

Ranking Top U.S. Grocery Stores on Protecting Pollinators from Toxic Pesticides



Acknowledgements

This report was written by Kendra Klein, Ph.D., senior staff scientist, Friends of the Earth

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About Friends of the Earth

Friends of the Earth United States, founded by David Brower in 1969, is the U.S. voice of the world's largest federation of grassroots environmental groups, with a presence in 75 countries. Friends of the Earth works to defend the environment and champion a more healthy and just world. We have provided crucial leadership in campaigns resulting in landmark environmental laws, precedent-setting legal victories and groundbreaking reforms of domestic and international regulatory, corporate and financial institution policies. Visit www.foe.org to learn more.

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Putting pesticides on the sustainability agenda for pollinators & the climate

Amid rising concern about an "insect apocalypse" and the decimation of bees and butterflies – the small but mighty pollinators responsible for one-in-three bites of food we eat – retailers are beginning to step up to address the routine and unnecessary use of toxic pesticides in their supply chains.

To spur a race to the top, Friends of the Earth created a landmark retailer scorecard to benchmark 25 of the largest U.S. grocery stores on pesticides and pollinator health in their food and beverage supply chains. We found that despite important momentum in the sector, these companies have a long way to go. While 23 of 25 have policies related to energy and climate, just six have taken steps in the right direction on agricultural pesticides.



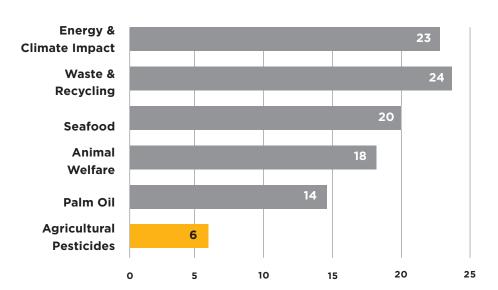
6 out o

25

major U.S.
grocery retailers
have a policy
addressing toxic
pesticides in
agriculture



Sustainability policies adopted by major U.S. grocery retailers



The choices these powerful companies make could determine whether bees, as well as fireflies, dragonflies, Monarch butterflies, and so many other essential insects, will exist in the future. Scientists warn of "catastrophic ecosystem collapse" if we don't save these small but important creatures by changing the way we farm. From birds to fish to people, insects are the basis of the food webs that feed us. They are essential to maintaining a livable planet.

It's time for grocery stores to create policies that reflect the urgency of the biodiversity crisis. These pollinator solutions will also be climate solutions. When grocery retailers commit to truly shift their supply chains away from pesticide-intensive agriculture to organic and other science-based ecological farming systems, they will not only protect pollinators, they will reduce their climate impact and help create vital climate solutions, as we explain below.

Grocery stores have a major role to play in moving from pesticide-intensive agriculture to the food system of the future. Their ability to continue to source abundant food depends on this shift, and they have the market power to make massive changes in our food system.

Together, the 25 companies we evaluated control \$910 billion in food and beverage sales every year.² The top four alone — Walmart, Kroger, Costco and Albertsons — control \$519 billion.

Grocery stores are also growing their private label brands, which creates more opportunities to directly influence practices in their supply chains. Private label sales now make up 29% of sales in the grocery sector.³

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Market leadership is critical because our federal pesticide policy system is broken. U.S. agriculture uses more than 1.1 billion pounds of pesticides annually, representing approximately 15% of total global pesticide usage.4 The U.S. Environmental Protection Agency (EPA) allows use of many pesticides banned in other countries -72 that have been banned in the European Union, 17 in Brazil and 11 in China.⁵ Between 2017-2018, the EPA approved over 100 new pesticide products containing ingredients widely deemed to be highly hazardous. 6 Despite a large and growing body of scientific data on the health and environmental damage wrought by pesticides, the U.S. government's food and agriculture policies subsidize pesticide-intensive agriculture to the tune of billions of dollars. Meanwhile, ecological farming solutions are woefully underfunded, for example, less than one percent of federal agricultural research dollars support sustainable farming research.7



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The problem



U.S. beekeepers lost over

40%

of their colonies last year, with the highest winter losses ever recorded.

