

# SB 54 Public Workshop

## Plastic Pollution Prevention and Packaging Producer Responsibility Act

SB 54 (Allen, Chapter 75, Statutes of 2022)

Department of Resources Recycling and  
Recovery (CalRecycle)

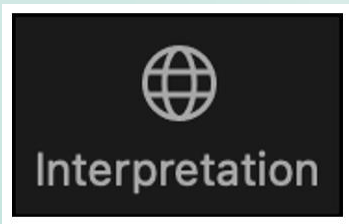
September 27, 2023



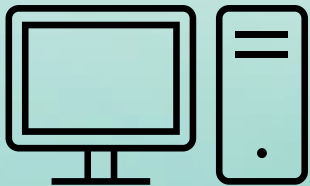
# Interpretation Services | Servicios de Interpretación



**In Person – Ask our team for a translation headset**  
**En persona – Solicite asistencia si necesita audífonos de traducción**



**Zoom – Select your language on the Interpretation icon**  
**Zoom - Seleccione su idioma en el icono Interpretación**



**Webcast - <https://video.calepa.ca.gov/#/>**  
**Transmisión en línea - <https://video.calepa.ca.gov/#/>**

# Disclaimer

*This communication is neither intended to, nor does it constitute definitive legal counseling, conclusions, or advice in any way. Instead, the contents of this communication and any analysis, guidance, or other information is intended to objectively address the question(s) presented based on the current existing, known facts and legal authority as described to and understood by the author and/or CalRecycle at the time of this communication. Please be advised that any relevant facts or legal authority or authorities that are undisclosed or unknown at the time of this communication may affect or alter any analysis, guidance, or other information herein. Please be further advised that any analysis, guidance, or other information herein may be subject to change and/or correction based on changed facts or legal authority, actual or understood, subsequent to the time of this communication. No analysis, guidance, or other information herein should be construed as a waiver of any rights or remedies available to CalRecycle. Recipients of this communication are encouraged to seek the assistance of legal counsel to comply with applicable state law based on current facts and circumstances.*

# Agenda

---

## Opening Remarks

Karen Kayfetz, Branch Chief of the Product Stewardship Branch

## Topic I: Second Draft of Covered Material Category (CMC) List

Rachel Messina, Environmental Scientist, Knowledge Integration Section

## Topic II: Update on Material Characterization Study Progress

Roberta Jetter, Senior Environmental Scientist (Supervisor), Knowledge Integration Section

## Topic III: Needs Assessment Studies

Emily Zakowski, Senior Environmental Scientist (Supervisor), Knowledge Integration Section

Rachel Danielson, Environmental Scientist, Knowledge Integration Section

# Focus of Today's Workshop

This workshop will not address any topics pertaining to regulations or draft regulatory text.

Please direct any comments or questions related to regulatory concepts to the [packaging@calrecycle.ca.gov](mailto:packaging@calrecycle.ca.gov) inbox.

# Overview of Presentation (1)

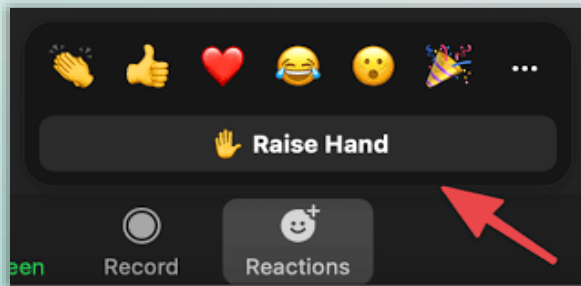
- **Topic I: Second Draft of Covered Material Category (CMC) List**
  - Background and Informational Items
  - Non-Regulatory Items
- **Topic II: Update on Material Characterization Study Progress [Informational Only]**
  - Informational Session
- **Topic III: Needs Assessment Studies**
  - Background and Informational Items
  - Non-Regulatory Items



*Follow along using the Discussion Document*

# Questions and Comments

- To make a comment in-person, please line up at the podium.
- To make an oral comment via Zoom, please raise your hand and the host will unmute you.



- To make a written comment via Zoom, please use the chat box.

# Opportunity for Written Feedback

- Written feedback or questions may be submitted after the workshop to [packaging@calrecycle.ca.gov](mailto:packaging@calrecycle.ca.gov) with subject line “SB 54 Plastic Pollution Prevention and Packaging Producer Responsibility Act”.
- We have developed a process for providing written feedback (last page of the Discussion Document for each topic)
- We request all written feedback be submitted by **October 11, 2023.**



# Topic I. Second Draft of Covered Material Category (CMC) List

---

Department of Resources Recycling and Recovery,  
Knowledge Integration Section

---

**Rachel Messina**  
Environmental Scientist

# Overview of Presentation (2)

## Part I: Background and Informational Items

- Relevant Definitions
- Overview of Covered Material Categories

## Part II: Non-Regulatory Items

- Conceptual Framework for CMC List
- Second Draft of CMC List for Feedback

*Follow along using the Discussion Document*



---

# Definitions

---

*Note: Unless specified, CalRecycle is not currently seeking stakeholder feedback on definitions.*

# Covered Material\* – PRC 42041(e)

"Covered Material" means both of the following:

- (A) Single-use packaging that is routinely recycled, disposed of, or discarded after its contents have been used or unpackaged, and typically not refilled or otherwise reused by the producer.
- (B) Plastic single-use food service ware, including, but not limited to, plastic-coated paper or plastic-coated paperboard, paper or paperboard with plastic intentionally added during the manufacturing process, and multilayer flexible material. For purposes of this subparagraph, "single-use food service ware" includes both of the following:
  - (i) Trays, plates, bowls, clamshells, lids, cups, utensils, stirrers, hinged or lidded containers, and straws.
  - (ii) Wraps or wrappers and bags sold to food service establishment.

