

## The Basics

### 1. What CAN be composted?

- a. ALL food waste (including grains, breads, meat, dairy, fruits, vegetables, tea bags, and coffee grinds),
- b. napkins,
- c. paper towels,
- d. compostable plates, bowls, cups, and utensils
- e. the bags that line the compost bins

### 2. What CANNOT be composted?

- a. plastics,
- b. metal,
- c. coffee lids,
- d. sugar packets (these are lined with plastic coating)
- e. Plastic ketchup or similar dressing and sauce packets,
- f. Styrofoam,

## The Composting Process

### 1. Where does the compost go?

Compost picked up by Save that Stuff (the organization that we are using) goes to a farm on the North Shore (in Ipswich), every day except for Tuesdays and Fridays (when it goes to a farm in Saugus).

### 2. What makes the containers compostable?

These products (including plates, cups, silverware, take-out clamshells) are derived from plants and will **biodegrade** in the proper environment.

- The plates and bowls are made from bagasse, a sugarcane waste product.
- The cups are corn plastic
- The utensils are potato starch.

### 3. How long does it take the bioplastic break down?

Under the naturally high temperature environment of the commercial composting facility our compost is sent to, it takes a maximum of 9 months to become soil. It can be much quicker under ideal conditions.

### 4. What are the environmental implications of bioplastics?

#### Disposal

Bioplastics that are composted often travel less distance for disposal (ours goes to Ipswich, MA, 30-40 miles away, and our trash goes to South Carolina, 800-900 miles away). The materials in the composted

bioplastics go back to the soil, and are used as a natural fertilizer, whereas landfilled material has no future use.

### **Energy**

Analyzing the energy inputs required to produce a bioplastic product is complicated, since it relates to the amount of fertilizers used and energy used to grow and process the plant products. It is generally thought that most bioplastics are more sustainable options to conventional plastics, particularly bioplastics that are manufactured with agricultural waste products, like bagasse.

Italian bioplastic manufacturer Novamont<sup>[4]</sup> states in its own environmental audit<sup>[5]</sup> that producing one kilogram of its starch-based product uses 500g of petroleum and consumes almost 80% of the energy required to produce a traditional polyethylene polymer.

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## **Bagasse (plates and bowls)**

From Wikipedia: “Bagasse is also used as a tree-free alternative for making [paper](#). This process requires no bleaching, is more biodegradable, easier to [recycle](#), and overall has less impact on the environment.<sup>[*citation needed*]</sup> As in sugar production, the sludge left over after removing the cellulose fibers, is used to power the paper-mills. A number of commercial sites advertise such uses. ...Bagasse is used to make insulated disposable food containers, replacing materials such as [styrofoam](#),”

## **Corn-based PLA (cups)**

Greenware cold drink cups are made from a plastic derived from corn called “**Polylactic Acid**” or **PLA**, which looks and acts like petroleum based polymers, but is made from renewable resources, and breaks down into natural components.

Visit [www.natureworkspla.com](http://www.natureworkspla.com) for more information.

Note—these cups look EXACTLY like other plastic cups that are not biodegradable, so it is important to check the bottom of the cup to make sure it says “PLA” or “compostable” before putting in the compost bin.

Greenware will break down completely (in the correct composting conditions) in approximately 50 days!

According to an independent study, production of PLA plastic uses 65% less energy compared to regular plastic, reducing associated GHG emissions by 68%.

\*\*\* Note—these products are designed to hold hot and cold food as needed, but are not meant to be HEATED and do not hold up well in the microwave!\*\*\*