

DOCKETED

Docket Number:	18-AAER-10
Project Title:	Amendments to Title 20 Appliance Efficiency Regulations Rulemaking
TN #:	223262
Document Title:	Presentation - Public Meeting for the Amendments to Title 20 Appliance Efficiency Regulations Rulemaking
Description:	PowerPoint presentation slides used during the Lead Commissioner Meeting for the Amendments to Title 20 Appliance Efficiency Regulations Rulemaking by Carlos Baez
Filer:	Carlos Baez
Organization:	California Energy Commission
Submitter Role:	Commission Staff
Submission Date:	4/23/2018 1:26:44 PM
Docketed Date:	4/23/2018



California Energy Commission

Public Meeting for the Amendments to Title 20 Appliance Efficiency Regulations Rulemaking

April 24, 2018

Carlos Baez

Appliances and Outreach & Education Office

Efficiency Division

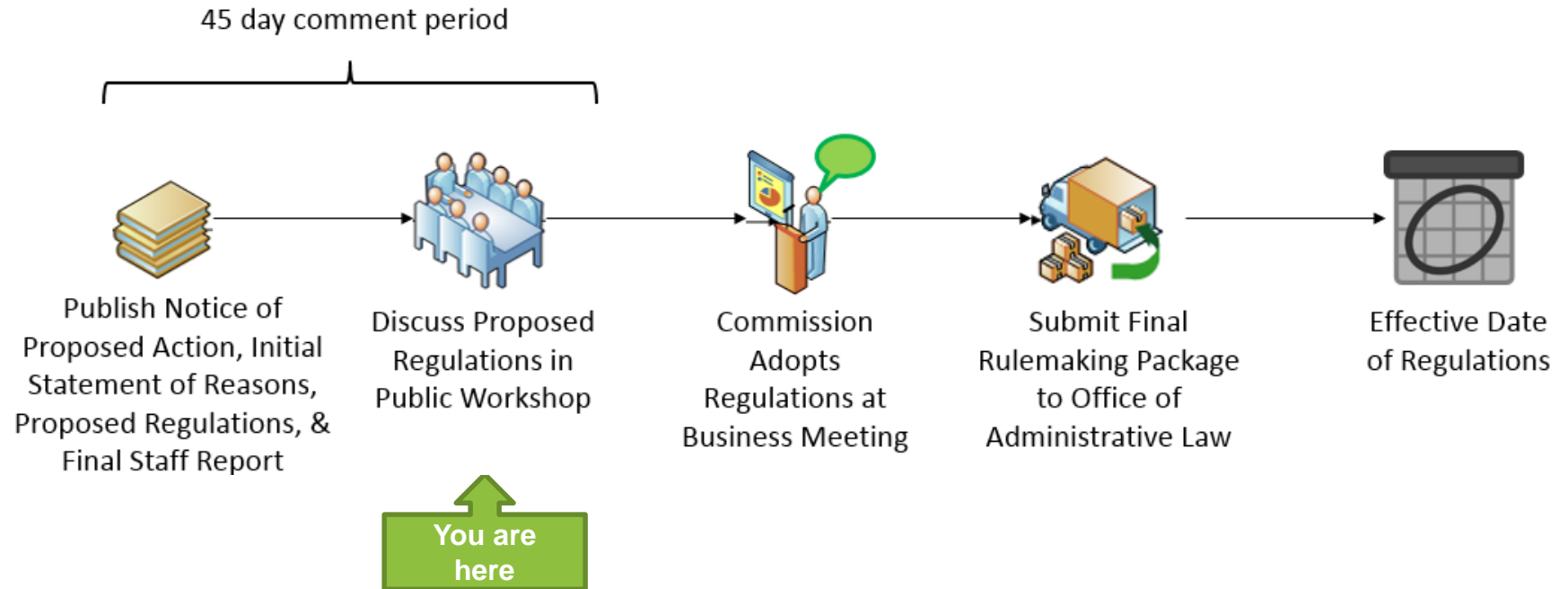




Meeting Agenda

Time	Topic	Presenter
10:00 a.m.	Welcome	Kristen Driskell
10:05 a.m.	Opening Remarks	Commissioner McAllister or Staff
10:15 a.m.	Background	Kristen Driskell
10:20 a.m.	Amendments to the Title 20 Regulations Presentation	Carlos Baez
11:00 a.m.	Open Discussion and Public Comment	
11:30 a.m.	Next Steps	Carlos Baez
11:45 a.m.	Adjourn	

