

GLASS MINIMUM POST-CONSUMER RECYCLED CONTENT MODEL LEGISLATION

Revised 2/16/23

This Model Legislation is one tool for building post-consumer glass markets. It is intended to be used with other legislative and non-legislative tools as part of a comprehensive strategy.

A BILL

To incentivize the market for post-consumer container glass, improve the economics of recovering rather than disposing of valuable material, and reduce the environmental impact of manufacturing.

WHEREAS, post-consumer container glass is a sustainable material that can be recycled over and over again; and,

WHEREAS, due to market issues, the amount of post-consumer container glass collected in recycling programs and then discarded as waste has steadily increased; and

WHEREAS, post-consumer container glass that has been processed to remove contaminants and is furnace ready, also known as cullet, is integral for the primary end use production of new glass food and beverage containers and in fiberglass insulation.

WHEREAS, post-consumer container glass is also used in other end use productions such as pozzolan, foamed glass aggregate, and other saleable products.

WHEREAS, the use of post-consumer container glass in manufacturing provides no compromise in safety or quality; and

WHEREAS, the use of cullet and post-consumer container glass in these products saves energy during their production versus the use of virgin material or in the transportation of finished products, thereby reducing greenhouse gas emissions; and

WHEREAS, one way states can foster these benefits is to incentivize the use of cullet and post-consumer container glass in primary and other end uses.

WHEREAS, there is a need for greater transparency on the final destinations of post-consumer container glass collected for recycling and disposed of as trash.

WHEREAS, this model legislation can be used independently or in conjunction with other programs, such as a beverage container redemption program, extended producer responsibility for packaging, a landfill ban on post-consumer glass containers, a recycling mandate for post-consumer glass containers, or other legislative actions.

WHEREAS, the state will foster the growth of clean post-consumer glass to the marketplace through targeted grants for the collection and processing of post-consumer glass.

THEREBY BE IT RESOLVED BY [THIS BODY] THAT requiring manufacturers to use greater amounts of cullet or post-consumer container glass is in the direct interest of the people of this state and their quality of life.

SECTION I. INTENTIONS

- Develop primary end uses for cullet, while not hindering other end uses for post-consumer container glass that have a demonstrated climate benefit equal to or greater than that of processing cullet in a furnace.
- Expand use of cullet in manufacturing new food and beverage containers and fiberglass insulation, and expand use of post-consumer container glass in manufacturing ground glass pozzolan and foamed glass aggregate.
- Reduce the use of post-consumer container glass in low-value applications (e.g., alternative daily cover) and eliminate its disposal as trash.

SECTION II. DEFINITIONS

Beverage - means any liquid product in ready-to-drink form that is intended for human consumption.

Brand Owner or Licensee – means the owner or licensee of the brand under which the covered product is sold, offered for sale, or distributed, regardless of whether the trademark of the brand is registered.

Container glass - means a container made of glass that is filled or intended to be filled with a food or beverage.

Covered product - means a product in one of the following categories subject to minimum post-consumer recycled content requirements: (1) glass food container; (2) glass beverage container; and (3) fiberglass building insulation.¹

Cullet – means post-consumer recycled broken or waste container glass used in manufacturing glass products and is suitable for being processed in a furnace (i.e., furnace ready).

Distributor - means a person that engages in the sale of a covered product as a retailer, to a retailer, or is a manufacturer selling a covered product in the state.

Fiberglass building insulation - means a fiberglass batt, blanket, loose fill or spray-in-place material primarily designed and used to resist heat flow, that is installed in roofs, ceilings, walls, and floors of buildings (source: fiberglass industry in work group)

Foamed glass aggregate – means lightweight aggregate made from post-consumer container glass.

Food - means any substance that humans eat or drink to sustain life and growth.

Furnace ready – means material that has been processed to meet industry standards used by manufacturers.

¹ If a state is aware of other products sold in the state that could utilize cullet, they may add such products as additional covered products.

Ground glass pozzolan – means a cement replacement material made from post-consumer container glass and other post-consumer glass.

