SOME COMPANIES HAVE PROVIDED A JUMPING-OFF POINT FOR THE WORLD'S NECESSARY SWITCH TO A ZERO-WASTE ECONOMY.

COMPANIES NEED TO MOVE TOWARD REUSABLE, REFILLABLE AND ZERO-WASTE SYSTEMS

Recycling is often presented as a solution to our plastics crisis, but it falls short. Worldwide, only 9% of all the plastic waste ever produced has been recycled, and even with dramatic expansion, projected recycling rates are not expected to keep up with the increasing amount of plastic production.

Many innovations across multiple economic sectors will be necessary to solve the plastics problem, but one promising development is that companies are moving away from single-use plastic use and instead investing in reusable, refillable and zero-waste alternatives. Already, many companies are trying new business models to change how we consume. Below are examples of early adopters of some of these solutions.

REUSABLE DELIVERY SYSTEMS

Reusable packaging presents a huge opportunity to reduce delivery waste at a time when online shopping is increasing.

- The Wally Shop based in Brooklyn, New York – uses bike couriers to deliver groceries to customers in such reusable packaging as organic cotton mesh bags, resealable glass jars and totes. The Wally Shop charges a fee per piece of reusable packaging provided. The price of this deposit is deducted from the customer's next delivery, at which point old packaging is taken back to be cleaned and reused.
- Liviri plans to provide companies with reusable transport packaging for deliveries of meal kits and direct-to-consumer perishables. After delivery, the customer uses an included shipping label to return the

container. The "Liviri Fresh" container not only reduces waste and lessens the recycling burden on consumers, but it also provides better insulation for perishable foods.

• **RePack** has created a reusable system for e-commerce packaging. On supported e-commerce sites, a customer can select to receive RePack's packaging. The packaging can be returned through the mail for free. Users are rewarded with vouchers for their next purchase to both incentivize the return of the packaging and benefit participating stores by prompting further sales. RePack found that their packaging system reduces waste by 96% when compared with cardboard.

REUSABLE PRODUCT CONTAINERS

In addition to innovative delivery systems, other companies are creating reusable product containers.

• Loop is delivering packaged consumer goods, including food, in reusable containers to customers



for a deposit. The company offers products from dozens of brands — detergent, shampoo, mouthwash and even groceries like ice cream, peanut butter and pasta — in steel, glass and durable plastic reusable containers. The products arrive in a Loop Tote, and used containers are placed back in the tote and left on the doorstep for pickup. They are then cleaned, refilled and shipped out again. While Loop is currently only available in select ZIP codes, it is expected to expand across the U.S., U.K., Canada, Germany and Japan.

REUSABLE TAKEOUT CONTAINERS AND UTENSILS

New business models to reduce waste from to-go cups and takeout containers are also spreading. Most of these businesses operate with a subscription or deposit-based system.

- GO Box in Portland, Oregon, has customers download a mobile app and sign up for an annual or monthly subscription. Customers can check out reusable containers from participating food carts and restaurants. They can then return these containers to drop sites, from which they will be collected, cleaned and used again.
- reCIRCLE, in Switzerland, has customers pay for reusable to-go cups and containers when they order food to go. These items can be returned to any reCIRCLE restaurant partner for a full refund, at which point they'll be washed and provided to the next customer. Customers can also choose to keep the containers or take them home and reuse them before returning. The reCIRCLE system already has more than 1,000 partner restaurants across the country.
- In the U.S., OZZI partners with college and university campus dining centers, sports and entertainment venues, food courts, restaurants, hotels, supermarkets and other businesses to provide reusable food containers, cups and utensils. When customers take a clean container, they give the cashier a token or card. When the customer returns the container to an OZZI machine, they receive their token back or card credit. Already, OZZI has diverted 5 million containers from landfills, roadsides and waterways.

PRODUCT-REFILL STATIONS

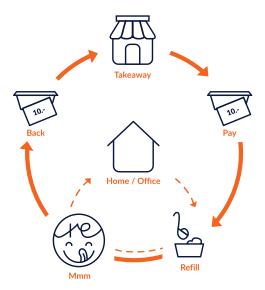
Product-refill stations are an easy way to reduce waste as well — they allow customers to continue to reuse the same containers, simply refilling as they need.

- Ecopod refill stations in Florida supply eco-friendly laundry detergent, fabric softener, liquid dish soap, dishwasher gel and all-purpose cleaner. Customers bring their empty Ecopod containers to the refill kiosks and select what they would like dispensed. Ecopod places refill kiosks in residential and retail properties that want to join the program.
- Common Good refill stations in New York allow customers to refill hand soap, dish soap, all-purpose cleaner and laundry detergent. Customers can refill plastic or glass bottles, and some stores allow customers to bring any container they want.

DITCHING WATER TO DITCH PLASTIC

Companies are also developing products that remove the water from items like shampoos, conditioners, moisturizers, body washes, mouthwash, toothpaste and even household cleaning materials. These products often consist primarily of water — for example, most bottled shampoos are 80% water, and some can be up to 95% water. With less water, the concentrated versions of these products do not require any plastic packaging.

• Lush makes shampoo and conditioner bars. The company claims that its concentrated shampoo bars can outlast two or three bottles of liquid shampoo.



reCIRCLE Model

- Bite makes toothpaste tablets that come in refillable and recyclable glass jars filled with a four months' supply. Users bite down on the tablet and start brushing.
- Ethique offers more than 40 solid "beauty bars" for everything from shampoos and conditioners to moisturizers, face scrubs, hair masks, self-tanners and body washes. The company says its conditioner bar is equal to five bottles of liquid conditioner and usually lasts six to eight months. Ethique claims to have prevented the disposal of over 3 million plastic bottles.
- Blueland produces cleaning products in the form of small tablets – buyers add water at home. Each tablet makes 20 ounces of cleaner. The company provides three spray bottles, and the customer can order tablet refills as needed.

Companies like these have provided a jumping-off point for the world's necessary switch to a zero-waste economy, creating innovative business models that prove we can move away from throwaway living. A "refill and reuse" economy is in our sights. As more corporations follow the lead of plastic-free pioneers by transitioning to new ways of packaging products, we'll finally be on the path to safeguarding this planet for future generations.

