

NOTES FROM PLASTICS RECYCLING WORLD EXPO
May 7-8, 2019

We must create a culture of recycling. (of course, along with REDUCE, REUSE)

Goal: continue to create a **CIRCULAR ECONOMY**, whereby plastic products are created, used, broken down, and turned into new products. Of note, each time a plastic material must be sorted into pure non-contaminated types in so that manufacturers can use the pure pellets that are formed. Also, each time a new product is produced it is made into a lower quality plastic, so eventually the only products produced are not recyclable and must be trashed.

WE NEED STANDARDIZATION OF WASTE COLLECTION. About 80% or more, of all recycled plastics come from INDUSTRIAL sources, not post-consumer plastics. Recycling companies have these systems in place and are desperate for more recycled plastics. They look for more industrial sources, but some are willing to arrange for obtaining recycled plastics from consumers IF THEY ARE NON-CONTAMINATED, CLEAN, SINGLE TYPE—eg, PET5 bottles, CD plastic covers, CD's, #5 plant pots, etc. I spoke with 2 companies, one in KY, one in Chagrin Falls, that could possibly except truckloads of plastics like this, esp if it could be a continuing source for them.

There exists a demand for recyclate, thus there is great need for high level SYSTEM approach of recycling. If consumers demand more products made from recycled materials then more products will be made, and more recyclate will be needed...

I was told by one company rep. that the thin grocery plastic bags are difficult to recycle as they cannot be cut by the knives used. Only 3% of bags are recycled.

Most recycling is “mechanical”—plastics are cleaned, cut up into very tiny pellets, then sold to producers of products. Materials usable are pure PET, PP, EPS(which is turned into PS, polystyrene). If the pellet step in the process is skipped, it is more efficient (this concept presented by one company, **EPS RECYCLE**).

A possible newer approach is to reuse the molecules of plastics, chemical recycling, which reduces the CO2 produced.

EACH AREA MUST KNOW WHAT ITS MRF WILL ACCEPT AND ACTUALLY USE.

MRF's can be upgraded to make them able to accept more things. When I asked Diane about this she said Kimble upgraded some years ago (6?), and that it was expensive.

*We need to know what Kimble wants, and find a way to provide only this.

*Could we then also set up local recycling system with a company to recycle non-contaminated plastics of one or more types that our MRF will NOT accept?

Recycle Across America—this is an organization that focuses on getting the right message to all persons in the world by creating labels to put onto recycling containers that are clear, understandable to all (pictures). Website: www.recycleacrossamerica.org

Terracycle—privatized recycling funded by the companies that make the materials. At this time uses zerowaste boxes for consumers for recycling of all sorts of things (makeup and toothpaste tubes, toothbrushes, etc.) Need to investigate this website.

- It helped NYC to setup foodwaste recycling system!
- It is trying to work with cities for high volume recycled items: has done this in a European city with cigarette butts!!

FURTHER IDEAS/POSSIBILITIES

1. need to inform all those who recycle WHAT to recycle, HOW to do it correctly.
2. There exist machines that take recycling bottles /cans (reverse vending machines-one company who makes these is TOMRA: see www.tomra.com/en/collection/reverse-vending) which then provides pure materials for recycling. Could this used to collect non-contaminated materials?
3. In public places, near each trash receptacle there should be a well-labeled recycling receptacle.
4. Government must consider laws: bottle deposit fee (Michigan has a bottle deposit law since 1978), landfills not accept certain materials (example : carpeting not accepted in CA landfills), only allowing 100% recycled materials for making of garbage bags, tax any virgin-made plastic materials made. Already existing example: upfront fee when buy tires, covering the fee for recycling them, only
5. Set up recycling of a pure product that MRF does not accept, send to an accepting company.
6. Check into **TERRACYCLE** –It is now trying to work with cities for high volume materials. Could a pilot project be setup with them or one of the companies who would accept clean non-contaminated materials? Perhaps have a collection area with specifically labeled bins (similar to what whole foods has) near a large truck that these would then be loaded into.
*2 companies who I spoke with to consider : **GLOBAL POLYMERS, C4 POLYMERS**
7. Check into labeling system of **RECYCLE ACROSS AMERICA**—perhaps work with cities, schools, establishments, hospitals, etc , to use this system of informing.
8. We must work with our MRF to have then openly share with information of what exactly they are recycling so that we then only provide these materials to them.
9. An EPS compacting company in Cleveland folded in the past years. The machinery exists (and is still available?) to do this . Is this a consideration by the city, etc?

