

Prohibition of Hydrofluorocarbons (HFCs) in Specific End-Uses

Stakeholder Workshop December 11, 2020



### Introduction



- Hydrofluorocarbons (HFCs) are man-made fluorinated powerful greenhouse gases (GHG) that are used as replacements for ozone-depleting substances (ODS) in air conditioning, refrigeration, foam-blowing, fire retardants, solvents and aerosols.
- Rhode Island must stay on track to reducing GHG emissions to avoid harmful impacts of climate change.
- This proposed regulation will support the 2014 RI Resilient Rhode Island Act GHG emissions reduction targets.



### Rhode Island's HFC Initiative



- Absence of national policies & federal action
  - On September 11, 2018 Rhode Island joined with other U.S. Climate Alliance states in committing to phase out the use of HFCs.
- Rhode Island's February 18, 2020 Press Release
  - "We must use every tool at our disposal to take urgent action on climate change," said Governor Raimondo. "In the absence of federal leadership, I'm proud to stand with governors on both sides of the aisle who recognize the dangers of HFCs. It's time to regulate these harmful pollutants."



# Purpose of Today's Meeting



- Overview of Rhode Island's draft regulation prohibiting HFCs in specific end-uses
- Receive feedback on specific questions concerning the proposed language
  - Hope to get comment (your feedback) during today's meeting
  - We will also be taking written comment through December 22, 2020
  - Draft regulation can be found on the RIDEM website at http://www.dem.ri.gov/programs/air/climate-change-hfc.php



### Where Did Rhode Island's Regulatory Language Come From?





CA, DE, MD, NY, and VT regulatory and legislative language

EPA SNAP Rules 20 & 21

### RIDEM HFC Rule

RI regulation including definitions, applicability, exemptions, prohibited substances, end-use categories, requirements and recordkeeping substantively similar to other USCA states.



# Major Sectors Affected





#### Air Conditioning

- Centrifugal chillers (new)
- Positive displacement chillers (new)



#### Refrigeration\*

- Cold storage warehouses (new)
- Household refrigerators and freezers (new)



#### Foams\*

- Flexible Polyurethane
- Integral skin Polyurethane



**Aerosol Propellants** 



<sup>\*</sup> Refer to RIDEM HFC Rule for complete list of end-uses.

# Applicability and Exemptions



- "No person may sell, offer for sale, lease, rent, install, use, manufacture, or otherwise cause to be entered into commerce, within the State of RI, any product or equipment using a listed substance for use in any air conditioning, refrigeration, foam, or aerosol propellant end-use listed as prohibited in 52.6 of this Part, unless an exemption is provided for the end-use in 52.5 of this Part."
- Exemptions include military, medical, and space/aeronautics-related applications are found in **Table 1**. Refer to Part 52.5 for specific prohibited substances and acceptable uses.



## Prohibited Substances & End – Use Categories



### Part 52.6 -

- Table 2 Aerosol Propellants: all w/effective date of June 1, 2021
- Table 3 Air Conditioning: all w/effective date of January 1, 2024
- **Table 4** Refrigeration: varied effective dates including *June 1, 2021* through January 1, 2023
- Table 5 Foams: all w/effective date of *June 1, 2021*



## Requirements



#### • Part 52.7 -

- As of the effective date of this regulation, any person who sells, offers for sale, leases, rents, installs, uses or manufactures or otherwise causes to be entered into commerce within RI, products or equipment in the air-conditioning, refrigeration, foam, or aerosol propellant end-uses listed as prohibited in 52.6 of this Part, must provide a written disclosure to the buyer as part of the sales transaction and invoice.
- Specific disclosure language for refrigeration & air conditioning equipment, foam and aerosol propellants is provided in 52.7 (B)(1).
- In lieu of disclosure statement, a label on the product or equipment can be used and must read "Not for sale or use in RI". Refer to 52.7 (B)(2) for additional label requirements (size & location).
- The disclosure statement or label must remain with the product or equipment while it is in use in RI.



# Recordkeeping



### • Part 52.8 -

- As of the effective date of this regulation, any person who manufactures for sale or entry into commerce any product or equipment in the end uses listed in 52.6 of this Part, must maintain for **five (5)** years and make available within 90 days upon request by the Department, records including:
  - O Name, address, telephone number, email address of buyer
  - o Model & serial number of equipment or product
  - o Date of manufacture
  - Date of sale
  - o The refrigerant, aerosol propellants, or foam used
  - Copy of disclosure statement or label

# Next Steps





## Feedback



- RIDEM is seeking comments on the entire draft regulation, and is seeking specific comments on:
  - Definitions
  - Effective dates on prohibitions, specifically June 1, 2021
  - Disclosure provisions (statement or label)
  - Recordkeeping requirements
  - Open Feedback

# How to Participate





- Open the chat box by clicking on the icon at the bottom of your screen.
- Type your question or comment into chat.
- Type that you would like to speak in the chat.
- We will either read your comment or call on you to speak.



