

Plastic Bag Bylaw (Article 17) FAQ

Q. What harm do plastic bags cause?

In 2009, Guinness World Records named the plastic bag the "most ubiquitous consumer item."¹ Each year, approximately 1 trillion plastic bags are consumed worldwide, 100 billion in the U.S. alone.² These ubiquitous bags endanger our wildlife, clog our waterways, propagate environmental toxins, and litter our public spaces.

Where do all these bags wind up? The EPA reports that only 6.6% of bags and wraps made of HDPE are recycled,³ and the recycling rate of carryout bags specifically is likely far less.⁴ The billions that remain often wind up in landfills, where they may take up to 1,000 years to break down and never fully biodegrade.⁵ When plastic bags are incinerated in municipal waste, as they are in Arlington, they can release toxins into the air we breathe.⁶ Many others drift into waterways, where they choke or strangle birds, turtles, whales, and various marine creatures that mistake them for food.⁷ While plastic bags are not allowed in curbside recycling, all too many are tossed in anyway, jamming sorting machines at recycling centers.⁸

A plastic bag never truly goes away. Rather than biodegrade, they fracture into microplastic particles. When consumed by an animal, microplastics may block its digestive tract leading to starvation, and microplastic toxins in animals may eventually find their way onto our dinner table. Since they do not readily break down, plastic bags too often litter our public spaces, causing visual blight and higher litter cleanup costs.

Q. How common are plastic bag bans?

At this time, 47 cities and towns in Massachusetts have passed their own plastic bag bans, including our neighbors Cambridge, Somerville, and Watertown,⁹ and new bans are being actively considered in other communities around the state. Similar measures have been enacted in cities and towns spanning 17 states and more than 30 countries.¹⁰

Q. Would all plastic bags be banned or are there reasonable exceptions?

The ban would only apply to plastic bags that are *single-use* and *provided at the point of sale* (aka the checkout line). Produce bags for fruits and vegetables would be allowed, since they are not provided at checkout, as would newspaper bags, dry cleaning bags, meat and poultry bags, and bags for pre-packaged items like bread. Retailers would also be free to offer paper bags or *reusable* plastic bags at the checkout counter.

Plastic bags provided by restaurants as part of take-out or delivery service would also be disallowed by this by-law. "Doggy bags" provided to take home leftover food would not be subject to the ban, because such bags are a by-product of a service, not for a standalone purchased retail item.

¹ "Guinness World Records(R) Selects Top Records Of The Decade," PR Newswire, December 8, 2009.

² Clapp, Jennifer and Linda Swanston, "Doing Away with Plastic Shopping Bags: International Patterns of Norm Emergence and Policy Implementation," *Environmental Politics*, 18 (2009), 314-332.

³ EPA. *Advancing Sustainable Materials Management: 2014 Tables and Figures*. December, 2016.

⁴ "2009 Statewide Recycling Rate for Plastic Carryout Bags." CalRecycle
<http://www.calrecycle.ca.gov/plastics/atstore/annualrate/2009rate.htm>

⁵ Lapidos, Juliet. "Will My Plastic Bag Still Be" Here in 2507?" *Slate*, June 2007.

⁶ Valavanidis A, Iliopoulos N, Gotsis G, Fiotakis K. "Persistent free radicals, heavy metals and PAHs generated in particulate soot emissions and residue ash from controlled combustion of common types of plastic." *J. Hazard. Mater.* 2008;156:277-284.

⁷ United Nations Environmental Programme. "Marine Litter-Trash that kills". 2001.
<http://www.unep.org/regionalseas/marinelitter/publications/default.asp>

⁸ Elejalde-Ruiz, Alexia. "Plastic bags a headache for recyclers." *Chicago Tribune*. 30 July 2015.

⁹ Baglaws.com. <http://www.baglaws.com/legislation.php?state=Massachusetts>

¹⁰ "Phase-out of lightweight plastic bags." *Wikipedia*. https://en.wikipedia.org/wiki/Phase-out_of_lightweight_plastic_bags

Q. Will this increase costs for businesses and consumers?

First of all, plastic bag bans are not new to Massachusetts, and there's no evidence of negative economic impact to the 47 other cities and towns that have enacted similar bans. Consider this testimony from business owners:

"We ... voice our support as local small business owners in favor of the proposed plastic bag ban. We also have a shop in Davis Square, Somerville, which recently went through a plastic bag ban ordinance. Though we have always been conscious of the impact of plastic bags, and always offered only recyclable craft paper bags, we have definitely noticed a decline on the use of these bags since the ban went in effect. There clearly has been a shift in awareness with more people carrying their own reusable bags, or declining a bag and carrying their items by other means. I think this would be to Arlington's benefit as well."

