

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
WASHINGTON, D.C. 20460



OFFICE OF
AIR AND RADIATION

February 23, 2010

Dear ENERGY STAR[®] Set-top Box Manufacturer, Service Provider, or Other Interested Party:

The U.S. Environmental Protection Agency (EPA) welcomes your input on the attached Draft 1 Version 3.0 ENERGY STAR Set-top Box (STB) specification (“Draft 1”). EPA is revisiting the STB specification as part of a planned revision cycle in order to review previously established Tier 2 Version 2.0 requirements and develop more stringent energy efficiency targets, as appropriate, for qualifying STB products in 2011 and beyond.

On December 3, 2009, EPA hosted a conference call with stakeholders to discuss issues pertinent to Version 3.0 specification development. On December 7, 2009, EPA distributed a modified STB test procedure to the stakeholder community as part of an effort to collect additional energy performance data on current and future STB products. Stakeholders have submitted substantial constructive feedback to guide the revision process and provided a limited amount of new product test data. This feedback and test data, supplemented by an analysis of products currently qualified to ENERGY STAR, has been used to inform the development of this Draft 1 specification.

Important modifications from Version 2.0 to Draft 1 Version 3.0 include:

- Changed the Tier 1 Version 3.0 effective date to June 1, 2011, from January 1, 2011 and added a Tier 2 Version 3.0 effective date on June 1, 2013 in response to stakeholder requests for better alignment with the release of new STBs.
- Updated Partner Commitment language to address issues raised by STB manufacturers and Service Providers from the Version 2.0 specification.
- Modified STB Base Type definitions, including:
 - Cable, IP, Satellite, and Terrestrial STB base type definitions now explicitly include content delivery to Thin-client/Remote STBs, in order to accommodate new Multi-room system architectures.
 - A “Cable / Satellite DTA” base type has been added as a means of differentiating Transport Adaptors from more featured STBs.
- Revised Operational Mode definitions to be consistent with the definitions in recent ENERGY STAR specification updates.
- Revised base type and additional functionality TEC allowances, as a result of qualified product data analysis, including:
 - the Home Network Interface and Advanced Video Processing allowances from Tier 2 Version 2.0 have been removed from the list of additional functionalities, and added to the base type allowances for Cable STBs in response to recent technology trends.

- Aligned the base allowance for Satellite STBs with the base allowance for Cable STBs.
- Increased allowances for DVR and HD output for Tier 1 to 45 kWh/year and 25 kWh/year, respectively, in order to allow more full-featured STBs to qualify for ENERGY STAR.
- Maintained previous allowances for CableCARD and DOCSIS functionalities.
- Set the base allowance for Cable / Satellite DTA at 35 kWh/year for Tier 1 to allow the best available DTA STBs to qualify for ENERGY STAR under Version 3.0
- Set the base allowance for IP STBs to “TBD” pending the results of supplementary data collection. Proposed allowances for IP STBs will be made available to stakeholders as soon as possible.

In recognition of the continuing evolution of STB products, EPA is also proposing to develop Tier 2 energy efficiency levels to become effective in June, 2013. Because Tier 2 targets are intended for 2013, they will not be derived from test data from STBs that are currently on the market. Rather, EPA will consider advances in energy efficiency from across the consumer electronics industry that will be broadly applicable to STB devices and systems. Tier 2 levels will be developed with the intention of rewarding product designs that incorporate intelligent component and subsystem power management and effective use of low-power operating states, in order to identify those products which simultaneously deliver both high-quality user experience and best-in-class energy efficiency.

As always, the exchange of ideas and information among EPA, industry, and other interested parties is critical to the success of ENERGY STAR. Manufacturers are strongly encouraged to e-mail feedback on this Draft 1 Version 3.0 specification to STBs@energystar.gov by **March 23, 2010**.

EPA plans to host a stakeholder meeting to discuss the Draft 1 specification on **March 19, 2009** in Washington, DC. If you are interested in participating in person or via conference call, please email STBs@energystar.gov to register.

To track EPA’s progress in the STB specification revision process, visit the ENERGY STAR Product Development Web site at www.energystar.gov/RevisedSpecs. Please direct any specific questions to Kathleen Vokes, EPA, at vokes.kathleen@epa.gov or Stephen Pantano, ICF International, at spantano@icfi.com.

Thank you for your continued support of ENERGY STAR.

Sincerely,



Kathleen Vokes
US Environmental Protection Agency
ENERGY STAR for Set-top Boxes