Rulemaking Process





History of Rulemaking

- **January 13, 2016:** The Energy Commission ordered a rulemaking proceeding to make clarifying amendments to Title 20 that do not change underlying efficiency standards.
- **March 30, 2018:** The Energy Commission published the NOPA, ISOR, and Proposed Regulatory Language for this rulemaking regarding the amendments to Title 20 on the Energy Commission's website.
- **March 30, 2018:** The California Regulatory Notice Register published the NOPA for this rulemaking. Comment period began on this date and will end at 5 pm on Monday May 14, 2018.



Rulemaking: Amendments to the Title 20 Appliance Efficiency Regulations



Overview

- Rulemaking covers the entire Title 20 appliance efficiency regulations
 - Sections 1601 through 1609, including Table X (data certification requirements)
- Purpose is to provide clarification, improve readability, and reflect current laws in effect regarding appliance efficiency
- No changes to underlying energy and water efficiency standards or savings



Overview

Five types of changes:

- ▶ Updates to reflect current federal law
- ▶ Updates to state-specific requirements
- ▶ Updates to certification to reflect the Modernized Appliance Efficiency Database System (MAEDbS)
- ▶ Updates to data submittal requirements
- ▶ Fixes to improve overall readability



Updates to Reflect Current Federal Law



Reflect Current Federal Law

- Changes are primarily in sections:
 - 1602 (definitions)
 - 1604 (testing requirements)
 - 1605.1 (standards for federally regulated appliances)
 - 1606 (certification)



Reflect Current Federal Law

- Adding and amending definitions, test procedures, and energy performance standards in accordance with federal law currently in effect
 - Compliance with federal requirements is mandatory regardless if they are, or are not shown in Title 20. These amendments are necessary for clarification purposes



Ex: Amending definition to match DOE (1602(b))

~~“Refrigerator” means a cabinet that is designed for the refrigerated storage of food, including but not limited to solid food and wine, beer, and other beverages, at temperatures above 32°F, and that has a source of refrigeration requiring an energy input. It may include a compartment for the freezing and storage of food at temperatures below 32°F, but it does not provide a separate low temperature compartment designed for the freezing and storage of food at temperatures below 8°F.~~

used with one or more doors, that has a source of refrigeration that requires single-phase, alternating current electric energy input only and is capable of maintaining compartment temperatures above 32°F (0°C) and below 39°F (3.9°C) as determined according to 10 C.F.R. section 429.14(d)(2). A refrigerator may include a compartment capable of maintaining compartment temperatures below 32°F (0°C), but does not provide a separate low temperature compartment capable of maintaining compartment temperatures below 8°F (-13.3°C) as determined according to 10 C.F.R. section 429.14(d)(2). However, the term does not include:

- (1) any product that does not include a compressor and condenser unit as an integral part of the cabinet assembly;
- (2) a cooler; or
- (3) any miscellaneous refrigeration product that must comply with an applicable miscellaneous refrigeration product energy conservation standard.

16

*Matching definition found in 10 C.F.R. §430.2



Reflect Current Federal Law

- Appliances with updated federal standards and/or test procedures:
 - Refrigeration products and freezers
 - Water heaters
 - Wine chillers (“coolers”)
 - Battery chargers
 - Ceiling fans and ceiling fan light kits
 - Pumps
 - Combined cooking products
 - Electric Motors
 - External power supplies
 - Dehumidifiers
 - Residential furnace fans
 - Boilers and furnaces
 - Pool heaters
 - Commercial clothes washers
 - Clothes dryers
 - Compressors
 - Lighting products
 - Air conditioning products
 - Commercial pre-rinse spray valves

Reflect Current Federal Law

Federally Regulated Battery Chargers





Reflect Current Federal Law

- Federally regulated battery chargers
 - New federal standards go into effect on June 13, 2018 for federally regulated battery chargers
 - Majority of consumer state-regulated battery charger systems will fall under the scope of federally regulated, and will be required to comply with these new federal standards
 - Products not included in the federal scope will remain regulated as state-regulated battery charger systems, such as non-consumer products, dry induction battery charger systems, etc.