***\*See full definition in statute for what "covered material" does not include – PRC 42041(e)(2)***

# Covered Material Category – PRC 42041(f)

“Covered material category” means a category that includes covered material of a similar type and form, as determined by the department.

## Plastic – PRC 42041(t)

“Plastic” means a synthetic or semisynthetic material chemically synthesized by the polymerization of organic substances that can be shaped into various rigid and flexible forms and includes coatings and adhesives. “Plastic” includes, without limitation, polyethylene terephthalate (PET), high density polyethylene (HDPE), polyvinyl chloride (PVC), low density polyethylene (LDPE), polypropylene (PP), polystyrene (PS), polylactic acid (PLA), and aliphatic biopolyesters, such as polyhydroxyalkanoate (PHA) and polyhydroxybutyrate (PHB). “Plastic” does not include natural rubber or naturally occurring polymers such as proteins or starches.

# Plastic Component – PRC 42041(u)

“Plastic component” means any single piece of covered material made partially or entirely of plastic. A plastic component may constitute the entirety of the covered material or a separate or separable piece of the covered material.

---

# Statutory Overview

---



# Overview of Covered Material Categories

- CalRecycle is required to establish and post a list of covered material categories by July 1, 2024 – PRC 42061(a)
- Covered material categories serve multiple functions in statute:
  - Recyclability, Compostability, and Recycling Rate
  - Needs Assessment
  - Data reporting
  - PRO
  - Compliance



*See June 2023 Discussion Document for additional background.*

---

# Non-Regulatory Items

---

# Non-Regulatory Items (2)

**Item 1:** Estimated Timeline for Covered Material Category List Development

**Item 2:** Updates to Conceptual Framework for Establishing List of Covered Material Categories

**Item 3:** Second Draft of Covered Material Category List

# CMC Item 1: Estimated Timeline for CMC List Development

- **June 28, 2023** (June Public Workshop) – First draft of covered material categories list provided for feedback from interested parties.
- **September 27, 2023** (September Public Workshop) – Second draft of covered material categories list provided for feedback from interested parties.
- **By January 1, 2024** – Publication of list of covered material categories that are deemed recyclable and compostable, along with list of covered material categories.
- **By July 1, 2024** – Publication of updated list of covered material categories.

## Informational Item for Interested Parties:

The above estimated timeline provides information on expected public review periods and when the list will be published and updated.

# CMC Item 2: Updates to Conceptual Framework for Establishing List of Covered Material Categories (1/4)

- Conceptual Framework:
  - Provide a structured approach to establishing the CMC list
  - Key set of factors, or criteria, that will be used in the development of the list
- Six Framework Factors:
  - Framework Factor #1: Packaging and Food Service Ware Comprised of Multiple Separable Components
  - Framework Factor #2: Delineating Between Plastic and Nonplastic Covered Material
  - **Framework Factor #3: Categorization by Dominant Material Type\***
  - Framework Factor #4: Addressing Recyclability and Compostability
  - Framework Factor #5: Compatibility with Material Characterization Study Sorting Categories
  - **Framework Factor #6: Categorizing Small Items\***

*\*Framework factor was modified since June workshop draft*

# CMC Item 2: Updates to Conceptual Framework for Establishing List of Covered Material Categories (2/4)

## Framework Factor #3 – Categorization by Dominant Material

Concept: Covered material should be categorized based on the dominant material. For items composed of multiple materials, the dominant material is the material which comprises the highest percentage of the item, by weight.

Changes: Clarified how the dominant material is defined (i.e., material which comprises the highest percentage of the item, by weight).

# CMC Item 2: Updates to Conceptual Framework for Establishing List of Covered Material Categories (3/4)

## Framework Factor #6 – Categorizing Small Items

Concept: For components of covered material where no linear dimension is greater than 2 inches, use a simpler categorization scheme than for items larger than 2 inches. Categorize small items by a combination of material class (type) and size (form) to classify them into covered material categories specifically for small items.

Change: Categorize small items into one category based on size (no linear side greater than 2 inches) for a given material class. Previous draft list separated items into two size categories: (1) 1-2 inches and (2) less than 1 inch.

## CMC Item 2: Updates to Conceptual Framework for Establishing List of Covered Material Categories (4/4)

### Request for Feedback:

CalRecycle is seeking feedback on the conceptual framework being considered to establish the covered material category list pursuant to PRC 42061(a)(1). CalRecycle is also soliciting information on proposed framework factors, or alternative factors, not proposed.

Specifically, CalRecycle is seeking feedback on the updated framework factors (Framework Factors #3 and #6).



# CMC Item 3: Second Draft of Covered Material Category List (1/5)

- Two sets of categories, each defined by three or four major characteristics:
  - (1) Items with smallest side greater than 2 inches
  - (2) Small items with largest side less than 2 inches

**Items Larger  
than 2 inches**

- Material Class
- Material Type
- Form
- Presence of Plastic

**Items Smaller  
than 2 inches**

- Material Class
- Size (1 category)
- Presence of Plastic

# CMC Item 3: Second Draft of Covered Material Category List (2/5)

For items larger than 2 inches, covered material categories are organized around the four major characteristics:

**(1) Material Class** – Broad category of material for which the covered material is predominantly composed of:

a. Options: Glass and Ceramic, Metal, Paper/Fiber, Plastic, Wood/Other Organics

**(2) Material Type** – More specific category of material, within Material Class, for which the covered material is predominantly composed of:

a. Options: See figure on next slide for list of Material Types by Material Class.