Importer – means a person or company that brings in a covered product from abroad for sale or distribution.

Manufacturer – means any person, firm, association, partnership, or corporation producing a product.

Materials recovery facility (or MRF) - means a recycling facility at which primarily residential mixed recyclables, diverted from disposal by the generator and which are collected separately from municipal solid waste, are mechanically and/or manually sorted into commodities for further processing into specification-grade commodities and/or sales to end users. For the purposes of this rule, “materials recovery facility” does not mean a solid waste management facility which may process municipal solid waste to remove recyclable materials.

Minimum recycled content requirement – means a minimum percentage of cullet required to be in a new covered product, set as a percentage on a weight basis (e.g., 35% PCRC by weight).

Non-commercial personal use – means use of a product within one’s own household and not for commercial resale or for packaging of a product. Examples include home canning and preserving or the storage of food or other property in one’s home or business.

Other End Uses – In addition to container glass and fiberglass products, any other products in which post-consumer container glass is used, and the product has a demonstrated climate benefit equal to or greater than that of recycling glass in a furnace.

Post-consumer – pertains to materials that have been discarded by end users rather than generated during a manufacturing process.

Post-consumer recycled content (or PCRC) - means the amount of post-consumer container glass used in cullet for manufacturing new products. "Post-consumer recycled content" does not include post-industrial recycled material or pre-consumer recycled material.

Post-industrial recycled material – means a new material produced using manufacturing waste material that has been reclaimed from a process generating the same or a similar product. For example: When glass is blown into bottles, scrap (often referred to as “pinch-off”) is left behind that doesn’t make it into the final bottles. If these scraps are saved, remelted and used again, it would be referred to as “post-industrial recycled material.

Pre-consumer recycled material – any glass container made or filled but not sold.

Primary End Uses – Food and beverage container glass and fiberglass products.

Previously owned items – means items which may have been covered products at their initial point of sale, but which are being sold or transferred as “used” in a private transaction. Examples include consignment, “yard sales,” asset liquidations, donations, bequeathments, or gifts.

Processor – means a facility that processes post-consumer container glass for primary or other end uses.

Ready-to-drink beverage – means a single-use beverage that is packaged ready for immediate consumption.

Refillable container – means a container that is intended to be returned to and refilled by the packer or manufacturer with the same or similar product.

Responsible party – means a person who manufactures a covered product in a state or first sells or distributes a covered product into a state. A responsible party is defined as a manufacturer, a brand owner or licensee, a distributor or an importer of a covered product. A responsible party is the person that must meet the minimum PCRC requirements of this rule. “Responsible party” does not include a person that sells, offers for sale, or distributes into the state less than one ton of covered product.

Third-party Program - means a corporation, nonprofit organization, or other legal entity created by a responsible party or group of responsible parties to implement, oversee, and ensure compliance with a statewide minimum recycled content requirement program.

SECTION III. SCHEDULE

A. Minimum recycled content requirement. Note: The goal of this section is to set interval goals for the minimum amount of cullet in covered products. In the final legislation, states with entities producing covered products should require responsible parties to use recycled content in the covered products they manufacture, and/or states with no manufacturing activity should require covered products sold, offered for sale, or distributed into the state to contain recycled content. In addition, exact dates may take the place of year intervals.

1. Beginning three years after the effective date of this act, each responsible party shall ensure that the aggregate amount of cullet in a covered product category manufactured and/or sold, offered for sale, or distributed into the state, measured by weight within a calendar year, shall contain on average at least 35% PCRC.
2. Beginning five years after the effective date of this act, each responsible party shall ensure that the aggregate amount of cullet in a covered product category manufactured and/or sold, offered for sale, or distributed into the state, measured by weight within a calendar year, shall contain on average at least 40% PCRC.
3. Beginning ten years after the effective date of this act, each responsible party shall ensure that the aggregate amount of cullet in a covered product category manufactured and/or sold, offered for sale, or distributed into the state, measured by weight within a calendar year, shall contain on average at least 50% PCRC.