Companies of interest to investigate:

- C4 Polymers www.c4poly.com Eric Smith esmith@c4poly.com (Chagrin Falls)
- Global Polymers www.globalpolymerscorp.com Justin McRoberts
Justin@globalpolymerscorp.com
- Terracycle
- Recycle Across America

OTHER IDEAS:

Another option for recycling items that residents no longer want is to donate them—this information is available on the website <https://cuyahogarecycles.org> , and people should be encouraged to do this. There is a downloadable booklet called “**Pass It On**”, that lists MANY PLACES to donate “usable stuff”.

Cities can use a recycling company, **Simple Recycling** for recycling unwanted clothes, books, household items, etc, with a curbside method. South Euclid uses this. In 2018 55,878 lbs were collected from 2,659 residents. Contact in S. Euclid for more information: Patti Schnell, pjschnell@seuclid.com, 438-7109. www.simplerecycling.com

Could Cleveland Heights have a recurring event where unwanted still usable items can be left for others to take? No money exchanged? I believe South Euclid does this at least once a year (more often? Could ask them about this too.

Specific collections could be set up for drop off of specific, sorted items, then transported to the company that collects them. For example, Nike collects used sneakers. The companies mentioned above.

More ideas: AS WE HAVE LEARNED, TRASH, RECYCLING, BULK, YARD WASTE, ITEMS PEOPLE NO LONGER NEED is a BIG JOB

***Consider having an innovative, tech-savvy part time employee** to research options, and run programs for used items that people no longer want, **and** to educate residents about all of this. (Perhaps a newsletter via email, updated section on the website, etc)

The job would include education about:

- what belongs in the trash for a landfill and what does not?
- What to do with hazardous waste?
- Options for getting rid of certain items (TV to Best Buy, old tools to HRRC, materials of a house to Habitat for Humanity, clothing to H&M, Good will, companies that pickup.)
- what is recyclable at curbside or elsewhere, and how?
- what bulk items can be put out for curbside pickup, and what cannot?
- What can be done with bulk items that can't be picked up by the city?
- How is yard waste correctly prepared for pickup?
- If it is too big for pickup, how does one get rid of yardwaste?

*Programs to consider setting up:

- clothes and home items with simple recycling-curbside
- sneakers to Nike
- specific project with Terracycle
- used sports equipment: Shaker Heights has a collection of these every fall , and then they are sold at low cost to anyone who wants them
- event of bring what you don't want , take what you do, as S. Euclid has each year
- consider a few days in nice weather on a weekend where people can put items they want to get rid of on their tree lawn for anyone to come and take
- set up a collection of one type of item that is not recyclable in Cuyahoga county ,to be collected in a truck and transported for money to one of the companies mentioned.
- for large bulk waste, have CH use the H.Depot bags and charge a fee to resident to help cover cost Note: a lot of the bulk could be better handled by getting them to the right group that can use them. Some companies do just this. Might we try to work with one?

If finances don't allow for curbside recycling at this time due to cost of bins, etc, consider:

1. increase the number of large recycling bins, which are now located near certain businesses, to more areas –and educate residents about their presence, and what exactly to put into them. Excellent labeling is a must.
2. Weekend recycling trucks parked in a location for residents to bring their items to—these should be monitored by an employee or two to assure that ONLY CORRECT materials go into them. This would provide non-contaminated materials.

** if all recycling materials are non-contaminated, and prepared correctly(clean, dry, with caps on, collapsed cardboard), perhaps we will not have to pay for recycling!!

-Kathy Smachlo
8/20/19