# CMC Item 3: Second Draft of Covered Material Category List (3/5)



Material Class

**Paper / Fiber**

Material Type

Kraft Paper

Form

All forms

Presence of plastic

With plastic component



Material Class

**Plastic**

Material Type

HDPE

Form

Pigmented Bottle & Jar

Presence of plastic

N/A

# CMC Item 3: Second Draft of Covered Material Category List (4/5)

Material Classes	Glass and Ceramic	Metal	Paper/Fiber	Plastic	Wood & Other Organic
<b>Material Types</b>	<ul style="list-style-type: none"> <li>• Glass</li> <li>• Ceramic</li> </ul>	<ul style="list-style-type: none"> <li>• Aluminum</li> <li>• Tin/Steel/Bimetal</li> <li>• Other Ferrous</li> <li>• Other Nonferrous</li> </ul>	<ul style="list-style-type: none"> <li>• OCC</li> <li>• Kraft Paper</li> <li>• Paperboard</li> <li>• White Paper</li> <li>• Molded Paper</li> <li>• Multi-Material Laminates (Paper Dominant)</li> <li>• Other/Mixed Paper</li> </ul>	<ul style="list-style-type: none"> <li>• PET (#1)</li> <li>• HDPE (#2)</li> <li>• PVC (#3)</li> <li>• LDPE (#4)</li> <li>• PP (#5)</li> <li>• PS (#6)</li> <li>• Plastics and Polymers Designed for Potential Compostability</li> <li>• Multi-Material Laminates (Plastic Dominant)</li> <li>• Other/Mixed Plastics</li> </ul>	<ul style="list-style-type: none"> <li>• Bamboo</li> <li>• Wood</li> <li>• Other/Mixed Organic</li> </ul>

Note: Each Material Class has additional categories for items comprised of small items less than 2" (with and without plastic component).

# CMC Item 3: Second Draft of Covered Material Category List (5/5)

For items larger than 2 inches, covered material categories are organized around the four major characteristics:

**(3) Form** – Categories based on shape and other form-related factors. Forms are specific to Material Type.

a. Options: See tables below for Forms, by Material Class and Material Type.

**(4) Presence of Plastic** – Items with a non-excluded plastic component will be characterized as a plastic covered material category while items with no plastic component will be considered a nonplastic covered material category.

a. Options: Nonplastic, Plastic

# Reviewing the Draft Covered Material Categories

- We will review all 110 categories, by Material Class:

CMC ID	Material Type	Form	Plastic or Nonplastic CMC?
--------	---------------	------	----------------------------

- After reviewing all CMCs, there will be time to provide:
  - Overarching feedback about the entire list
  - Feedback specific to each Material Class

# Glass and Ceramic Material Class (1/2)

## Major changes:

### *Additions*

- Added 'Ceramic' to the Material Class
- Added 'Ceramic' as a Material Type

### *Consolidation*

- Combined previously two small item categories (less than 1 inch and 1-2 inches) into one small item category (less than 2 inches)
- Combined bottles and jars into same CMC

### *Deletions*

- Removed 'Mixed Material Classes'

## Glass and Ceramic Material Class (2/2)

CMC ID	Material Type	Form	Plastic or Nonplastic CMC?
GC1N	Glass	Bottles and Jars w/o plastic component	Nonplastic
GC1P	Glass	Bottle and Jars w/ plastic component	Plastic
GC2N	Glass	Other Forms w/o plastic component	Nonplastic
GC2P	Glass	Other Forms w/ plastic component	Plastic
GC3N	Glass	Small - Largest Side less than 2" w/o plastic component	Nonplastic
GC3P	Glass	Small - Largest Side less than 2" w/ plastic component	Plastic
GC4N	Ceramic	All Forms w/o plastic component	Nonplastic
GC4P	Ceramic	All Forms w/ plastic component	Plastic
GC5N	Ceramic	Small - Largest Side less than 2" w/o plastic component	Nonplastic
GC5P	Ceramic	Small - Largest Side less than 2" w/ plastic component	Plastic



# Metal Material Class (1/3)

## Major changes:

### *Additions*

- None

### *Consolidation*

- Combined previously two small item categories (less than 1 inch and 1-2 inches) into one small item category (less than 2 inches)

### *Deletions*

- Removed 'Mixed Material Classes'
- Removed 'Aluminum Cup' as CMC (now falls under 'Aluminum - Other Forms')
- Removed 'Aluminum Bottle' as CMC (now falls under 'Aluminum - Other Forms')