Adjustments may be made to each interval goal based on the amount of post-consumer container glass used for other end uses, as deemed appropriate by the enacting body. This credit concept is described in greater detail in Section V. B. and the Addendum.

B. Reporting schedule.

Beginning two years after the effective date of this act, and annually thereafter, each responsible party shall report to the state agency, on a form provided by the state agency.

SECTION IV. EXEMPTIONS

A. The following container glass are exempt from the provisions of this Act:

1. Container glass used for packaging or distributing drugs, as such term is defined in the Federal Food, Drug, and Cosmetic Legislation, 21 U.S.C. s.301 et seq. (A food, dietary supplement, or dietary ingredient is not a drug and is not exempt from the provision.)
2. Container glass used for packaging toxic or hazardous products regulated under the “Federal Insecticide, Fungicide, and Rodenticide Legislation,” 7 U.S.C. s.136 et seq.
3. Glass packaging manufactured for use in the shipment of hazardous materials and is: (a) prohibited from being manufactured with used material by federal packaging material specifications set forth in 49 C.F.R. s.178.509 and 49 C.F.R. s.178.522, (b) is subject to the testing standards set forth in 49 C.F.R. s.178.600 through 49 C.F.R. s.178.609, (c) is subject to the recommendations of the United Nations on the transport of dangerous goods, (d) empty container glass designed for the purpose of non-commercial personal use, or previously owned items transferred as “used” to another person.
4. Small businesses as defined by the glass container and fiberglass industries.

SECTION V. COMPLIANCE

The goal of the compliance section is to ensure responsible parties and other end use manufacturers report data to the state or third-party program manager. Based on the data collected, industry, states, and other stakeholders can make informed decisions on how to ensure greater amounts of cullet and post-consumer container glass makes its way into manufacturing and in products, in the future.

In addition, the data collected will help prioritize the necessary investments critical to creating the infrastructure to improve the material flow in the most cost-effective way possible. It will also show local, state and federal government agencies where the needs are and if there is a role for them to assist in some capacity.

A. Reporting Requirements

1. For Responsible Party:

- a. Beginning two years after the effective date of this act, the responsible party shall report the following to a third-party program manager or state agency on an annual basis:
 - i. The total amount by weight of all cullet used in covered products manufactured and/or sold, offered for sale, or distributed into the state and/or in the United States by the responsible party within a calendar year; and
 - ii. The total amount by percentage of cullet used in covered products manufactured and/or sold, offered for sale, or distributed into the state and/or in the United States by the responsible party within a calendar year; and
 - iii. Average cullet as a percentage of all covered products manufactured and/or sold, offered for sale, or distributed into the state and/or in the United States, measured by weight within a calendar year; and

iv. A list of the responsible party's container glass suppliers for covered products sold, offered for sale, or distributed into the state, and an independently verified acknowledgement of compliance for each container glass supplier being above the PCRC cullet standards, measured by weight within a calendar year, or an independently verified acknowledgement of compliance for a responsible party producing covered products within the state being above the PCRC cullet standards, measured by weight within a calendar year.

The responsible party supplier lists will be kept confidential by the third-party program manager or state agency.

2. For Other End Use Manufacturers:

- a. Beginning one year after the effective date of this act, the other end use party shall report the following to a third-party program manager or state agency on an annual basis:
 - i. The total amount by weight of all post-consumer container glass received at the facility and the total amount by weight of post-consumer container glass used in new products produced at the facility.

3. For the Third-Party Program Manager or State Agency:

- a. Beginning two years after the effective date of this act, the third-party program manager or state agency overseeing data reporting shall provide a public platform for providing data to consumers and other stakeholders on the average PCRC used in covered products of responsible parties and in preferred other end uses.
- b. The state shall convene a special commission to investigate, analyze and study the management of post-consumer container glass in the state and identify any barriers and hindrances to developing infrastructure needed to obtain a higher percentage of cullet and post-consumer container glass for manufacturers. The special commission may consist of a diverse group which may include: the state's recycling department, the state's economic development agency, the glass manufacturing industry, the glass recycling industry, and the food glass industry. The commission's study shall be submitted to the state organization and/or third-party program manager. The study shall include, but not be limited to, any economic, technical, statutory or regulatory barriers or other hindrances that may prohibit glass infrastructure opportunities in the state. The Commission shall also consider information provided by existing glass studies. The commission may include proposed legislative and non-legislative actions needed in its findings and recommendations.

