



August 2, 2017

Verena Radulovic
EPA ENERGY STAR
Environmental Protection Agency (EPA)
1200 Pennsylvania Avenue, N.W.
Washington, DC 20460

Sent by e-mail to televisions@energystar.gov

Re: EPA's ENERGY STAR Final Draft Version 8.0 Televisions Specification

Dear Ms. Radulovic:

Samsung Electronics America, Inc. ("Samsung") respectfully submits these comments on the EPA's ENERGY STAR Final Draft Version 8.0 Television Specification ("Version 8.0").

Samsung is a world leader in technology and has been the top television manufacturer in the US and globally for over ten years. Committed to providing energy efficient televisions to U.S. consumers, Samsung is the winner of the ENERGY STAR Partner of the Year Award for Sustained Excellence in 2013, 2014, 2015 and 2016.

Samsung appreciates the opportunity to comment on this updated specification and respectfully submits the comments below.

I. Automatic Brightness Control (ABC) in Preset Picture Settings

Samsung supports the continued recognition by ENERGY STAR of ABC in the default viewing mode as an effective energy-saving feature. ABC reduces energy consumption and automatically adjusts brightness to match the ambient lighting of the viewing environment for a better viewing experience. Samsung's ABC technology changes the brightness of a TV gradually without being intrusive to the consumer's viewing experience. According to Samsung's internal study, approximately 60% of consumers stay within the default viewing settings through the lifetime of their television.

Notably, as Samsung has stated before, consumers are already being notified about whether ABC and other features that affect energy consumption are enabled in various picture settings based on information in user manuals and other means. Accordingly, because consumers are already being made aware of whether or not they are watching their television in the ENERGY STAR qualified mode, the goal of ensuring that ABC is being used properly has been achieved. Therefore, no further requirements such as limiting the number of viewing modes in which ABC can be enabled by default are needed to address the use of ABC to save energy.

II. Luminance Requirements

EPA proposes a minimum luminance requirement that TVs meet 125-nit brightness at 3 lux illuminance. Samsung appreciates that EPA accepted our input on Draft 1 concerning variability in ABC sensors and recognized the need for a measurement margin. However, Samsung suggests that the correct brightness for viewing in a dim room, based on a Society of Motion Picture and Television Engineers (SMPTE) consensus technical standard, should be 100 nits. (See ST 2080-3:2017 - SMPTE Standard - Reference Viewing Environment for Evaluation of HDTV Images; ST 2080-1:2014 - SMPTE Standard - Reference White Luminance Level and Chromaticity for HDTV.) This is the professionally agreed upon standard setting for professionals watching television content in a darkened room, when they are mastering content to be delivered to and viewed by consumers on televisions.

Notably, SMPTE is an accredited standards development organization, which has an open consensus process. SMPTE sets official standards for professional monitor and cinema peak luminance calibration levels. SMPTE has developed thousands of standards, recommended practices, and engineering guidelines, more than 800 of which are currently in force today since its founding about 100 years ago.

Accordingly, Samsung proposes a minimum luminance requirement of 80 nits at the 3 lux illuminance condition, which includes a necessary testing against the recommended 100-nit level. Moreover, Samsung proposes that EPA remove the ratio requirement from the specification and rely solely upon an 80-nit minimum-luminance requirement.

III. Energy Saving Features

Version 8.0 encourages manufacturers seeking greater assurance that their energy-saving features are acceptable to EPA to share their assessment of any new energy saving features with EPA for approval prior to certification after taking into account manufacturers' concerns regarding the variability of "typical viewing experiences."

As Samsung stated before, this proposed requirement is unworkable as a pass-fail criterion because the IEC test method is the only standardized methodology for manufacturers to determine "typical viewing experiences." Viewing experiences can vary widely from consumer to consumer, and different manufacturers may have different notions of what a typical viewing experience is. The goal of the IEC test method is to provide a uniform standard that is representative of real-world viewing. If EPA believes the IEC test method is inappropriate, EPA should offer suggestions to revise it and participate in the revision process. Once the IEC test method is revised, it can then be possible to test the energy consumption of the television in a repeatable way.

Samsung appreciates the opportunity to comment on EPA's ENERGY STAR Televisions Final Draft Version 8.0 specification. We would gladly welcome the opportunity to discuss these matters further.

Respectfully submitted,

John Godfrey
Senior Vice President, Public Policy
1200 New Hampshire Ave., NW, # 650
Washington, DC 20036
202-997-2771
john.godfrey@samsung.com

Prerna Tomar
Public Policy Counsel
1200 New Hampshire Ave., NW #650
Washington, DC 20036
202-465-5357
p.tomar@samsung.com