Reflect Current Federal Law

- Federally regulated battery charger changes
 - Updating battery charger standards to reflect new federal standards for federally regulated battery chargers
 - Aligning test procedures for state-regulated small battery chargers (except “battery backups”) with federal test procedures to reduce testing burden
 - Aligning data collected for federally regulated battery chargers with DOE’s CCMS requirements
 - See guidance letter published on February 1, 2018 regarding certification of these products:
<http://energy.ca.gov/appliances/documents/2018-2-01-guidance-battery-chargers-certify.pdf>



Updates to State-Specific Requirements



State-Specific Changes

- Changes are primarily in sections:
 - 1604 (testing requirements)
 - 1605.3 (state standards for non-federally regulated appliances)
 - 1606 (certification)



State-Specific Changes

- When preempted by federal law:
 - Removing state standards and state test procedures for appliances that are now federally regulated
- Where appropriate, aligning state test procedures with federal test procedures
 - Ex: lamps and state-regulated battery charger systems
- Not introducing any new energy performance standards

Ex: Removing state test procedures due to preemption (1604(f))

(1) **Small Water Heaters:** The test methods for small water heaters are shown in Table F-1.

Residential Water Heaters: The test method for residential water heaters is 10 C.F.R. section 430.23(e) (Appendix E to subpart B of part 430).

**Table F-1
Small Water Heater Test Methods**

<i>Appliance</i>	<i>Test Method</i>
Small water heaters that are federally-regulated consumer products	10 C.F.R. part 430, Subpart B, Appendix E, section 5: "Test Procedures" and part 430.23(e)(4): "The alternative uniform test method for measuring the energy consumption of untested water heaters shall be that set forth in section 7.0 of Appendix E of this subpart."
Small water heaters that are not federally-regulated consumer products	
— Gas and oil storage-type < 20 gallons rated capacity	ANSI/ASHRAE 118.2-1993
— Booster water heaters	ANSI/ASTM F2022-00 (for all matters other than volume) ANSI Z21.10.3-1998 (for volume)
— Hot water dispensers	Test Method in 1604(f)(4)
— Mini-tank electric water heaters	Test Method in 1604(f)(5)
— All others	10 C.F.R. section 430.23(e) (Appendix E to Subpart B of part 430)

State-Specific Changes

- Marking Requirement for Distribution Transformers
 - These products will no longer be required to comply with the labeling requirements of NEMA Standard TP3-2000.
 - Instead, must be labeled with “DOE Compliant”



Source:
http://energyeducation.ca/encyclopedia/Distribution_transformer

State-Specific Changes

- Portable Luminaire Sales Data
 - Removing requirement in section 1606(j) which specifies that manufacturers must submit annual sales data to Energy Commission



Source: amazon.com



Updates to Certification to Reflect MAEDbS



Changes to Reflect MAEDbS

- Changes are primarily in sections:
 - 1606 (certification) including Table X
 - 1608 (compliance, enforcement, and general administrative matters)



Changes to Reflect MAEDbS

- The Modernized Appliance Efficiency Database System (MAEDbS) is the current version of the database used to certify and list models of regulated appliances
- Certification of appliance models is required for regulated appliances to be sold or offered for sale in California
- The current version of the regulations reference a generic “database”



Changes to Reflect MAEDbS

- Updating terminology and procedures discussed in the regulations to be consistent with MAEDbS
 - Changing the word “database” to “MAEDbS” throughout
 - Calling the “Active” database the “Approved” database
 - Similarly, changing “Historical” to “Archived”
 - Specifying that the manufacturer’s designated contact person will be notified via email when submittals are approved or rejected
 - Contact information is submitted during the account creation process
 - Clarifying that all data submissions are to be submitted electronically through MAEDbS