– Melisa & Paul Christie, Owners, Arlington Centered

"We do not use plastic bags in our business and it has had no negative impact. The paper bags we have are more expensive than a plastic alternative, but they are sturdier and they hold much more than a plastic bag."

– Lauren Dexter, General Manager, Not Your Average Joe's, Arlington

"I personally was thrilled when the bag ban was passed in Cambridge. Most customers support the ban and I have seen it change behavior [such as] people bringing bags, going without bags."

– Dina Mardell, Owner and Manager, Porter Square Books

"We have not felt a negative impact because of the plastic bag ban. The biggest issue is explaining it to travelers from outside the area, which we spend time doing and most people are understanding. At this point we have become accustomed to the ban, and I see no negative side - just the positive side of keeping plastics out of the environment."

– Susan Corcoran, Owner, Black Ink Gift Shop, Harvard Square

To understand the economics of single-use bags, first recognize that plastic bags already cost stores and consumers today. Stores typically pay between 2 to 5 cents per single-use plastic bag.¹¹ For supermarkets, the total estimated cost of plastic bags ranges from \$1,500 to \$6,000 a month,¹² and this cost is passed onto customers through higher prices. They are not as "free" as they may appear to be.

While paper bags generally cost more per-bag than plastic, mitigating factors offset the higher per-bag price. Other communities with bans experienced a boost in reusable bag usage and, consequently, a decrease in the *total* number of disposable bags stores provide. Plus, increased sales of reusable bags become an additional revenue stream for the stores. A 2013 study by the non-partisan Equinox Center of three plastic bag bans in California found a 40% increase in reusable bag usage after implementation of the ban, and as a result "no sustained negative impact to retailers."¹³ A separate study of the Richmond, California ban measured a 35-79% decrease in total disposable bag usage and a 4-29% increase in reusable bag sales, depending on the type of store.¹⁴ Stores may further reduce costs by offering discounts to customers that bring their own bag, as Whole Foods Arlington already does, or by offering a raffle incentive, as the Trader Joe's in Arlington does.

¹¹ Los Angeles County (Aug. 2007). "An Overview of Carryout Bags in Los Angeles County: Staff Report to the Board of Supervisors," Table 9. Based on assumption that average person uses about 600 plastic bags per year

¹² Downing, J. "Free Grocery Bags Targeted for Extinction in California," Sacramento Bee, Aug. 25, 2008. Estimates from bag manufacturers and the Food Marketing Institute.

¹³ Plastic Bag Bans: Analysis of Economic and Environmental Impacts. Equinox Center. Oct. 2013.

¹⁴ Taylor, Rebecca L. "Bans vs. Fees: Disposable Carryout Bag Policies and Bag Usage." Appl Econ Perspect Policy (2016) 38 (2): 351-372. Sep. 27, 2015.

The ban would be phased in with large chain retailers in the town, like CVS, Walgreens, and Stop & Shop having to comply by March 1, 2018, and smaller retailers having to comply by July 1, 2018. Large retailers have the financial resources to absorb transitional costs, and have already adapted to similar bans in cities and towns around Massachusetts, including Somerville and Cambridge. Some large retailers in Arlington already primarily rely on providing paper bags at checkout, not plastic. Smaller retailers are granted a longer phase-in period to deplete their existing plastic bag stock.

Q. Aren't paper bags bad for the environment too?

Yes, the manufacturing of any disposable bag exacts an environmental cost, but when considering the overall environmental impact, on balance paper is preferable to plastic. Paper bags typically degrade in a couple months, while plastic bags may take 1,000 years to breakdown and never truly biodegrade. Paper bags can be composted or recycled at the curbside; plastic bags thrown into curbside bins jam up recycling machines. Paper bags don't choke our wildlife, tangle themselves in our trees, or burden our bodies with toxins. More to the point, a ban on plastic bags is part of a larger cultural shift toward shoppers bringing their own *reusable* bags, reducing total disposable bag usage, paper or plastic. The above-mentioned Equinox Center study of plastic bag bans in California found 84% of consumers turned to reusable bags or no bag, as opposed to only 16% who resorted to paper bags.

Q. Why not charge a fee for plastic bags, instead, and maybe a fee for paper bags, too?

Other towns in MA have tried to impose a fee on disposable bags, but the Attorney General's Office has ruled such a fee to be impermissible under the Home Rule Amendment to the State's Constitution. Bans, on the other hand, have been upheld as permissible under local authority. While a city, like Cambridge, has the authority to impose a fee on paper bags, a town like Arlington may not. All cities and towns in Massachusetts that have restricted plastic bag use have enacted bans, not fees, so Arlington's ban would be consistent with what other Massachusetts communities have done.

