUNCIL

NRDC Follow-up Comments to the 12/15/08 CEC Hearing on TV Efficiency Standards

NRDC respectfully submits these written comments as a follow-up to our oral testimony http://www.energy.ca.gov/appliances/2008rulemaking/documents/2008-12-15_workshop/presentations/NRDC_TV%20update_for_dec_15_2008_cec_hearing.pdf provided during the December 15, 2008 CEC hearing on the proposed minimum efficiency standards for new TVs sold in California. Our comments are divided into two parts: a) summary of NRDC's position and ongoing support for the proposed standards, and b) response to the Consumer Electronics Association's economic modeling on the impacts of the proposed standard and unsubstantiated claims about future product availability. As the CEC has already held 3 hearings on this product category and provided more than a year for interested parties to submit performance and/or incremental cost data, we urge the CEC to complete this rulemaking in a timely basis and to publish 45 day language prior to the end of the first quarter.

NRDC Support for the Proposed Standards

NRDC has actively participated in each of the three TV workshops hosted by the California Energy Commission. We remain in full support of the proposed two tier standard proposal initially submitted by PG&E and NRDC and now contained in the CEC staff report. Once this standard is in effect, PGE estimates the state will save approximately 600 MW or the equivalent of a large power plant. Given the magnitude of the savings involved and the broad availability of models that already meet the standard today and those slated to do so very soon, we urge the CEC to adopt the alternate effective dates for Tier 1 and Tier 2 of July 1, 2010 and July 1, 2011, respectively. We have spoken with many of the component manufacturers and the theme we heard repeatedly was that mandatory minimum efficiency standards such as those being considered in California help justify and accelerate investments in efficient technology and production.

We also want to highlight the fact that VIZIO one of the leading manufacturers of flat panel TVs sold in North America, submitted a letter to the docket in support of the proposed Tier 1 and Tier 2 standards (go to: http://www.energy.ca.gov/appliances/2008rulemaking/documents/2008-12-15_workshop/comments/VIZIO_Comments_TN-49393.pdf). Below is an excerpt from their letter that expresses their ability to produce both LCD and plasma TVs that meet the standards well before the proposed effective dates. In fact, they also state their support for earlier effective dates than those proposed by the CEC.

"We have several LCD models in the market today that meet the Tier 2 standard, some four years before the proposed effective date of the standard. These models are using the latest technology and features and scan a range of screen sizes. For our Plasma TVs, although it is difficult for them to meet the standard today, there are significant efficiency achievements on the near horizon that could enable them to meet the Tier 2 requirements in the next couple of years."

As VIZIO sources its components and technology from multiple 3rd party vendors, their competitors should also be able to produce equally efficient models for their product portfolios within similar time frames.

Since this proceeding was initiated roughly a year ago, the TV industry (manufacturers and their component suppliers) has made great improvements in the efficiency of the models currently on the market and those that will be available within the next 6 to 12 months. As we stated in our testimony on December 15th, 344 models already meet the Tier 1 level[1]. This level is being achieved by many manufacturers simply by shifting to a "forced menu" approach for selecting the TV settings (e.g., how bright the TV picture will be). These models span the whole spectrum of product offerings including both LCD and plasma TVs.

In addition, more than 100 models already meet the much more stringent Tier 2 standard levels, a full 4 years before the proposed standard would go into effect. These include a wide range of LCD and rear projection models from both large and small manufacturers including Sony, Samsung, VIZIO, JVC, Toshiba and lesser known brands produced by Funai and others. Many of the LCD manufacturers have begun a shift toward models that utilize energy efficient panels and modules. In lay language, these models employ more efficient films and polarizers that enable better light transmittance. As a result, some of the current backlights and associated connectors can be eliminated, and the size of the power supply can also be reduced. On a system wide basis, there is little to no incremental cost involved for producing the more efficient LCD TVs.

While no plasma TVs on the market currently meet the proposed Tier 2 standard, industry leaders have publicly stated their plans to double the luminance efficiency of models due in the market in mid 2009 followed by plans to double luminance efficiency once again thereafter. For example, the Panasonic models displayed at the January 2008 Consumer Electronic Show (CES) showcased this double-energy efficiency technology and stated market availability by mid 2009. These new models should be able to achieve the proposed Tier 2 levels while delivering similar brightness levels as those offered today. In addition, the drive towards more efficient plasma displays and

[1] As of 12/8/08, 396 models met the new ENERGY STAR specification and of those 344 also met the proposed Tier 1 CEC standard. This was based on manufacturer provided data contained on the ENERGY STAR website.

TVs has the additional benefit of lower production costs (see slides 10 and 14 in NRDC's December 15 testimony).

At last week's 2009 CES show, Panasonic proudly displayed their new prototype plasma models that cut TV "on mode" power use by up to 2/3 rds from their 2007model while delivering the same brightness levels. [2] This further demonstrates the industry's ability to innovate and to produce plasma TVs that use dramatically less power than today's models.

