

Response from The Green Grid regarding:

ENERGY STAR[®] Uninterruptible Power Supplies Version 1.0 Final Draft Specification and Test Procedure April, 2012

The Green Grid Association, a consortium of industry leading companies and individuals welcomes the opportunity to comment on the Final Draft ENERGY STAR for Uninterruptible Power Supplies (UPS) Version 1.0 Specification and Test Procedure.

Introduction

A consortium of information technology providers, consumers and other stakeholders, The Green Grid Association seeks to improve the energy efficiency of data centers around the globe. The organization takes a holistic and comprehensive approach to data center efficiency and understands that addressing this challenge requires a high-level view of the entire data center and cooperation among a wide range of industry principals. Participants in The Green Grid include such diverse companies as major server and storage equipment manufacturers, leading infrastructure manufacturers, major software providers, and large end-users / data center owners.

Overall

We are very pleased with the development process for and the content of the Initial ENERGY STAR specification and test method for UPSs. We would like to thank the EPA and its consultants for the attention paid to, and incorporation of, many of our comments and suggestions on previous memos and drafts.

The Green Grid membership remains keenly interested in the development of this new ENERGY STAR specification as we believe it will help data center owners, operators, developers, architects, engineers, and purchasing organizations make improved and informed decisions that will help EPA and The Green Grid in our mutual efforts towards reducing total energy consumption per unit of IT workload.

Comments

Minimum Average Efficiency Requirements

We agree and appreciate that the Draft 3 efficiency requirements for VFI UPSs rated greater than 10 kW were retained in the final draft. We believe that these levels are appropriate for the initial version of the specification and they can be revised as necessary in subsequent versions.

Metering Credit and Accuracy Requirements

We also agree with the variety of metering options available in the final draft and the adoption of a 5% accuracy level for internal UPS meters. The 5% requirement should be cost effectively achievable in many UPS designs which should lead to greater implementation and use of the feature.

Test Method

We are in agreement with the proposed changes to the test method. In particular, the newly granted ability to provide and directly reference test guidance documents should go a long way toward ensuring test repeatability by third parties. Changes related to alarm suppression and stability checking, and formulas for the calculation average power and efficiency are also beneficial.

Multiple Normal Mode UPSs

Limiting the requirement that UPSs with multiple normal modes must ship in their highest input dependency mode to only those products that qualify because of multiple normal mode averaging is another welcome change. We also agree with EPA's decision to not require transfer time declaration on the PPDS as characterizing such complex behavior in a single number would be inadequate.

Modular UPSs

We are in strong agreement with EPA's new position that vendors should have the freedom to set the minimum and maximum tested and qualified configurations of modular UPS systems different from the physical limits of the chassis. This change will avoid disqualifications of entire product families due to non-conformance of extreme configurations and will therefore increase participation in the program.

PPDS and Data Reporting Forms

We support EPA's plan to continue to develop the PPDS, with the cooperation of stakeholders, even after the version 1.0 specification is complete. A simple and focused PPDS and a well designed data submission form will be critical to the success of the program and simplify the experience for manufacturers, CBs and consumers. We suggest that the refinement process should continue until a few products are piloted through the independent Certification Body test and submittal processes and EPA's proposed electronic comparison tool is at least prototyped.

Conclusion

We greatly appreciate the collaborative and thoughtful process used to develop this specification and the related test method. We will continue to support the program by providing feedback on the PPDS as it evolves and we remain available for any further discussions on this subject that may arise. We look forward to repeating this process for future revisions and we look forward to the successful launch of the program in a few months.