- Click the participants icon at the bottom of your screen then click the **raise hand** icon at the bottom of the pop-up window to provide feedback.
- We will call on you to speak.



• **Unmute** yourself using the icon at the bottom right of the screen to speak.



- Phone: Unmute yourself from your phone options and speak your question or comment.
- Phone: press \*6 to unmute yourself.
- Phone: press \*9
   to raise hand and
   we will call on you
   to speak.



- Thank you in advance for your comments and suggestions.
- Please refrain from interrupting of speaking over others - this will ensure we hear and understand all speakers.

## Feedback- Definitions



#### Definitions

- "HFC"
- (current draft) "Retrofit" means the replacement of the refrigerant used in refrigeration equipment with a different refrigerant and any related changes to the refrigeration equipment required to maintain its operation and reliability following refrigerant replacement.
  - Potential to realign with 40 CFR § 82.152
- (OAR General Definitions Regulation 250-RICR-120-05-0) "Person" means an individual, trust, firm, joint stock company, corporation (including a quasi-governmental corporation), partnership, limited liability company (LLC), association, syndicate, municipality, municipal or state agency, fire district, club, non-profit agency or any subdivision, commission, department, bureau, or agency of state or federal government (including a quasi-governmental corporation) or of any interstate body.
- (current draft) "Rigid polyurethane high-pressure two-component spray foam" means a foam product that is pressurized eight hundred (800) to sixteen hundred (1600) pounds per square inch (psi) during manufacture; sold in pressurized containers as two (2) parts (i.e., A-side and B-side); and is blown and applied in situ using high-pressure pumps to propel the foam components, and may use liquid blowing agents without an additional propellant.
  - comment that high pressure SPF products are not pressurized during manufacture and are not sold in pressurized containers. We look forward to receiving and reviewing feedback on the definition.
- (current draft) "Residential Use" means use by a private individual of a substance, or a product containing the substance, in or around a permanent or temporary household, including use in both single and multi-unit dwellings, during recreation, or for any personal use or enjoyment. Residential use does not include use within a household for commercial or medical purposes or use in automobiles, watercraft, or aircraft, regardless of location of use.
  - We are not expecting residents to cease use of the product or equipment acquired before the prohibited date.
  - Examples of residential products: household refrigerators and freezers, including mini-fridges and (open-top) freezers.
  - Intent is not to exclude manufacturing for the purpose of residential use.

### Feedback- Effective Dates



### Part 52.6 -

- Table 2 Aerosol Propellants: all w/effective date of June 1, 2021
- Table 3 Air Conditioning: all w/effective date of January 1, 2024
- Table 4 Refrigeration: varied effective dates including June 1, 2021 through January 1, 2023
- Table 5 Foams: all w/effective date of June 1, 2021

### Feedback- Disclosure Provisions



#### • Part 52.7 -

- As of the effective date of this regulation, any person who sells, offers for sale, leases, rents, installs, uses or manufactures or otherwise causes to be entered into commerce within RI, products or equipment in the air-conditioning, refrigeration, foam, or aerosol propellant end-uses listed as prohibited in 52.6 of this Part, must provide a written disclosure to the buyer as part of the sales transaction and invoice.
- Specific disclosure language for refrigeration & air conditioning equipment, foam and aerosol propellants is provided in 52.7 (B)(1).
- In lieu of disclosure statement, a label on the product or equipment can be used and must read "Not for sale or use in RI". Refer to 52.7 (B)(2) for additional label requirements (size & location).
- The disclosure statement or label must remain with the product or equipment while it is in use in RI.

# Feedback- Recordkeeping Requirements



#### Part 52.8 -

- As of the effective date of this regulation, any person who manufactures for sale or entry into commerce any product or equipment in the end uses listed in 52.6 of this Part, must maintain for **five (5)** years and make available within 90 days upon request by the Department, records including:
  - O Name, address, telephone number, email address of buyer
  - Model & serial number of equipment or product
  - Date of manufacture
  - o Date of sale
  - o The refrigerant, aerosol propellants, or foam used
  - Copy of disclosure statement or label

# Feedback- Open Forum



### Thank You!

Please submit all comments in writing to Allison by December 22, 2020

Note: The draft regulation and additional supporting information can be found on our website: <a href="www.dem.ri.gov/programs/air/climate-change-hfc.php">www.dem.ri.gov/programs/air/climate-change-hfc.php</a>

### **Allison Archambault**

RI Department of Environmental Management

Office of Air Resources

Supervising Air Quality Specialist - Climate Change & Mobile Sources Programs

401-222-2808, x 2035

Allison.Archambault@dem.ri.gov

