



THE MARYLAND HOUSE OF DELEGATES  
ANNAPOLIS, MARYLAND 21401

SPONSOR TESTIMONY IN SUPPORT OF HB841  
ENVIRONMENT - PLASTIC BOTTLE WASTE REDUCTION - WATER BOTTLE FILLING  
STATIONS AND REPORTING

Delegate Sheila Ruth  
March 26, 2024  
Senate Education, Energy, and the Environment Committee

HB841 takes two common sense steps towards reducing our consumption of single-use plastic water bottles:

1. It requires the installation of a water bottle refill station in all newly constructed buildings (not already under contract) where a water fountain is already required by the plumbing code. The refill station must accommodate a 10 inch container and may be integrated into the water fountain. Ensuring widespread availability of fresh water is an important and necessary step to reducing unnecessary use of single-use water bottles.

This is similar to 2023's bills in Illinois ([SB1715](#)) and Washington state (Section 2 of [HB1085](#)), both of which have been enacted into law.

2. Requires the Maryland Department of the Environment (MDE) to survey the quantity and volume of water bottles purchased by state government units and higher educational institutions during 2024 and identify alternative methods of providing drinking water. MDE must report this to the General Assembly and the Governor and post the report on its website for public viewing. Our state government should set an example by taking the lead in reducing our unnecessary consumption of single-use plastic, and knowing how much is already being used is an important first step. MDE has already approved this language and said that they can do the survey.

## Why is this legislation important?

Recent research has increasingly shown how plastic has become a serious public health crisis that we must urgently address. [An analysis in March 2023](#) highlighted how plastics cause “[significant harm to human health, the environment and the economy](#)” from extraction to disposal. Plastics are also major contributors to climate change, emitting greenhouse gasses at every stage of their lifecycle.

Workers extracting the raw materials and producing plastics face a particular health risk, as do residents of environmental justice communities where plastic production and/or disposal facilities are located, such as the incinerator in Baltimore. However, virtually everyone is exposed to the health risks of plastic regularly. For example, some chemicals in plastic packaging, including Nonintentionally Added Substances (NIAS), can leach into our food that we eat and feed our families.

Over 98% of plastics are produced from oil, gas, and coal. Extraction of these fossil fuels and their use in the production of plastic releases greenhouse gasses and contributes to air and water pollution. In addition, thousands of different chemicals are used in the production of plastics to give them various desired characteristics, and some of those chemicals include carcinogens, endocrine disruptors, and neurotoxicants.

The disposal of plastics presents a huge challenge and health hazard as well. Plastics break down into micro- and nanoplastics. These tiny particles now permeate everything, including [Mount Everest](#), the [oceans](#), the air, [human blood](#), our lungs and [placentas](#), and may even [cross the blood-brain barrier](#). Recently, boats racing in the Ocean Race were equipped with special filters to sample the water - and [every single sample from every ocean environment, even the most remote, contained microplastics](#).

We eat and [breathe](#) microplastics all the time without knowing it, yet not enough is known about how these omnipresent particles impact our bodies. [Much more research is needed to understand the extent to which microplastics impact human health](#). However, laboratory research has shown that, in addition to being vectors for other toxic chemicals and pathogens, micro- and nanoplastics can be toxic on their own depending on the size, shape, and chemical composition of the particles.

## But what about recycling?

Increasing the percentage of plastic that is recycled is important, but even that is an inadequate solution. There is an environmental cost to recycling processes, too, and some methods of recycling emit toxic chemicals. A recent study found that [recycled plastic actually has more chemicals than virgin plastic](#). Many of these chemicals find their way into our food, making recycled plastics “[vectors for spreading chemicals of concern](#).”

Another recent study found that the [recycling process generates a significant amount of microplastics](#): as much as 6% to 13% of incoming waste

Alternate methods of recycling are being developed but have not yet been proven on a large scale and many also have negative environmental impacts.

Just this month, the Center for Climate Integrity released a [bombshell report](#) showing that [plastic producers have known for decades that recycling is not a viable solution](#), yet they continue to promote the convenience and disposability of single-use plastics.

## **How will HB841 help?**

Plastics have revolutionized many industries and undeniably serve important uses. However, it's clear that we cannot keep accelerating our consumption of single-use plastics without causing significant negative impacts on the environment and human health. For decades, the goal has been to "reduce, reuse, recycle" - but while recycling is important, we place too much emphasis on it and need to shift our efforts towards reducing unnecessary consumption of plastics in the first place.

The Maryland General Assembly has rightly been working on increasing and improving our recycling of all materials, including plastic bottles, and that important work must continue. However, we must also in parallel reduce the amount of disposable plastics we consume as a longer-term solution. HB841 takes some simple but important steps to begin that process, and I ask for a favorable report.