Changes to Reflect MAEDbS

- Communication
 - Notifications regarding archiving appliance models will be conducted via email instead of registered or certified physical mail
 - No separate notification provided to manufacturer if a model is archived because it does not meet current standards



Updates to Data Submittal Requirements



Data Submittal Changes

- Table X – Data Submittal Requirements

	<i>Appliance</i>	<i>Required Information</i>	<i>Permissible Answers</i>
	All Appliances	* Manufacturer's Name	
		* Brand Name	
		* Model Number	
		Date model to be displayed	
		Regulatory Status	Federally-regulated consumer product, federally-regulated commercial and industrial equipment, non-federally-regulated
A	Non-Commercial Refrigerators, Non-Commercial Refrigerator-Freezers, Non-Commercial Freezers	* Style <u>Product Class</u>	Category in <u>Table A-2</u> or <u>Table A-3</u> (specify)
		* Defrost System	Automatic, manual, partial automatic
		* Type	Refrigerator, refrigerator-freezer, freezer
		Access ^{1,2}	Door, drawer, both door and drawer
		Compact, built-in, neither compact nor built-in	Compact, built-in, neither compact nor built-in
		Kitchen Unit ^{1,2}	Yes, no True, False



Data Submittal Changes

- “Table X” specifies the parameters required to be submitted for certification to MAEDbS
 - Title 20 specifies that all regulated appliances (federal or state) are required to be certified to MAEDbS in order to be sold or offered for sale in California
- Updating the required fields in Table X based on changes/updates to test methods and energy performance standards
- Removing redundant and unnecessary fields
- Editing names of fields in Table X to be consistent with MAEDbS



Data Submittal Changes

- Adding new federally regulated appliance types and their associated fields
 - Pumps
 - Battery chargers
 - Walk-in coolers and freezers
 - Low-profile ceiling fans



Data Submittal Changes

- New federally regulated appliance types:
 - **Pumps** - Federal standards go into effect on January 27, 2020. Certification will be required beginning on this date.
 - **Battery chargers** – Federal standards go into effect on June 13, 2018. Adding new “federally regulated battery charger” appliance type and data parameters to align with DOE’s CCMS database. Separate from state-regulated “battery charger systems”.



Data Submittal Changes

- ...continued
 - **Walk-in coolers and freezers** - Federal standards are currently in effect. Adding data parameters to align with DOE's CCMS database.
 - **Low-profile ceiling fans** (Hugger fans) – The current federal test procedure is now applicable to this subset of ceiling fans. These are no longer exempt and are now required to be certified under the “ceiling fan” appliance type, pending approval of this rulemaking

Ex: Updating required fields (Table X – Ceiling Fans)

Ceiling Fans, Except Low-Profile Ceiling Fans	<u>Ceiling fan type (required for models manufactured on or after January 21, 2020 only)</u>	High-speed small-diameter (HSSD), hugger, large diameter, standard, very small-diameter (VSD)
	CFM (low, medium, high)	
	Watts (low, medium, high)	
	Efficacy (low, medium, high) [CFM/watt] <u>(required for models manufactured before January 21, 2020 only)</u>	
	<u>Efficiency (CFM/Watt) (required for models manufactured on or after January 21, 2020 only)</u>	
	Fan speed controls separate from light controls	True, false
	Adjustable Speed Controls	(Specify) speed, variable
	Reversible Fan Action Capable	Yes, no True, False, Exception [See Section 1605.1(d)(1)(C) section 1605.1(d)(1)(A)3. of this Article]
	Light Source Type	Compact fluorescent, incandescent, other (specify), None