We also want to point out during the year long CEC proceeding, not a single manufacturer that opposes the standard has come forward and produced any incremental cost data for either LCD or plasma TVs. One would expect these companies to bring reams of data to these hearings in the event the standard was not technologically achievable or would result in unacceptable cost increases. Evidently, the facts do not support their advocacy.

NRDC Response to the CEA's Presentation

Throughout this proceeding the Consumer Electronics Association has expressed their opposition to mandatory efficiency standards for new TVs. They state vague and unsubstantiated claims that standards will stifle innovation that such standards limit consumer choice and that dire economic hardship will occur in states that set such standards. The Commission should look back at the transcripts of previous adoption hearings when tough standards were adopted: when industry associations opposed the standards, they made the same scattershot warnings and dire predictions. None of them came to pass. Instead, tight CEC standards have been met at the same time consumer features were expanded, and cost impacts were less than predicted by the Commission record, and sometimes less than zero. (Refrigerators for 1977, 1979, 1987 and 1992; air conditioners for 1992.)

Despite CEA's opposition to the standard, no manufacturer has stepped forward and stated on the record that they can not meet the proposed standard or that the levels proposed do not meet the state's cost effectiveness requirements.

During the December 15, 2008 hearing an economist representing the CEA presented the results of their computer model. The CEA failed to provide any of the detailed assumptions that went in to the model. In response to questions posed by CEC Commissioners and staff and by NRDC it became clear that the CEA model is completely invalid as it:

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[2] The link to Panasonic's press release can be found at: http://panasonic.co.jp/corp/news/official.data/data.dir/en090108-8/en090108-8.html "The newly developed NeoPDP technology has been incorporated into two types of PDPs. The first is a super high-efficiency 42-inch PDP that achieves triple luminance efficiency, while reducing the power consumption to 1/3 of the 2007 models[*1] yet achieving the same brightness. The second is an ultra-thin 50-inch PDP just 8.8 mm (approximately 1/3 inch) in profile[*2]. This ultra-thin panel delivers the world's highest moving picture resolution[*3] of 1080 lines."

1. Neglected to account for the millions of dollars in electricity bill savings that the standard would produce each year for California residents. Also, while it assumed a shift to lower priced products due to the standard, it did NOT account for these savings for consumers. Their reply was the model only shows the impact to retailers, and interestingly enough not California's citizens.

2. Their model simply assumed that 10, 20 or 30% of today's models wouldn't be available in the future. In other words, they claimed the sky would fall because a small percentage of 2008 models would not be available on the market in 2013**. Their model failed to explain that these models would simply be replaced by sales of more efficient models already available today and those soon to be brought to the market.** As an industry that prides itself on its rapid pace of technological innovation, we find it puzzling that the CEA would assume on behalf of its members that no new efficiency improvements would occur over the next 4 years. This conflicts directly against new energy saving technologies just entering the TV market such as LED backlights that offer significant energy savings[3] and are expected to have dramatically lower costs in the future. Neither CEA nor any of their members provided any data explaining why 10 to 30% of today's models could not meet the proposed levels in the future.

3. The economic impact claims of alleged job loss made by CEA and representatives of small hi-end dealerships were based on the assertion that the standard would force consumers towards smaller TVs and reduce sales of "high end" TVs. This claim is completely unsubstantiated. We find this particularly irresponsible as the price of big screen TVs has dropped >100% over the past five years due to lower manufacturing costs. The CEA's "economic model" conveniently ignored this market phenomenon in its analysis. The impact the California standard may have on retail costs, if any, is trivial in comparison to these much larger forces.

More information on these pricing trends includes:

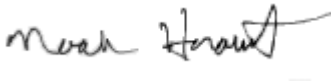
> ***A****ccording to projections by DisplaySearch, production costs of LCD TVs will decrease 10-16% annually through 2010. Increased outsourcing of TV assembly, improved efficiency and lower material costs will contribute to the cost savings. DisplaySearch also predicts that larger-size LCD TVs, up to 65-inch models, will have even sharper drops in production costs at almost a 20% per year. The research firm predicts that by the fourth quarter of 2010, 52-inch full HD TV production costs will be less than $1,000….. This rapid decline in manufacturing costs will likely translate into an even more rapid retail price drop for flat panel TVs.*
> http://www.rtoonline.com/content/Article/Dec07/LCD-TV_Costs_Decline873912122707.asp

[3] For example, Samsung recently showcased LED HDTVs at the 2009 CES in Las Vegas with power consumption levels reduced by 40%+ versus traditional LCD HDTVs of similar size.

Towards the end of the hearing there was also some discussion about the impact of the standard on "high end" TVs and what impact the standard might have on them. We are unaware of any technological restrictions that would prevent high end models from achieving the proposed CEC standard levels. The same efficient panels, power supplies, etc. would go into the high end models and deliver the same performance levels. Again, the burden is squarely on the TV industry to specifically identify the performance characteristics/features that define "hi-end" TVs, and what additional power is required to deliver this incremental performance. Should such additional power requirements be necessary for TVs with unique performance requirements, we would not be opposed to the CEC granting additional power allowances for these models, as justified.

Dated: January 14th, 2009

Respectfully submitted,



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