# Metal Material Class (2/3)

CMC ID	Material Type	Form	Plastic or Nonplastic CMC?
M1N	Aluminum	Can (non-aerosol) w/o plastic component	Nonplastic
M1P	Aluminum	Can (non-aerosol) w/ plastic component	Plastic
M2N	Aluminum	Foil sheets w/o a plastic component	Nonplastic
M2P	Aluminum	Foil sheets w/ a plastic component	Plastic
M3N	Aluminum	Foil Molded Containers w/o plastic component	Nonplastic
M3P	Aluminum	Foil Molded Containers w/ plastic component	Plastic
M4N	Aluminum	Aerosol can w/o plastic component	Nonplastic
M4P	Aluminum	Aerosol can w/ plastic component	Plastic
M5N	Aluminum	Other Forms w/o plastic component	Nonplastic
M5P	Aluminum	Other Forms w/ plastic component	Plastic
M6N	Tin/Steel/Bimetal	Can (non-aerosol) w/o plastic component	Nonplastic
M6P	Tin/Steel/Bimetal	Can (non-aerosol) w/ plastic component	Plastic
M7N	Tin/Steel/Bimetal	Aerosol can w/o plastic component	Nonplastic
M7P	Tin/Steel/Bimetal	Aerosol can w/ plastic component	Plastic
M8N	Tin/Steel/Bimetal	Other Forms w/o plastic component	Nonplastic
M8P	Tin/Steel/Bimetal	Other Forms w/ plastic component	Plastic

# Metal Material Class (3/3)

<b>CMC ID</b>	<b>Material Type</b>	<b>Form</b>	<b>Plastic or Nonplastic CMC?</b>
M9N	Other Nonferrous	All Forms w/o plastic component	Nonplastic
M9P	Other Nonferrous	All Forms w/ plastic component	Plastic
M10N	Other Ferrous	All Forms w/o plastic component	Nonplastic
M10P	Other Ferrous	All Forms w/ plastic component	Plastic
M11N	Metal	Small - Largest Side less than 2" w/o plastic component	Nonplastic
M11P	Metal	Small - Largest Side less than 2" w/ plastic component	Plastic

# Paper/Fiber Material Class (1/3)

## Major changes:

### *Additions*

- *None*

### *Consolidation*

- Combined previously two small item categories (less than 1 inch and 1-2 inches) into one small item category (less than 2 inches)

### *Deletions*

- Removed 'Mixed Material Classes'
- Removed 'Mailing Pouches & Shipping Envelopes' as CMC (now falls under 'Kraft Paper – All Forms')

# Paper/Fiber Material Class (2/3)

CMC ID	Material Type	Form	Plastic or Nonplastic CMC?
PF1N	Kraft Paper	All Forms w/o plastic component	Nonplastic
PF1P	Kraft Paper	All Forms w/ plastic component	Plastic
PF2P	Molded Fiber	All Forms of Food Service Ware w/ plastic component	Plastic
PF3N	Molded Fiber	All Forms of Packaging w/o plastic component	Nonplastic
PF3P	Molded Fiber	All Forms of Packaging w/ plastic component	Plastic
PF4P	Multi-Material Laminate	Aseptic Containers	Plastic
PF5P	Multi-Material Laminate	Gabletop Containers	Plastic
PF6P	Multi-Material Laminate	Hot Cups and Cold Cups w/ plastic component	Plastic
PF7N	Multi-Material Laminate	Other Forms w/o plastic component	Nonplastic
PF7P	Multi-Material Laminate	Other Forms w/ plastic component	Plastic

# Paper/Fiber Material Class (3/3)

CMC ID	Material Type	Form	Plastic or Nonplastic CMC?
PF8N	OCC	Waxed Cardboard w/o plastic component	Nonplastic
PF8P	OCC	Waxed Cardboard w/ plastic component	Plastic
PF9N	OCC	Cardboard w/o plastic component	Nonplastic
PF9P	OCC	Cardboard w/ plastic component	Plastic
PF10N	Paperboard	All Forms w/o plastic component	Nonplastic
PF10P	Paperboard	All Forms w/ plastic component	Plastic
PF11N	White Paper	All Forms w/o plastic component	Nonplastic
PF11P	White Paper	All Forms w/ plastic component	Plastic
PF12N	Other/Mixed Paper	All Forms w/o plastic component	Nonplastic
PF12P	Other/Mixed Paper	All Forms w/ plastic component	Plastic
PF13N	Paper/Fiber	Small - Largest Side less than 2" w/o plastic component	Nonplastic
PF13P	Paper/Fiber	Small - Largest Side less than 2" w/ plastic component	Plastic

# Plastic Material Class (1/6)

## Major changes:

### *Additions*

- Added color differentiation (Clear/Natural; Pigmented/Color) to PET (#1) 'Bottles, Jugs, and Jars'
- Added 'Other Rigid Items,' 'Other Flexible Items,' and 'Other Film Items' forms to material types that did not previously have these categories:
  - Added PET (#1) 'Flexible Items'
  - Added PET (#1) 'Film Items'
  - Added HDPE (#2) 'Other Flexible Items'
  - Added LDPE (#4) 'Other Flexible Items'
  - Added PP (#5) 'Other Flexible Items'
- Added HDPE (#2) 'Non-Bag Film'
- Separated previously combined PET (#1) flexible and film items into two separate categories ('Flexible' and 'Film' Items)
- Added PP (#5) 'Bottles, Jugs, and Jars'
- Added PP (#5) 'Plates, Trays, Cups, Tubs' to previous PP (#5) "Lids' category (now PP (#5) 'Plates, Trays, Cups, Lids, Tubs'))

# Plastic Material Class (2/6)

## Major changes continued:

### *Consolidation*

- Combined previously two small item categories (less than 1 inch and 1-2 inches) into one small item category (less than 2 inches)
- Combined PET (#1) 'Other Rigid Containers' with 'Other Rigid Items (Excluding Containers)'
- Combined PET (#1) 'Bottles' with 'Jugs and Jars' (maintained color differentiation)
- Combined HDPE (#2) 'Bottles' with 'Jugs and Jars' (maintained color differentiation)
- Combined HDPE (#2) 'Other Rigid Containers' and 'Other Rigid Items (Excluding Containers)'
- Combined LDPE (#4) 'Bottles' with 'Jugs and Jars'

