

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



OFFICE OF
AIR AND RADIATION

Dear Refrigerated Beverage Vending Machine Manufacturers and Other Interested Parties:

EPA welcomes your input on the following **Final Draft** specification for ENERGY STAR[®] qualified Refrigerated Beverage Vending Machines. The document outlines the criteria that manufacturers' machines will need to meet to qualify for ENERGY STAR. All manufacturers and other interested parties are encouraged to review the draft specification and provide any final **comments by January 16, 2004**. Please note that this is the last opportunity to comment prior to the document being finalized. To meet the proposed February 1, 2004 effective date, EPA will not accept any comments after the January 16th deadline.

All stakeholder comments received on Draft 2 of the specification were reviewed and considered carefully during the development of the Final Draft. Based on these comments and suggestions, this latest draft of the specification incorporates the following major additions and revisions:

SUMMARY OF RESPONSES TO COMMENTS AND CHANGES FROM DRAFT 2 TO THE FINAL DRAFT:

- Clarification on the requirement to submit annual unit shipment data.
 - EPA received a comment expressing concern regarding the submittal of model numbers and/or specific capacity numbers, which could reveal the model manufacturer and may violate other confidentiality agreements. As written in the specification: "Partner must submit the total number of ENERGY STAR qualified refrigerated beverage vending machines shipped (in units by model) or an equivalent measurement as agreed to in advance by EPA and Partner". Furthermore, "any information collected and used will be masked to protect the confidentiality of the Partner". EPA understands the sensitivities of this request and will work with the manufacturers and/or another third party, such as NAMA, to determine the appropriate way to collect and use this information.

- Glass door machines continue to be included in the specification.
 - There was concern with including glass door machines in the specification and allowing them to qualify for ENERGY STAR under the new ASHRAE Standard 32.1 1997R testing requirements ($75 \pm 2^\circ\text{F}$ ($23.9 \pm 1^\circ\text{C}$) and $45 \pm 5\%$ relative humidity). Specifically, commentors questioned the appropriateness of applying the CSA equation, which was derived from testing conducted at 90 degrees, to machines being tested at 75 degrees, and the lack of available machine performance data to justify setting a minimum requirement for glass door models. Although EPA understands the concerns raised, we have decided to continue to include glass front machines for the following reasons:
 - While we acknowledge that the lack of data leads to some uncertainty in terms of the percentage of the glass door machine market that would qualify for ENERGY STAR under Tier I, we are confident that those that do qualify will offer superior energy efficiency. Furthermore, including these products in ENERGY STAR will generate the performance data necessary (at the $75 \pm 2^\circ\text{F}$ and $45 \pm 5\%$ relative humidity parameters) to ensure that the

relevant Tier II specification is set appropriately, as indicated in the note under Section 3 of the Eligibility Criteria.

