



ENERGY STAR
for Residential Light Fixtures
Durability Implementation

June 23, 2003

ENERGY STAR Durability Requirements



- ANSI-IEC Lamp Standardization:
 - Proposing to Add to RLF Eligibility Criteria through Specification Amendment.
- Maximum Ballast Operating Case Temperature:
 - Enforcement Through Current Specification (V. 3.1).

Purpose of Durability Requirements



- Compliance with ANSI Standards for Lamps:
 - Compatibility.
 - Accountability.
- Compliance with Maximum Ballast Operating Case Temperature for Optimal Performance:
 - Existing requirement.
 - Key to addressing premature failures.

ENERGY STAR Amendment



- Lamps shall meet ANSI C78.901-2001 and C78.81-2001 as appropriate.
 - Supply applicable ANSI or ANSI-IEC Standard Data Sheet Number.
- When using non-ANSI standardized lamps, supply a manufacturer lamp specification sheet that describes the electrical and dimensional information typically found in ANSI lamp data sheets.

ENERGY STAR Amendment: Process & Timeline



- Draft amendment to be released for public comment around **July 1, 2003.**
- Partners and interested parties will be given a 30-day comment period.
- Amendment and comments will be posted on the ENERGY STAR Specifications in the Product Development Web site.
- Amendment will go into effect on **September 2, 2003.**

ENERGY STAR Amendment: Implementation



- All new submittals received after the Amendment effective date will require the ANSI/ANSI-IEC Standard data sheet number or a manufacturer lamp specification sheet.
- Manufacturers of qualified product will have three months from the effective date to submit required documentation .
 - Products will be de-listed if information is not received within 30 days from deadline.

ENERGY STAR Specification Enforcement



- Laboratory test report will be required for a sub-set of fixtures from high risk fixture categories including: recessed and ceiling flush mount.
- The Laboratory test report shall demonstrate that the temperature of the ballast case, when installed in the fixture, meets the ENERGY STAR Specification for Maximum Ballast Operating Case Temperature for Optimal Performance:
 - **$\leq 90^{\circ}$ C or shall not exceed ballast manufacturer requirements, whichever is lower.**

ENERGY STAR Specification Enforcement: Documentation



Option One:

- Use existing test report completed in accordance with UL 1598 and demonstrate that the ballast case temperature, when installed in the fixture, does not exceed the lower of 90° C or ballast manufacturer requirements for performance.

Option Two:

- If no existing test report is available, use the LRC's "Proposed Durability Testing Method: Temperature" as guidance. The temperature of the ballast case should be taken at the "hot-spot" locations for performance as indicated by the ballast manufacturer.

ENERGY STAR Specification Enforcement: Implementation



- In Early July, manufacturers will receive written request for a laboratory test report proving the fixture meets ENERGY STAR's maximum ballast operating case temperature requirement for performance.
- Manufacturers will be given 60 days from date of written request to provide laboratory test reports.
- Failure to provide laboratory test reports within 15 days of due date, will result in product de-listing.
- New product submittals will be tested according to the LRC's "Proposed Durability Testing Method: Temperature" effective 9/1/03.