### *Deletions*

- Removed 'Mixed Material Classes'
- Removed PP (#5) 'Bags, Sacks, Pouches (Mesh)' (now falls under 'Other Flexible Items'))
- Removed LDPE (#4) Cups, Trays, Tube (now falls under LDPE(#4) 'Other Rigid Items' category)



# Plastic Material Class (3/6)

CMC ID	Material Type	Form	Plastic or Nonplastic CMC?
P1P	PET (#1)	Bottles, Jugs, and Jars (Clear/Natural)	Plastic
P2P	PET (#1)	Bottles, Jugs, and Jars (Pigmented/Color)	Plastic
P3P	PET (#1)	Hinged and Lidded Containers (Thermoformed)	Plastic
P4P	PET (#1)	Cups & Lids	Plastic
P5P	PET (#1)	Plates and Trays	Plastic
P6P	PET (#1)	Other Rigid Items (including containers)	Plastic
P7P	PET (#1)	Flexible Items	Plastic
P8P	PET (#1)	Film Items	Plastic
P9P	HDPE (#2)	Bottles, Jugs and Jars (Clear/Natural)	Plastic
P10P	HDPE (#2)	Bottles, Jugs and Jars (Pigmented/Color)	Plastic
P11P	HDPE (#2)	Pails & Buckets	Plastic
P12P	HDPE (#2)	Bags, Sacks, & Pouches (film)	Plastic
P13P	HDPE (#2)	Non-Bag Film	Plastic
P14P	HDPE (#2)	Other Flexible Items	Plastic
P15P	HDPE (#2)	Other Rigid Items (including containers)	Plastic

# Plastic Material Class (4/6)

CMC ID	Material Type	Form	Plastic or Nonplastic CMC?
P16P	PVC (#3)	All Forms	Plastic
P17P	LDPE (#4)	Bottles, Jugs and Jars	Plastic
P18P	LDPE (#4)	Bags, Sacks & Pouches (film)	Plastic
P19P	LDPE (#4)	Non-Bag Film	Plastic
P20P	LDPE (#4)	Other Flexible Items	Plastic
P21P	LDPE (#4)	Other Rigid Items	Plastic
P22P	PP (#5)	Bottles, Jugs and Jars	Plastic
P23P	PP (#5)	Hinged & Lidded Containers (Thermoformed)	Plastic
P24P	PP (#5)	Plates, Trays, Cups, Lids, Tubs	Plastic
P25P	PP (#5)	Utensils	Plastic
P26P	PP (#5)	Bags, Sacks & Pouches (film)	Plastic
P27P	PP (#5)	Non-Bag Film	Plastic
P28P	PP (#5)	Other Flexible Items	Plastic
P29P	PP (#5)	Other Rigid Items	Plastic

# Plastic Material Class (5/6)

CMC ID	Material Type	Form	Plastic or Nonplastic CMC?
P30P	PS (#6)	Expanded/Foamed Hinged Containers, Plates, Cups, Tubs, Trays, and Other Foamed Containers	Plastic
P31P	PS (#6)	Expanded/Foamed Cushioning and Void Fill	Plastic
P32P	PS (#6)	Other Expanded/Foamed Forms	Plastic
P33P	PS (#6)	Densified Hinged Containers, Plates, Cups, Tubs, Trays, and Other Densified Containers	Plastic
P34P	PS (#6)	Utensils	Plastic
P35P	PS (#6)	Other Densified Forms	Plastic
P36P	Plastics and Polymers Designed for Potential Compostability	All Forms	Plastic

# Plastic Material Class (6/6)

<b>CMC ID</b>	<b>Material Type</b>	<b>Form</b>	<b>Plastic or Nonplastic CMC?</b>
P42P	Other/Mixed Plastics	Film Items	Plastic
P43P	Other/Mixed Plastics	Flexible Items	Plastic
P44P	Plastic	Small - Largest Side less than 2"	Plastic

# Wood & Other Organics Material Class (1/2)

## Major changes:

### *Additions*

- None

### *Consolidation*

- Combined previously two small item categories (less than 1 inch and 1-2 inches) into one small item category (less than 2 inches)

### *Deletions*

- Removed 'Mixed Material Classes'

# Wood & Other Organics Material Class (2/2)

CMC ID	Material Type	Form	Plastic or Nonplastic CMC?
WO1N	Bamboo	All Forms w/o plastic component	Nonplastic
WO1P	Bamboo	All Forms w/ plastic component	Plastic
WO2N	Wood	All Untreated Forms w/o plastic component	Nonplastic
WO2P	Wood	All Untreated Forms w/ plastic component	Plastic
WO3N	Wood	All Treated or Painted Forms w/o plastic component	Nonplastic
WO3P	Wood	All Treated or Painted Forms w/ plastic component	Plastic
WO4N	Other/Mixed Organic	Textiles w/o plastic component	Nonplastic
WO4P	Other/Mixed Organic	Textiles w/ plastic component	Plastic
WO5N	Other/Mixed Organic	Other Forms w/o plastic component	Nonplastic
WO5P	Other/Mixed Organic	Other Forms w/ plastic component	Plastic
WO6N	Wood & Other Organic Materials	Small - Largest Side less than 2" w/o plastic component	Nonplastic
WO6P	Wood & Other Organic Materials	Small - Largest Side less than 2" w/ plastic component	Plastic

# CMC Item 3: Second Draft of Covered Material Category List

## **Request for Feedback:**

CalRecycle is seeking feedback on the second draft list of covered material categories presented in the tables.

