Understanding Disposable Products & How Compostable are Compostables?

Callie Martin, Waste Reduction/Recycling Education Specialist Skagit County Public Works-Solid Waste Division October 2019

You've likely been here before: Wearing the organizational badge of honor, you're charged with the task of purchasing dishware, cups, and utensils for a family reunion, club picnic, or work event. With so many disposable options to choose from, how do you decide what to buy? Let's walk through this together.

Traditional Plastic

The main offender of disposability is petroleum-based plastic ware. These items have been sold for several decades and include Styrofoam cups, plastic cold cups, straws, plastic cutlery, and lids for paper coffee cups. Nothing from this group of serviceware can be recycled. Currently, the best place for most of these items after single-use is the trash can. Best efforts for reuse could be washing them to use at another time, though they are less durable than other materials.

Compostable Plastic

A bit tricky to decipher from traditional plastic, compostable or plant-based plastics were all the rage beginning in 2010. Compostable plastics come in the same forms as traditional serviceware, and today there is a compostable plastic alternative to just about any traditional plastic item you can find. Many thought compostable products might end the destructive impacts of plastic pollution, and create a less wasteful disposable option for activities on the go.

An important characteristic of compostable plastic is that it is meant to break down in an industrial-scale composting facility, rather than a backyard compost pile. This is because a typical backyard compost pile does not grow hot enough to break down the chemistry of compostable plastics.

If you have access to a collection bin that is hauled to a composting facility, compostable products are an acceptable alternative to traditional plastic. However, we have a second caveat at play. Industry studies have found that many compostable plastic serviceware items do not break down fully during the industrial composting process. Bits and pieces of compostable plastic are found floating about the finished compost. The impact of this lowers the market value for finished compost products, and deteriorates the future success of community composting systems.

While compostable to a certain degree, nothing in the compostable plastic family is recyclable in the blue curbside bin. Combined with the confusing fact that these products look a lot like traditional plastic, compostable plastics aren't the obvious answer to plastic pollution we were hoping for.

Wait though, compostable plastic MUST be better than traditional plastic. Right? It is true, when compostable plastic enters as litter into the environment it does have an easier chance of breaking down without adding as much pollution as traditional plastic. Letting it out of our hands and into the environment without proper disposal has never been the goal though, and shouldn't be something to bank on.

If you find yourself heading in the direction of purchasing compostable plastic for your next event, be sure to use the following guidelines:

- Purchase compostable plastic if the only other option available is traditional plastic.
- Make sure any compostable plastic purchased is ASTM 6400 or ASTM D6400 Certified by the Biodegradable Products Institute. This guarantees is can break down fully in an industrial-scale composting operation.
- Be sure you have access to municipal composting in the form of a curbside green cart or yard waste pick up service.
- Check with your local industrial composting facility to verify that they accept compostable plastics for composting.
- In Skagit County, yard waste carts are hauled to Skagit Soils, where compost is made on an industrial-sized scale. Currently, compostable plastics are not accepted for composting at Skagit Soils or anywhere in Skagit County.

Compostable Paper

Since soiled or dirty paper cannot be recycled, it is often a great option to compost it instead. There are an array of compostable paper products out there for use at gatherings and events. In order to be composted successfully, paper serviceware needs to be unlined. This means no thin, traditional plastic liners on the tops or bottoms, or around the inside of the paper. Though regular bleached paper can be composted without much consequence, the gold-star standard for compostable paper serviceware would mean the products were not only unlined, but also unbleached. Compostable paper products do eliminate the issue of plastic pollution entirely, as they compost very effectively using industrial composting methods. It is important to remember that paper products do have a significant impact on the environment through natural resource use. When trying to move away from plastic, compostable paper products offer a good transition. Follow these guidelines if you want to host your next event using compostable paper products:

- Paper coffee cups are often lined. Be sure to purchase only those treated with polylactic acid (PLA) as the form of liner, as it can be fully composted. Eco Products offers a variety of options for PLA lined compostable paper products.
- Ideally, look for unbleached paper products. These will usually be brown in color, rather than white. If brown can't be found, white is okay too!

Bamboo & Wooden Products

Another disposable alternative you may have placed on your radar are wooden or bamboo

products. These items are often one hundred percent compostable, and offer a good alternative to both traditional and compostable plastics. Compared to other large-scale crops, bamboo comes out 'greener' than most with regard to the overall environmental impact. A fast growing grass, it requires no fertilizer and self-regenerates from its own roots, so it doesn't need to be replanted. The downside to bamboo and wooden serviceware are that they are often expensive. Greenwave, Bambu Veneerware, and Green Paper Products offer bamboo options.

Washable & Reusable

The best thing to do for Mother Earth is to avoid disposable options for serviceware altogether. Washables do take resources to create, and use water to clean, but after a certain amount of uses create little to no additional pollution. When choosing what to buy, talk to other organizers. Purchasing washable plates, cups, and silverware may actually prove less expensive over time. Consider hosting gatherings or meetings in a space that already has washable dishware available to borrow, like a church or community center. Come up with solutions for dishwashing, or better yet, have everyone invited to the event bring their own plate, mug, and silverware from which to enjoy the meal. This creates a larger sense of community, and sometimes even a way to meet new friends!