4. PCRC Credit for Responsible Parties

Note: The PCRC credit is intended as a concept in which states can use in determining the PCRC requirements for responsible parties. The specific details about how the credit would work would be up to the state to finalize. It is suggested that people from across the supply chain work together in developing a credit model and offering that to the state for incorporation in the legislation.

1. Responsible parties may receive a credit to offset the amount of cullet required in a covered product category manufactured and/or sold, offered for sale, or distributed into the state, measured by weight within a calendar year. The credit, to be determined by the state, will be dependent upon the amount of post-consumer container glass used for other end uses. (See Addendum for sample calculation of PCRC credit.)

SECTION VI. ENFORCEMENT

The goal of the enforcement section is to provide recommended methods and incentives for responsible parties to meet or exceed requirements outlined in the compliance section above.

A. Hardship provisions.

1. Extension. If one or more of the conditions in the following subsections are met, a responsible party may request an extension to the requirements of Section III. for a period of up to two years for a particular covered product. The extension may be granted if:

- a. The responsible party can demonstrate an unavoidable hardship in complying with these provisions; such hardships can be economic, market-based, or related to properties of the contents. Simple expenses or other logistics generally associated with operating a business do not qualify. The application must include information about how the responsible party will overcome these hardships within the period of the exemption; or,
- b. The responsible party cannot produce a refillable product to specifications and comply with the PCRC requirement.

An extension shall be evaluated and granted by the agency implementing this Act, with the condition that a container containing or intended to contain a ready-to-drink beverage shall be eligible for the extension provided in this subsection.

2. Temporary Deferment. If for a period of six consecutive months, a responsible party is unable to meet the requirements of the provision due to an inability to source sufficient amounts of cullet, the responsible party may apply for a temporary deferment of the requirements for that reporting period. The responsible party must demonstrate the hardship(s) and their efforts to comply with the requirements, and also describe a plan for corrective action, as provided for in Section VI. If the responsible party demonstrates sufficient cullet is not available, no corrective action shall be necessary. Such deferment shall be determined by the agency implementing this Act.

B. Non-Compliance. In the event the responsible party is not compliant with the PCRC or reporting standards outlined in the compliance and schedule sections, the third-party program manager or state agency shall provide the responsible parties a notice of non-compliance within three months of receiving or expecting to receive the annual PCRC report from the responsible party.

C. Considerations. The state may consider the following factors for this section:

Consideration 1: Direct financial penalties for non-compliance are added to the enforcement section, the penalties shall be considered for responsible parties.

Consideration 2: If other primary end uses for cullet exist in a state, they should be subject to similar reporting and compliance requirements, especially if the cullet is not being applied to a beneficial use.

Section VII. MRF OBLIGATIONS

A. MRF Reporting. Beginning two years after the effective date of this act, MRFs accepting post-consumer container glass, shall report annually to the third-party program manager or state agency:

1. The quantity of post-consumer container glass sent to processors or directly to manufacturers for recycling, measured by weight within a calendar year; and
2. The quantity of post-consumer container glass sent to landfill for disposal or for other uses not considered to be recycling (i.e., alternative daily cover), measured by weight within a calendar year; and
3. To account for non-glass residue, trash and other solid waste commingled with the post-consumer container glass, the MRFs may also apply a correction factor to account for non-glass residue, trash and other solid waste in the tonnage report or a mass balance calculation to reflect a more accurate estimate of post-consumer container glass sent to landfills for disposal/alternative daily cover or to processors for recycling. The MRF would have to justify any correction factor used to the third-party program manager or state agency.