Specifically, CalRecycle is seeking feedback on the major changes outlined in this presentation.

# **Topic II. Update on Material Characterization Study Progress**

---

**Department of Resources Recycling and Recovery,  
Knowledge Integration Section**

---

**Roberta Jetter**

Senior Environmental Scientist (Supervisor)



# Overview of Presentation

## Part I: Informational Session

- High-level background
- Update on progress
- Information on how organizations can sign up to be on the Potential Bidder List

---

# Statutory Overview

---

# Overview of Material Characterization Study (MCS)

- CalRecycle must conduct and publish a material characterization study of covered materials that are disposed in California landfills – PRC 42061(a)(2)
- The first MCS must be completed by July 1, 2025 – PRC 42061(a)(3)(A)
- Subsequent MCS are required in 2028, 2030, 2032, and every four years thereafter – PRC 42061(a)(4)
- For each MCS, the department must publish preliminary findings of the study, conduct a public meeting, receive public comments on the preliminary findings, and then publish final findings – PRC 42061(a)(7)

---

# Update on Progress

---

# Overview of MCS

## Estimated Timeline for Upcoming MCS

- Contract solicitation – Beginning of 2024
- Field work – 2024
- Preliminary findings – July 1, 2025

## Field Research and Characterization Unit

- New unit within CalRecycle's Policy Office
- Specialized team of Environmental Scientists that will assist in the MCS and other data collection

# Stay Engaged – Upcoming Contract Solicitations

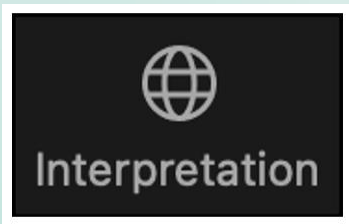
Interested in knowing when contract solicitations are released?

1. Sign up for our SB 54 listserv:  
<https://www2.calrecycle.ca.gov/Listservs/Subscribe/153>
2. Send an email to [Packaging@CalRecycle.ca.gov](mailto:Packaging@CalRecycle.ca.gov) requesting your name be added to a prospective bidder list.
  - a. Provide at least your name and email address
  - b. Begin email subject line with “Potential Bidder List”

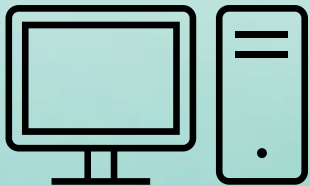
# Interpretation Services | Servicios de Interpretación



**In Person – Ask our team for a translation headset**  
**En persona – Solicite asistencia si necesita audífonos de traducción**



**Zoom – Select your language on the Interpretation icon**  
**Zoom - Seleccione su idioma en el icono Interpretación**



**Webcast - <https://video.calepa.ca.gov/#/>**  
**Transmisión en línea - <https://video.calepa.ca.gov/#/>**

# Break

**Please return by:  
1:00 PM**



# Topic III. Needs Assessment Studies

---

Department of Resources Recycling and Recovery,  
Knowledge Integration Section

---

**Emily Zakowski**

Senior Environmental Scientist (Supervisor)

**Rachel Danielson**

Environmental Scientist

# Overview of Topic III: Needs Assessment Studies

- **Part I: Background**
  - High-Level Information Related to Needs Assessment
- **Part II: SB 54 Producers and Source Reduction Study**
  - Statutory Overview & Background
  - Non-Regulatory Items
- **Part III: Recyclable Material End Market Study**
  - Statutory Overview & Background
  - Non-Regulatory Items

*Follow along using the Discussion Document*



---

# Part 1. Needs Assessment Background

---

# Needs Assessment – Summary of CalRecycle Responsibilities

- CalRecycle will develop the needs assessment through a collaborative process with the PRO and a broad diversity of interested parties, including local jurisdictions, recycling service providers and processors– PRC 42067(d).
- The needs assessment must be developed through a public process including at least one public meeting at which the PRO, the advisory board, and any interested members of the public are able to provide input – PRC 42067(g).
- CalRecycle must update the needs assessment every five years, or as necessary – PRC 42067(a).

# Needs Assessment – Summary of Producer Responsibilities

- PRO plan must describe how to implement actions and investments laid out in the needs assessment – PRC 42051.1(b)(1).
- PRO plan and budget must include consideration of the needs assessment and any recommended investments – PRC 42051.1(i)(1).
- Reimburse CalRecycle for the costs of developing needs assessment – PRC 42067(b).

# Needs Assessment Development

- Some portion of the data collection and analysis for the needs assessment will be completed through contracted studies
- Parts 2 and 3 of this topic provide information and requests for feedback on two proposed contracts:
  - For more information on CalRecycle's contracting process, visit [calrecycle.ca.gov/contracts](https://calrecycle.ca.gov/contracts).
  - Entities interested in receiving updates on upcoming contract solicitations for the needs assessment should email [packaging@calrecycle.ca.gov](mailto:packaging@calrecycle.ca.gov) to be added to the Potential Bidder List. Please include [Potential Bidder List] in the email subject line and include your organization's name and contact information.

---

# **Part 2: SB 54 Producers and Source Reduction Study**

---

---

# Statutory Overview & Background

---



# Background – Source Reduction Baseline

- By January 1, 2025, CalRecycle is required to establish a baseline for the 25-percent source reduction based on the amount of plastic covered material, by weight and by number of plastic components, in the 2023 calendar year – PRC 42057(b)
- The baseline will be comprised of two numbers for baseline year 2023:
  - (1) Total weight (tons) of plastic covered material.
  - (2) Total number of plastic components of plastic covered material.