- Currently, glass front machines make up a very small portion of the market. While including these machine types in the specification may have a big impact on energy-efficient design, labeling them will not make a big impact on the marketplace initially. However, it does give manufacturers a roadmap to build more energy-efficient glass front designs. It is EPA's hope that by reviewing the Tier II level before it goes into effect, EPA will determine its appropriateness based on a larger market of products and database of energy consumption information.
 - Lastly, according to discussions with machine manufacturers, not all variations of glass front machines will meet the indoor machine ENERGY STAR performance requirements.
- Already installed machines of the same model as a newly ENERGY STAR qualified model may be labeled as ENERGY STAR.
 - EPA received a number of questions as to whether machines that have already been placed on-site and are of the identical model as a newly qualified machine may be labeled as ENERGY STAR. If the machine in the field is identical to the model that has been qualified as a new machine (e.g., no retrofits or engineering design changes), it can be labeled in the field as ENERGY STAR. However, the ENERGY STAR label may only be placed on the qualifying machine after the new machine model has been listed on the ENERGY STAR Web site. All ENERGY STAR labeling requirements provided in the specification also apply to machines in the field. It is the partner's responsibility to ensure the label is properly applied and appears on the correct machine(s).
 - A new February 1, 2004 Tier I effective date is now proposed.
 - EPA received a request to postpone the Tier I effective date until the new ASHRAE Standard 32.1-1997R is adopted. It is EPA's understanding that the Standard Project Committee is planning to vote on this standard in January 2004. It is then anticipated that the ASHRAE Standards Committee will vote on the Committee's recommendation shortly thereafter. Assuming that this happens, the new standard will be on its way to being adopted by the Standards Committee by February 1st. From discussions with manufacturers, committee members, and other industry stakeholders, there is a general consensus that the requirements proposed in the new standard are acceptable. However, EPA will closely follow its progression and address any changes to the standard that may affect the ENERGY STAR specification requirements, if necessary.
 - EPA also received a request to postpone the effective date until the NAMA Spring Expo (April 1, 2004) so that refurbished machines can be included in the specification. EPA continues to believe that a retrofit piece is an extremely important piece of the specification; however, EPA does not believe that a refurbished machine program can be developed and implemented within this timeframe. Throughout the development process several manufacturers have encouraged EPA to move quickly to put the specification in place so that they may begin to qualify their products as ENERGY STAR. To avoid the risk of delaying the specification even further, EPA will continue to move forward with a new machine specification in the hopes that a retrofit piece can be added by the end of the year, allowing refurbished machines to qualify as ENERGY STAR.

Although there will be a two month period between when the specification is finalized and the NAMA Spring Expo, EPA would be happy to work with NAMA and its members to organize an ENERGY STAR launch event at the Expo. In fact, having two months to prepare will be beneficial in that it will allow for manufacturers to test, qualify, and label their products for the show floor as well as prepare promotional materials for the event.

- Minor text edits have been made to the Partner Commitments and Definitions sections of the specification.
 - EPA understands the administrative burden of providing a complete updated ENERGY STAR qualified refrigerated beverage vending machine list each year. Therefore, the fifth bullet in the Partner Commitments section has been revised allowing manufacturers to provide “an update of ENERGY STAR qualified refrigerated beverage vending machine models.” This would allow manufacturers to review their list of qualifying machines and provide information only in regards to new or discontinued models.
 - The definition for refrigerated beverage vending machine has been revised to include “other sealed beverages.” It is not EPA’s intention to exclude certain machine models in this specification based on product packaging. This addition is also consistent with the definition of standard product provided in the specification, which according to ASHRAE Standard 32.1 1997R, may be specified by the manufacturer at the time of testing.
 - A request was made to delete the sentence “The following products may qualify under this specification: closed-front, glass-front, and live display machine models” to allow future machine designs to qualify. This sentence has been deleted under Section 2, Qualifying Products.

- The Qualifying Product Information (QPI) form now addresses refrigerated beverage vending machines that are designed to operate at low power levels continuously.
 - It was brought to EPA’s attention that machines exist in the marketplace that do not include lighting systems and/or refrigerate at temperatures higher than the ENERGY STAR low power mode requirement of 40 degrees F. If a machine meets all low power mode requirements under normal operation, it may qualify as ENERGY STAR without a low power mode feature as long as it meets all remaining performance and testing requirements of the specification.
 - The latest version of the QPI form, requires partners to indicate whether or not the machine was shipped with low power mode capabilities by checking either “yes” or “no.” Manufacturers of those machines that normally operate in a low power mode should check “no” and provide an explanation as to why this is case. EPA will follow up with manufacturers of these machines to verify that the specification is being met.

Thank you in advance for taking the time to review this Final Draft of the ENERGY STAR specification for refrigerated beverage vending machines. I look forward to working with you to finalize this specification over the next month.

Please send all comments by **January 16, 2004** to Rebecca (Miller) Duff at rduff@icfconsulting.com. Any questions about the Final Draft specification may also be directed to Ms. Duff via e-mail or phone at (202) 862-1266.

Regards,



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