All data submitted by MRFs to the third-party program manager or state agency will be shared publicly, in aggregate form only.

B. MRF Non-Compliance. In the event that MRFs are not compliant with the reporting standards outlined in this section, the third-party program manager or state agency shall issue a notice of non-compliance to the MRF.

C. Corrective Action. Within 30 days of receiving a notice of non-compliance with regard to this section, a MRF shall demonstrate compliance or propose corrective actions to come into compliance to the third-party program manager or state agency. Financial penalties for non-compliance with this section may be considered by the state.

SECTION VIII. STATE REVIEW

A. Program Performance Review

Within three years of enactment of this law, the third-party program manager or state agency shall report back to their state's legislative body:

1. The companies and types of products participating in the program.
2. The increase in cullet and post-consumer container glass used in products manufactured and/or sold or distributed in the state.

3. The third-party program manager or state agency shall identify the companies that are making investments in infrastructure and/or programs that increase the usage of cullet and post-consumer container glass in products and highlight them within the report.
4. Within three years of the passage of this bill, the third-party program manager or state agency overseeing the program shall report back to their state's legislative body additional industries that use reusable/durable products that should be included in the program. These products shall be included in the data being collected and their information shall be made public to highlight products being used that have demonstrated a climate benefit equal to or greater than that of recycling glass in a furnace.
5. The third-party program manager or state agency overseeing the program shall track and report back to their legislative body any changes that could impact a manufacturer's or industry's ability to source cullet and post-consumer container glass. If another industry is purchasing greater amounts of cullet or post-consumer container glass and limits the ability of other industries to purchase cullet, the third-party program manager or state agency overseeing the program shall highlight this in their report and not harm these companies who are impacted by their inability to purchase cullet.
6. The third party program manager or state agency overseeing the program shall utilize the data to inform recommendations to the state about necessary investments to increase participation in recycling post-consumer glass and increase capacity for processing post-consumer glass.

SECTION IX. SEVERABILITY AND CONSTRUCTION

The provisions of this Legislation shall be severable, and if any court declares any phase, clause, sentence, or provision of this Legislation to be invalid, or its applicability to any government, agency, person, or circumstance is declared invalid, the remainder of the Legislation and its relevant applicability shall not be affected. The provisions of this Legislation shall be liberally construed to give effect to the purposes thereof.

SECTION X. EFFECTIVE DATE.

This Legislation shall become effective immediately upon adoption.

ADDENDUM –PCRC Credit Concept for Responsible Parties

Note: The following is intended as a concept about inclusion of a PCRC credit in determining the PCRC requirements for responsible parties. The specifics about how the credit would work would be up to the state to finalize.

The percent of PCRC for glass is typically calculated as follows:

- Tons of cullet used/total tons of covered product produced

Example:

- 175 tons of cullet used/500 tons of covered product produced = 35% PCRC

Recycling one ton of glass cullet in a furnace:

- avoids the extraction of 1.2 tons of virgin raw materials
- reduces the CO2 emissions by 580 kg.
- reduces the energy consumption of the furnace (every 10% increase of cullet will reduce the energy consumption of the furnace by about 2.5%)

In determining whether a responsible party has met the 35, 40, or 50 percent minimum PCRC requirement, the third-party program manager or state agency shall credit toward the requirement the combined amount of post-consumer container glass consumed by other end uses that have a demonstrated climate benefit equal to or greater than that of recycling glass in a furnace.

If the responsible party meets the specified minimum PCRC requirement, the third-party program manager or state agency shall not initiate enforcement action.

To apply a PCRC credit for consumption of post-consumer container glass by eligible other end uses, use the following formula:

A. Determine the weight of post-consumer container glass used in all other end use of products:

1. The total amount by weight of all—post-consumer container glass used in each other end use product manufactured and/or sold, offered for sale, or sourced from the region by each other end use manufacturer. ²

Apply an annual credit to all responsible parties based on the weight of post-consumer container glass consumed by other end use companies and therefore unavailable for use by responsible parties.

² The same region used to determine compliance should be used to determine the credit.