---

# Non-Regulatory Items

---

# Non-Regulatory Items

- SR Item 1: Study Purpose
- SR Item 2: Study Goals
- SR Item 3: Study Approaches
- SR Item 4: Proposed Contract Logistics

# SR Item 1: Study Purpose

- This study will collect data needed to estimate the source reduction baseline and gather information on producers of covered material.
- The needs assessment requires an evaluation of actions and investments needed to achieve the goals of SB 54, including achieving source reduction requirements.
- This study will collect foundational information on the baseline state of the system, including the amount and types of covered material.

## Informational Item for Interested Parties:

CalRecycle is required to develop a statewide needs assessment pursuant to PRC 42067. CalRecycle intends to contract out the SB 54 Producers and Source Reduction Study with the purpose stated above.

# SR Item 2: Study Goals (1)

**Task 1:** Estimate the amount of plastic covered material in the state for the calendar year of 2023

- By number of plastic components
- By total weight

## SR Item 2: Study Goals (2)

**Task 2:** Assess the regulated community (i.e., producers), including collecting the following:

- Information on producers of covered material
- Number of producers of covered material
- Proportion of producers that would be considered small producers, pursuant to PRC § 42060(a)(5)
- Information on covered material produced, by producer:
  - Plastic or non-plastic covered material
  - Specific types of covered material
  - Source of covered material
  - Location of where producers are assembling the finished product

## SR Item 2: Study Goals (3)

### **Request for Feedback:**

CalRecycle is seeking feedback on the study goals, including collection of data to estimate the source reduction baseline and assess the regulated community.

# SR Item 3: Study Approaches (1)

- Potential approaches or methods that could be used to meet the study goals for both tasks, include:
  - Using data voluntarily provided by producers
  - Using novel data from a source such as market data, information from trade organizations, or other third-party data sets
- Information on covered material produced, by producer, may be provided as aggregate quantities and may exclude producer-specific information.
- Data collected needs to be representative of covered material in the state



## SR Item 3: Study Approaches (2)

### Request for Feedback:

CalRecycle is seeking feedback on the above approaches to collect representative information to estimate the source reduction baseline and assess the regulated community.

CalRecycle is also soliciting information on alternative approaches, not proposed above, for achieving the goals of the study.

Additionally, CalRecycle is seeking information on data sources that could be used to meet the goals of the study, including the name and availability of existing data sources, and any other supporting documentation about the data sources.

# SR Item 4: Proposed Contract Logistics (1)

## Timeline

- Early 2024: Release Request for Proposal (RFP)
- March 2024: Award contract
- April – September 2024: Execute contract
- January 1, 2025: Publish Source Reduction Baseline

## Contract Structure:

- The contract is anticipated to be a Request for Proposal (RFP) with a Pay-per-Deliverable structure.
- The Scope of Work (SOW) will include the following:
  - Initial Meeting with CalRecycle
  - Monthly and Ad Hoc Meetings with CalRecycle
  - Source Reduction Baseline Estimation
  - Assessment of Regulated Community

# SR Item 4: Proposed Contract Logistics (2)

- A major consideration in the contract development and execution is the feasibility of the proposed approach and scope of work, including being achievable, and able to meet statutory requirements.
- This includes, but is not limited to the following:
  - Budget and timeline/schedule constraints
  - Potential confidentiality concerns
  - Availability of critical data
  - Encouraging study participation
  - Ensuring collected data is representative of materials in California

# SR Item 4: Proposed Contract Logistics (3)

## **Request for Feedback:**

CalRecycle is seeking feedback on the proposed timeline and contract structure, including feedback to maximize the success of the contract solicitation and contract execution.

CalRecycle is also seeking feedback on the feasibility of the proposed study goals and approaches in terms of budget, data availability, data sensitivity, and other constraints that would impact contract success.

---

# Part 3: Recyclable Material End Market Study

---

---

# Definitions

---

# Processing – PRC 42041(v)

“Processing” means to sort, segregate, break or flake, and clean material to prepare it to meet the specification for sale to a responsible end market

# Responsible End Market – PRC 42041(ad)

“Responsible end market” means a materials market in which the recycling and recovery of materials or the disposal of contaminants is conducted in a way that benefits the environment and minimizes risks to public health and worker health and safety. The department may adopt regulations to identify responsible end markets and to establish criteria regarding benefits to the environment and minimizes risks to public health and worker health and safety.



---

# Non-Regulatory Items

---

# Non-Regulatory Items

- RMEM Item 1: Study Purpose
- RMEM Item 2: Study Goals
- RMEM Item 3: Study Approaches
- RMEM Item 4: Proposed Contract Logistics

# RMEM Item 1: Study Purpose (1)

- This study will collect and analyze data on the current processing and recycling of materials, excluding materials sent to organics recycling
- Collected information will address multiple required components of the SB 54 Need Assessment, including:
  - The current processing capacity [for recycling] and infrastructure in the state and regionally – PRC 42067(e)(2)(D)
  - The current state of end markets in the state and regionally – PRC 42067(e)(2)(E)
  - An evaluation of whether available end markets exist (and mechanisms to identify them) to recycle covered materials – PRC 42067(e)(2)(I) & PRC 42067(e)(2)(K)
  - Examination of contamination as related to quality requirements for remanufacturing and the contributing factors to contamination – PRC 42067(e)(2)(J)

# RMEM Item 1: Study Purpose (2)

- The study will provide additional information relevant to SB 343 (Allen, Chapter 507, Statutes of 2021) regarding whether materials routinely become feedstocks used in the production of new products or packaging (PRC § 42355.51(d)).
- Pursuant to PRC § 42355.51(d)(1)(B)(iii), the department may publish additional information not available during the most recent periodic material characterization study.