Fixes to Improve Overall Readability



Improve Readability

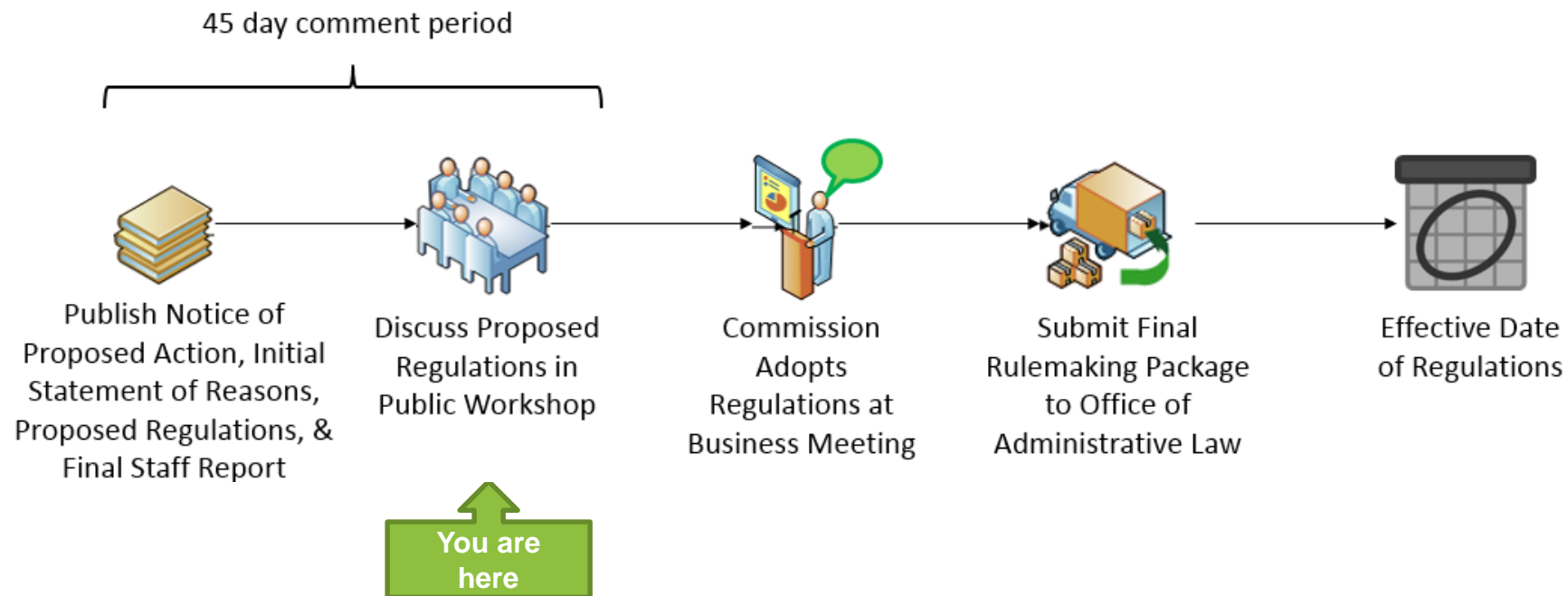
- These changes are throughout the entire regulations and comprise the majority of the amendments in this rulemaking:
 - Grammatical, typographical, and formatting edits in accordance with the California Style Manual and Bluebook
 - Edits to maintain style consistency within the regulations
 - Subsection headings, lists, etc.
 - Updating cross-references
 - Removal of outdated language

Ex: Removing outdated language (1605.1(o))

Table O
 Standards for Dishwashers

Appliance	Effective January 1, 2010		Effective May 30, 2013	
	Maximum Energy Use (kWh/year)	Maximum Water Use (gallons/cycle)	Maximum Energy Use (kWh/year)	Maximum Water Use (gallons/cycle)
Compact dishwashers	260	4.5	222	3.5
Standard dishwashers	355	6.5	307	5.0

Next Steps





Comments

- **Comments due by 5:00 p.m. on Monday May 14, 2018**
- To submit electronically:
 - Go to <http://www.energy.ca.gov/appliances/2018-AAER-10/>
 - Click on “Submit eComment”
- To send a hard copy:

California Energy Commission
Dockets Unit
Docket No. 18-AAER-10
1516 Ninth Street, MS-4
Sacramento, CA 95814-5512
- To send a digital copy: email docket@energy.ca.gov, include docket number 18-AAER-10, and indicate Amendments to Title 20 Rulemaking in the subject line



Contact Information

- For questions contact:

Carlos Baez

Appliances and Outreach & Education Office

Efficiency Division

Carlos.Baez@energy.ca.gov

(916) 654-4719