Domestic Processing of Mixed Plastics: Stakeholder Meeting Summary

Lisa Sepanski, King County Solid Waste Division
Logistics

• Hosted by Seattle Public Utilities and King County’s LinkUp Program on January 30

• Invitation only, attended by 60+ people from Washington, Oregon, California, British Columbia
  – MRF operators
  – Plastics processors
  – Local and State governments
  – Economic development and funding organizations
## Agenda

<table>
<thead>
<tr>
<th>Time</th>
<th>Topic</th>
</tr>
</thead>
<tbody>
<tr>
<td>1:00 – 1:25pm</td>
<td>Welcome, Opening Remarks</td>
</tr>
<tr>
<td>1:25 – 1:40pm</td>
<td>Context:</td>
</tr>
<tr>
<td></td>
<td>• The current landscape in Washington State</td>
</tr>
<tr>
<td></td>
<td>• The Importance of Domestic Processing to citizens and NGOs</td>
</tr>
<tr>
<td>1:40 – 2:20pm</td>
<td>Material Recovery Facilities Panel</td>
</tr>
<tr>
<td>2:20 – 3:00pm</td>
<td>Perspectives on Additional Sorting/Processing</td>
</tr>
<tr>
<td></td>
<td>• Merlin Plastics</td>
</tr>
<tr>
<td></td>
<td>• Denton Plastics</td>
</tr>
<tr>
<td></td>
<td>• Titus MRF Services</td>
</tr>
<tr>
<td>3:00 – 3:20pm</td>
<td>Development Assistance for Altering or Building Domestic Infrastructure</td>
</tr>
<tr>
<td>3:20 – 3:30pm</td>
<td>Short Break</td>
</tr>
<tr>
<td>3:30 – 4:10pm</td>
<td>Small Group Breakout</td>
</tr>
<tr>
<td>4:10 – 4:50pm</td>
<td>Reconvene for Full Group Discussion</td>
</tr>
<tr>
<td>5:00</td>
<td>Adjourn</td>
</tr>
</tbody>
</table>
Findings: Domestic Processing Capacity Exists

There is current domestic processing capacity for mixed plastics load at Merlin in Vancouver BC.

• Cost to transport to Merlin facility from Seattle
• Cost to sort
• Revenue for materials – depending on contents of bales
  – HDPE Natural and Color
  – PP color
  – PET Clear
  – PET green
  – Polycoated fiber
Next Steps: Domestic Processing

• Determine feasibility of sending mixed plastics to Merlin
  – Understand costs for each community
  – Short term vs long term
• Explore funding sources
• Determine if there is political will
  – Task Force forming in King County
Findings: Interest in Building a Secondary MRF in PNW

Secondary MRF shifts from scrap commodity service to sorting service business model

• Primary MFRs in WA and OR send low volume materials and yield losses to Secondary MRF
  – Aggregates materials from MRFs to achieve critical mass
  – Sort materials into direct-to-mill commodities in truckload quantities

• Aggregated volumes justify investments in automated sorting technologies

• Opens additional domestic markets for materials such as PP, PS/EPS, and PLA
Findings: Interest in Building a Secondary MRF in PNW

• Improves Blue Bin Accountability
  – No need to export mixed loads of materials
  – Commodities sold direct-to-mill are documented

• Requires infrastructure investments in only one facility within a region
  – Allows the facility to quickly adapt to changes in packaging materials

• Manufacturer accountability
  – Manufacturers or brand owners are identified and contacted to see if they want to pay to have their packaging materials recycled
Next Steps: Secondary MRF

• Develop detailed costs and funding scenarios
  – Explore manufacturer funding

• Secure funding and commitment for material volumes
  – Co-op Model
  – General Partner(s) - provide capital investments
  – Limited Partner - primary MRFs provide unsorted materials and pay processing fee. In return receive portion of revenue from sale of materials.

• Facility could be operational within 9 – 12 months of securing material flow, funding and permits
Findings: Demand is Key

Step up the demand for recycled products and use recyclable materials in products and packaging.

• Recycling isn’t recycling until recyclable materials are used to replace virgin feedstocks.

• Local and state governments must require the use of recycled content in products and packaging.

• Manufacturers must use recycled feedstocks in their products and packaging.
Next Steps: Create Demand

• Draft state legislation
  – Require manufacturers to use recycled feedstocks in their products and packaging
  – Coordinate with other states - California SB 168 requires recycled content in all beverage containers sold in the state
  – 2018 HB 2914 – work on new bill for 2019

• Develop local procurement ordinances
  – Require the use of recycled content in products and packaging

• Support national efforts - APR’s Recycling Demand Champions
  – WM, Republic, Recology, Waste Connections, Amazon, Costco, etc.
Report Available at
King County LinkUp Webpage