## **Informational Item for Interested Parties:**

CalRecycle is required to develop a statewide needs assessment pursuant to PRC 42067. CalRecycle intends to contract out the Recyclable Material End Market Study with the purpose stated above.

# RMEM Item 2: Study Goals (1)

- **Task 1: Identify Intermediate Supply Chain Entities (ISCEs) and End Markets (EMs) procuring recycled feedstock generated and sorted in CA.**
  - Information should include, but may not be limited to, the estimated current and projected (if applicable) processing capacity of ISCEs and EMs by material type and geographic region.
- **Task 2: Collect information on recyclable material sold as feedstock.**
  - Material type, grades, and quantities of feedstock generated in CA and transferred to ISCEs or EMs.
  - Information on factors influencing the markets for these recyclable materials, including temporal volatility.
  - Geographic flow and distribution of recyclable material feedstocks generated in California and the associated market share across large global regions by material type.

## RMEM Item 2: Study Goals (2)

- **Task 3: Collect information on contamination and incompatible materials in recyclable material aggregate, by material type.**
  - Identification of contaminants or materials or residues that are commonly aggregated with recyclable materials
  - Identification of incompatible materials
  - The acceptable and average proportions of contaminants and incompatible materials within a given aggregate load.
  - Typical or common fate(s) of contaminants and incompatible materials.
  - Market, public health, and environmental impacts imposed by contamination.
- **Task 4: Collect information on manufacturing of recycled content products by EMEs.**
  - Common type(s) of product(s) manufactured using recycled content in their production.
  - Average ratio of recycled content used relative to virgin materials.
  - Estimated market size and geographic concentration for products containing recycled content

## RMEM Item 2: Study Goals (3)

### Request for Feedback:

CalRecycle is seeking feedback on the above study goals, including collection of data to gather representative information regarding intermediate supply chain entities (ISCEs) and end markets (EMs).

# RMEM Item 3: Study Approaches (1)

- CalRecycle is considering multiple viable approaches to collect the information
  - Collecting new data from potential data sources, such as large-volume MRF operators, trade groups, brokers, or manufacturers (data collection would be voluntary). This could include surveys, interviews, or other data collection methods.
  - Using existing data sets or other verifiable information.
- Data collected needs to be representative of material generated in the state.
- Some data of interest could be collected at multiple points in the recycling supply chain
- Due to the difficulty in collecting this sort of data, flexibility and creativity will be required of the contractor to obtain sensitive data



## RMEM Item 3: Study Approaches (2)

### Request for Feedback:

CalRecycle is seeking feedback on the above approaches to collect representative information regarding intermediate supply chain entities and end markets.

CalRecycle is also soliciting information on alternative approaches, not proposed above, for achieving the goals of the study.

Additionally, CalRecycle is seeking information on data sources that could be used to meet the goals of the study, including the name and availability of existing data sources, and any other supporting documentation about the data sources.

# RMEM Item 4: Proposed Contract Logistics (1)

## Timeline

- Late 2023: Release RFP
- Early 2024: Award contract
- February–September 2024: Execute contract

## Contract Structure:

- The contract is anticipated to be a Request for Proposal (RFP).
- The Scope of Work (SOW) includes the following:
  - Initial Meeting with CalRecycle
  - Monthly and Ad Hoc Meetings with CalRecycle
  - Tasks to gather representative information regarding intermediate supply chain entities (ISCEs) and end markets (EMs)

# RMEM Item 4: Proposed Contract Logistics (2)

- A major consideration in the contract development and execution is the feasibility of the proposed approach and scope of work, including being achievable, and able to meet statutory requirements.
- This includes, but is not limited to the following:
  - Budget and timeline/schedule constraints
  - Potential confidentiality concerns
  - Availability of critical data
  - Encouraging study participation
  - Ensuring collected data is representative of materials in California

# RMEM Item 4: Proposed Contract Logistics (3)

## Request for Feedback:

CalRecycle is seeking feedback on the proposed timeline and contract structure, including feedback to maximize the success of the contract solicitation and contract execution.

CalRecycle is also seeking feedback on the feasibility of the proposed study goals and approaches in terms of budget, data availability, data sensitivity, and other constraints that would impact contract success.

# Opportunity for Written Feedback

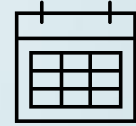
- Written feedback or questions may be submitted after the workshop to [packaging@calrecycle.ca.gov](mailto:packaging@calrecycle.ca.gov) with subject line “SB 54 Plastic Pollution Prevention and Packaging Producer Responsibility Act”.
- We have developed a process for providing written feedback (*see last page of Discussion Document*)
- We request all written feedback be submitted by **October 11, 2023**.



## Ways to stay informed



### Sign-up for our SB 54 Listserv



### Informational Session on the PRO Application:

- October 12, 2023 at 10:00 AM
- Located in the Byron Sher Auditorium (CalEPA HQ)
- Hybrid (Zoom/Webcast)



More information forthcoming; will be distributed through our listserv and available on the SB 54 Webpage.

Email: [Packaging@CalRecycle.ca.gov](mailto:Packaging@CalRecycle.ca.gov)