Bees are the canaries in the cornfields showing us that U.S. agriculture is on a deadly track.

Forty percent of insect species face extinction in coming decades according to a recent meta-analysis. A growing body of science shows that agricultural pesticides are one of the main drivers of insect declines worldwide, along with habitat loss and climate change.

Pesticides – a term that encompasses insecticides, herbicides and fungicides – are a cornerstone of an industrial agricultural system that is decimating biodiversity, producing massive greenhouse gas emissions and destroying the soil and water resources that we need to grow food. The energy-intensive process of pesticide manufacturing alone accounts for approximately 10% of the total energy used for growing crops. The energy used for growing crops.

Friends of the Earth's <u>Toxic Secret</u> report reveals pesticide residues on store brand cereal, applesauce, produce and beans from the top four U.S. grocery retailers: Walmart, Costco, Kroger and Albertsons.

Pesticides also threaten the health of people from farmworkers to eaters. Pesticide exposure is linked to cancers, asthma, neurodevelopmental disorders like autism and ADHD and to adult neurological diseases like Alzheimer's and Parkinson's. 13,14,15,16 Exposure is also associated with endocrine disruption which is linked to a range of health problems including increased risk of obesity, diabetes and reproductive disorders. 17,18

There are more pesticides on our food now than a decade ago, and we can't just wash these pesticides off our food. More than 90 percent of Americans have detectable pesticides in their bodies, and government testing finds at least 29 different pesticides in the average American. Farmworkers can be exposed to pesticides at levels hundreds of times higher than consumers. Farmers, farmworkers and their families have higher rates of acute poisonings, cancers, birth defects, asthma, infertility, autism and other neurological and reproductive problems.²¹

Pesticide-intensive agriculture is also failing to deliver on its primary goal: controlling pests. Since the widespread introduction of synthetic pesticides after World War II, hundreds of insect and weed species have developed resistance.²² This has created a "pesticide treadmill" in which farmers spray more often and use more toxic pesticides to deal with resistant pests.²³ Despite drastic and costly increases in pesticide use, some analyses show that farmers are losing more of their crops to pests today than they did in the 1940s.^{24,25}

The solution

Decades of research shows that we need a rapid shift to ecological farming solutions like organic and regenerative agriculture in order to feed all people sustainability, now and into the future.

A growing body of science shows that farmers who rely on ecological methods for pest management instead of pesticides outperform their conventional counterparts in terms of yield and profits. ^{26,27,28,29} Rather than toxic chemicals, these farmers build healthy soils that confer greater pest immunity to plants and increase biodiversity in their farming systems to disrupt the growth of pests and to foster natural predators. This includes crop rotations, cover cropping, composting, reducing tillage and planting habitat for beneficial insects.

Reducing pesticide use to protect pollinators by shifting to ecological farming methods also results in climate solutions, as these same practices underpin 'carbon farming' approaches known as regenerative agriculture. Friends of the Earth's <u>Pesticides &</u>
<u>Soil Health</u> brief reveals the science on why pesticide reduction is a key part of regenerative agriculture, which can draw carbon down from the atmosphere to the soil.

There is growing understanding that building healthy soils through ecological farming practices can draw carbon down from the atmosphere, which is a critical climate solution. Building healthy soils requires reducing pesticide use, as pesticides harm the soil organisms that are central to this process of soil carbon sequestration.³⁰ One teaspoon of compost-rich organic soil can host as many as 1 billion helpful bacteria from 15,000 species while soils from conventional pesticide-intensive farms contain as little as 100 bacteria.³¹

Building healthy soils also helps mitigate the effects of climate change on farmers since healthy soils conserve water and significantly increase farmers' resilience in the face of climate-related droughts and floods. 32,33

Finally, as mentioned above, manufacturing pesticides is an energy-intensive process. Therefore, grocery stores should count pesticide reduction as an important part of their energy and greenhouse gas reduction goals.



