CSA R7003:16
(reaffirmed 2021)

Sustainability standard for household clothes washers

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Association of Home Appliance Manufacturers
AHAM 7003-2016
Second Edition

CSA Group
CSA R7003-16
First Edition

Underwriters Laboratories Inc.
UL 7003
Second Edition

Sustainability Standard for Household Clothes Washers

February 11, 2016

ANSI/UL 7003-2016

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This standard is issued jointly by the Association of Home Appliance Manufacturers (AHAM), the Canadian Standards Association (operating as "CSA Group"), and Underwriters Laboratories Inc. (UL). Comments or proposals for revisions on any part of the standard may be submitted to AHAM, CSA Group, or UL at anytime.

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Preface

This is the first edition of CSA R7003, the second edition of UL 7003, and the most recent version of AHAM 7003, Sustainability Standard for Household Clothes Washers.

This harmonized standard was prepared by the Association of Home Appliance Manufacturers, (AHAM), CSA Group and Underwriters Laboratories Inc. (UL). The efforts and support of the Technical Harmonization Committee are gratefully acknowledged.

This standard was prepared by CSA Technical Committee on Sustainability of Household Appliances under the jurisdiction of CSA Strategic Steering Committee on Business Management and Sustainability and has been formally approved by the CSA Technical Committee.

The environmental performance of clothes washing home appliances is commonly evaluated on the single environmental attribute of electricity consumption during use. This Standard takes a multi-attribute, life cycle approach to measuring a broad spectrum of environmental and social impacts of refrigeration home appliances as a means of assessing sustainability performance. The multi-attribute approach was developed using representative product life cycle assessment (LCA) information along with other key factors such as hot-spot or hot-button analyses influencing product environmental performance. The attributes and criteria in this Standard are drawn from a much larger list and reflect the understanding of the attributes and criteria that are most prominent in sustainable performance and over which the manufacturers of these products have control. This approach, detailed in Annex A, determined the environmental attributes of refrigeration appliances for inclusion in this Standard. The authors acknowledge that revisions to this standard will be considered periodically and that future editions may consider a broader range of sustainability criteria.

It has been contemplated by all parties that this Standard will be updated to reflect new U.S. Department of Energy or Natural Resources Canada minimum energy performance standards for refrigeration products. Many of the measurements included in this Standard are unique and have not been conducted on other appliance categories. The Standard's committees expect to learn much from the application of this Second Edition in subsequent years. The use of this Standard and self-assessment by clothes washing products manufacturers and external third-party assessment bodies will be used to improve the Standard in drafting the second and subsequent editions.

This Standard was written specifically for products placed on the market in the United States and Canada. At the present time, a number of the calculations are based on systems and designs of products in North America.

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Foreword

The Association of Home Appliance Manufacturers (AHAM), CSA Group, and Underwriters Laboratories Inc. (UL), as a Task Force, under the jurisdiction of the AHAM Major Appliance Engineering Council, CSA Group Strategic Steering Committee on Business Management and Sustainability, and UL Environment, collaborated with experts and stakeholders to initiate development of product standards for home appliances as the first step in a broader product sustainability initiative. The overall goal of this family of standards is to provide meaningful product sustainability performance information to consumers and stakeholders. It is intended for this initiative to drive innovation and continual improvement in the sustainability performance of home appliances by empowering consumers. This Standard is based on product life cycle information and consideration for consumer expectations. It provides information for consumers, governments, retailers, and other program developers to help distinguish between products based on environmental criteria.

AHAM, CSA Group, and UL would like to acknowledge the assistance of PE INTERNATIONAL and Five Winds Strategic Consulting whose staff served as experts and project managers.

AHAM

The Association of Home Appliance Manufacturers (AHAM) represents manufacturers of major, portable and floor care home appliances, and suppliers to the industry in the U.S. and Canada. AHAM's membership includes over 150 companies throughout the world. AHAM is also a standards development organization, accredited by the American National Standards Institute (ANSI) and authors numerous appliance performance testing standards used by manufacturers, consumer organizations and governmental bodies to rate and compare appliances. AHAM administers several appliance rating verification programs, employing third party laboratories. AHAM's consumer safety education program has educated millions of consumers on ways to properly and safely use appliances such as portable heaters, clothes dryers, and cooking products.

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1 Scope

1.1 This Standard covers clothes washing appliances for household and residential style commercial use (e.g., a coin-operated appliance in an apartment building) included within the scope of the U.S. Department of Energy (DoE) and Canadian federal Energy Efficiency Regulations minimum energy performance requirements. This includes the following product categories:

(a) top loading, compact [less than 45 L (1.6 ft^3) capacity];

(b) top loading, standard;

(c) front loading, standard; and

(d) front loading, compact [less than 45 L (1.6 ft^3) capacity].

Note: *The Task Force intends to expand the scope to include combination all-in-one washer-dryers in future editions. New product categories and information on the environmental performance of the additional categories might be considered in order to determine the scope of future editions. DOE standards and Canadian Federal Efficiency Energy Regulations cover stacked washer dryer units, and therefore they are within the scope of this Standard.*

1.2 This Standard does not cover semi-automatic or suds-saving clothes washers, as the U.S. Department of Energy and Natural Resources Canada (NRCan) are unaware of any models currently on the market.

2 General

2.1 In this Standard, ″shall″ is used to express a requirement, i.e., a provision that the user is obliged to satisfy in order to comply with the Standard; ″should″ is used to express a recommendation or that which is advised but not required; and ″may″ is used to express an option or that which is permissible within the limits of the Standard. Notes accompanying clauses do not include requirements or alternative requirements; the purpose of a note accompanying a clause is to separate from the text explanatory or informative material. Notes to tables and figures are considered part of the table or figure and may be written as requirements. Annexes are designated normative (mandatory) or informative (non-mandatory) to define their application.

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