# CREATING A RECYCLING SYSTEM FOR THE FUTURE

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#### Who we are



Recycle BC is a non-profit organization responsible for residential packaging and printed paper recycling throughout British Columbia.

Recycle BC ensures household materials are collected, sorted and responsibly recycled.

Our program is funded by over 1,200 businesses that include retailers, manufacturers and restaurants that supply packaging and printed paper to BC residents, shifting costs away from homeowners.



#### **TIMELINE AND REGULATORY CONTEXT**

- October 2004 BC filed Recycling Regulation
- May 2011 BC amended *Recycling Regulation* to include Schedule 5
  - Defines packaging and printed paper (PPP) product category
  - Specifies residential premises as source of PPP
  - Obligates PPP producers (e.g. manufacturers, importers and retailers) to submit stewardship program plan to Ministry by November 19, 2012
- April 2013 Ministry of Environment approves Recycle BC stewardship plan
- May 2014 Launch of Recycle BC Program



### **RECYCLE BC'S STEWARDSHIP PLAN**

- Producers of packaging and paper are responsible for:
  - Reasonable access to packaging and paper collection services
  - $\circ$   $\,$  Management of collected packaging and paper  $\,$ 
    - Within the context of the pollution prevention hierarchy
    - To achieve 75% recovery within a reasonable time
  - Establishing relationships with:
    - Collectors local governments, private sector companies and not-for-profit organizations
    - Post-collection service provider
  - Financing implementation of the Stewardship Plan (\$80 million per year)



# PROGRAM OVERVIEW

# **2016 PROGRAM PERFORMANCE**

- Over 185,000 tonnes of packaging and printed paper was collected from households and depots across British Columbia, representing a recovery rate of 78%
- An additional 16,000 households received curbside or multi-family services
- Over 1.27 million BC households in 154 communities had access to Recycle BC curbside or multi-family services
- 98% of households in BC had access to a depot
- Recycle BC expanded the communities it directly services, taking over recycling services in the City of Vancouver and the City of Pitt Meadows



# **RECYCLE BC COLLECTION SYSTEM**

- Curbside recycling
  - Local governments receiving Recycle BC incentives on a perhousehold basis
  - Direct service by Recycle BC in 12 jurisdictions
- Multi-family recycling
  - Local governments and private companies receiving Recycle
    BC incentives on a per-household basis
- Depots
  - Local governments, non-profits and private companies receiving Recycle BC incentives on a per-tonne basis



# **Collection Incentives**

#### • Financial incentives were offered to:

- Local governments that:
  - Were providing PPP or garbage curbside collection services in November 2012
  - Wished to provide multi-family building collection services
  - Wished to operate depots to receive PPP from residents
- Private and not-for-profit collectors that wished to provide multi-family building collection and/or provide depot collection



# **Collection Incentives**

#### • Recycle BC offered collection incentives to

- Allow those who were collecting PPP to continue to do so
  - If they wish no obligation on existing collectors
- Reflect reasonable payment for providing service
- All service providers required to execute contracts
- Municipalities retain the option to not participate in the program (and not receive incentives) or to request that Recycle BC assume direct responsibility for curbside service.



# **CITY OF VANCOUVER TRANSITION**

- The City of Vancouver is the largest city in British Columbia had been part of the Recycle BC program since May 2014, receiving Recycle BC incentives for curbside and multi-family collection
- In November 2015, the CoV announced their decision to transition responsibility for curbside and multi-family service directly to Recycle BC
- CoV indicated that: "MMBC (Recycle BC) has demonstrated their ability to implement recycling systems in other municipalities and have achieved high levels of recycling."
- Recycle BC released an RFP for collection services Dec 2015 and took over service on October 3, 2016 for approximately 230,000 households
- Over the first ten months of the program, there has been little disruption to residents with no discernible increase in customer service calls or complaints



# **RECYCLE BC COLLECTION SYSTEM**

- Standardized material list for all curbside and multi-family collection across the province
- Material list includes many items not included in traditional recycling programs – coffee cups, aerosol containers, plant pots, single-use coffee pods
- Clear/coloured glass containers can be collected
  At curbside if segregated from other PPP
  - From multi-family buildings if segregated from other PPP
  - $\circ$  At depots where it can be kept separate from other PPP
- Plastic film and expanded PS (styrofoam) collected at depots



#### **CURBSIDE CAPTURE RATES**





#### **CURBSIDE CONTAMINATION RATE**





# **POST-COLLECTION SYSTEM**

- Recycle BC is responsible for all post-collection activities by hiring contractors to:
  - $\circ~$  Pick up packaging and paper from depots
  - Receive packaging and paper from curbside and multifamily building collectors
  - Transport, process and market packaging and paper
- Green by Nature (GBN) operates the entire provincewide post collection system with the support of over 40 sub-contractors



#### **POST-COLLECTION NETWORK**

31 Receiving, Consolidation and Transfer Facilities (RCTs)



11 Preconditioning Facilities (PCFs)





BRITISH COLUMBIA Area: 944,735 km<sup>2</sup>



# **POST-COLLECTION SYSTEM – CRF**

- All containers from across the province are baled and sent to a newly built 185,000 square-foot Container Recovery Facility (CRF)
- This facility, uses stateof-the-art recycling equipment to sort 30,000 tonnes of containers per year.

- Containers are sorted into eight different categories:
  - PET clear & coloured
  - $\circ~$  HDPE natural & coloured
  - **PP**
  - o Plastic Film
  - o Other Plastics
  - Aseptic/Polycoat
  - o Steel
  - $\circ$  Aluminum



#### **RECYCLING END MARKETS**

- Recycle BC gives priority to end-markets located in countries that are members of the Organization for Economic Co-operation and Development (OECD). Recycle BC does permit marketing to packaging and printed paper end-markets located in countries that are not members of the OECD only if the end market meets or exceeds environmental, health and safety standards equivalent to OECD standards.
- Plastics Plastics are sold to end-markets in British Columbia
- Paper/Fibres The majority of fibres are sold to end-markets in China, with the rest either remaining in BC or going to end-markets in the United States and South Korea
- Glass Glass is sold to end markets in British Columbia
- Metals Metals are largely sold to end-markets in Ontario, with the rest either remaining in BC or going to end-markets in the United States



#### **OUR SYSTEM AT WORK**





#### **OUR SYSTEM AT WORK**





## **Recycle BC's System Approach**

- Recycle BC represents a model of the circular economy in action where producers have influence on both the creation and end-of-life management of their materials that can provide the basis for more holistic decisions as new innovations in packaging are developed and implemented
- The Recycle BC system provides producers with the best long-term opportunity to manage their obligations for printed paper and packaging in light of increasing costs, volatile commodity markets and continued innovations in packaging types and materials





Making a difference together.



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