Q. Why not increase awareness and availability of plastic bag recycling instead?

Initiatives to educate and offer more recycling bins for plastic bags have failed to substantially increase their recycling rate. A 2009 California law designed to promote plastic bag recycling increased the recycling rate from 3% to only 4% over the course of a year.¹⁵ Moreover, plastic bags are never truly recycled but "downcycled," meaning they are turned into an inferior product, like plastic pellets or packing beads. That is, if they are successfully downcycled at all; the material is so flimsy that even machines designed to recycle plastic bags can be jammed or damaged in the process. Additionally, downcycling plastic bags is often so tedious and chemically harmful, the process is normally offshored to nations with more relaxed environmental and labor laws. Once downcycled, the plastic cannot usually be be downcycled again, so it will still find its way into our waste stream and our waterways.¹⁶

Q. What if I use plastic bags for trash and pet waste?

Considering the average American family consumes 1,500 single-use plastic bags a year, it is unlikely they are all being repurposed for trash and pet waste.¹⁷ Even so, plastic bags won't be going away entirely. The ban only applies to single-use plastic bags offered at retail check-out lines, so there will still be produce bags, bread bags, newspaper bags, and other kinds of bags to reuse.

¹⁵ Hickman, Bill. "California Plastic Bag Recycling Law Fails To Be Effective." Surfrider Foundation. October 30, 2013. <https://www.surfrider.org/coastal-blog/entry/california-plastic-bag-recycling-law-fails-to-be-effective>

¹⁶ Mieszkowski, Katharine. "Plastic Bags are Killing Us." *Salon*. Aug 10., 2007.

¹⁷ "NRDC Lauds Passage of New York City Council Legislation Requiring Groceries, Retailers to Provide Plastic Bag Recycling for Consumers." National Resources Defense Council. January 9, 2008.

Q. How will the ban be enforced?

The ban would be enforced by the Board of Health. Experience in other communities has shown that such bans require little enforcement. Most stores will self-comply, and customers can assist with compliance by reporting violations to store management or the Board of Health. The Board of Health already inspects food establishments, where most bags are distributed today, so this is just one more item on the checklist.

Q. Who supports the plastic bag ban bylaw?

Board of Selectmen *"[N]ot only are plastic bags often an eyesore throughout our community and a waste of finite natural resources, but they also jam recycling machinery, do not biodegrade in landfills, release toxic emissions when incinerated, and present dangers to marine wildlife"*

Board of Health

Late Senator Ken Donnelly (D-Arlington)

Arlington Centered *"We also have a shop in .. Somerville, which recently went through a plastic bag ban ordinance. Though we have always ... offered only recyclable craft paper bags, we have definitely noticed a decline on the use of these bags since the ban went in effect. There clearly has been a shift in awareness with more people carrying their own reusable bags, or declining a bag and carrying their items by other means. I think this would be to Arlington's benefit as well."*

Arlington Conservation Commission

Arlington Entrepreneurs

Arlington Recycling Committee *"Our town's contracted recycling facility ... tells us how plastic bags interfere with the efficient sorting and processing of our recyclables, and ... cause machinery mishaps that take hours to deal with."*

Arlington United for Justice with Peace

Charles River Watershed Association

East Arlington Livable Streets Coalition

FoodLink

Friends of Spy Pond Park *"Eliminating such non-biodegradable packaging will also beautify the Town by reducing the unsightly and permanent litter that thin plastic bags have caused caught in treetops and blowing around parklands."*

Housing Corporation of Arlington

Humane Society of the United States *"Plastic bags wash into our rivers, lakes, streams, and oceans, where they are ingested by or entangle sea turtles, otters, seals, fish, and birds. Some ocean animals mistake the bags for food, filling their stomachs with plastics, and die of starvation."*

League of Women Voters of Arlington

Massachusetts Society for Prevention of Cruelty to Animals (MSPCA)

Mass Audubon

Mass Climate Action Network (MCAN)

MassPIRG

Mothers Out Front

Mystic River Watershed Association *"Throughout our 45 years of environmental restoration efforts, we have seen the impact of plastic waste on our river ecosystems – it inhibits natural hydrologic flows, harms marine animals and blights the waterfront open spaces that people enjoy."*

Support Arlington Center *"I spoke to a handful of small businesses in Arlington Center and the majority seem happy with the idea of banning plastic bags."*

Sierra Club Massachusetts *"Arlington residents use more than 1 million polyethylene shopping bags per month. There is no excuse for single-use shopping bags made of petrochemicals derived from non-renewable, fracked natural gas and oil"*

Sustainable Arlington