What can retailers do?

Grocery stores can use their enormous market power to reduce the use of toxic pesticides on farms in the U.S. and around the world and bolster farmers' ability to rapidly transition to organic and ecological farming systems.



Establish a pollinator protection policy that includes the phase out of neonicotinoids, glyphosate, chlorpyripos and other pollinator-toxic pesticides as well as implementation of least-toxic pest managment strategies in the company's supply chain.



Increase USDA certified organic food and beverages to 15 percent to overall offerings or sales by 2025, prioritizing U.S. farmers.



Publicly disclose company policies and progress related to these actions.

Food retailers face both reputational and material risks for failing to address the overuse of agricultural pesticides. Without pollinators, grocery shelves would run short of many fruits and vegetables, nuts, beans, and delicious favorites like chocolate and coffee. And because bees pollinate alfalfa and other crops eaten by cows, even the dairy and meat shelves would look bare.

Photo by Aaron Burden on Unsplash

Pollinators contribute approximately \$29 billion to the U.S. economy and up to \$577 billion to the global economy annually.³⁴ Honeybees alone contribute an estimated \$20 billion to the U.S. economy^{35,36} and \$217 billion to the global economy.³⁷ Seventy-one of the 100 crops that provide 90 percent of the world's food are pollinated by bees.³⁸

There are clear steps retailers can and must take to address food production threats associated with overuse of pesticides, satisfy consumer demand for healthy and environmentally conscious food, and ensure a sustainable food supply into the future.

If grocery stores took the actions detailed below, we could eliminate the use of hundreds of millions of pounds of toxic pesticides in the U.S. and around the world and rapidly shift to organic and other ecological farming systems. This push for bee-friendly food would be a huge win for pollinators, people and the planet.

Friends of the Earth is asking retailers to:

Prioritize pesticides of concern

Many of the pesticides commonly used in U.S. agriculture are toxic to bees and other beneficial insects. Among the **pesticides** that are of highest concern are neonicotinoids, glyphosate and organophosphates, including chlorpyrifos.

U.S. agriculture is 48 times more toxic to bees and other beneficial insects than it was before neonicotinoid insecticides were first commercialized in the 1990s according to a peer-reviewed study co-authored by Friends of the Earth.

Since we began using neonicotinoids 25 years ago, U.S. agriculture has become 48 times more toxic to bees and other insects according to a peer-reviewed study co-authored by Friends of the Earth.³⁹

Chlorpyrifos poses risks to 1,800 critically threatened or endangered species and is one of the most toxic pesticides for bees.⁴⁰

Glyphosate is decimating Monarch butterfly populations by destroying the milkweed plants their young depend on.⁴¹ Glyphosate can also disrupt bee gut microbiomes, linking it to declines in bee populations.⁴²

Expand organic offerings

Organic is the gold standard for pesticide reduction. Organic farmers grow abundant food without the use of an estimated 900 pesticide active ingredients allowed in non-organic farming, including neonicotinoids, glyphosate and organophosphates.⁴³ Research shows that organic farming benefits pollinators, people and the planet.

- •**Pollinators:** Organic farming can help reverse pollinators declines.⁴⁴ Organic farms support up to 50% more pollinating species than pesticide-intensive farms and help other beneficial insects flourish.^{45,46,47}
- •**Health:** An organic diet rapidly and dramatically reduces people's exposure to toxic pesticides and protects farmers and farmworkers from exposure. 48,49,50
- **Climate:** Organic farming systems conserve water, reduce greenhouse gas emissions, sequester carbon in the soil and increase farmers' resilience in the face of drought and floods. 51,52,53,54

Pesticide levels in people's bodies dropped up to 95% after just one week on an organic diet according to a peer-reviewed study co-authored by Friends of the Earth.

Grow U.S. organic

U.S. production of organic crops is not keeping pace with growing consumer demand.⁵⁵ The gap is increasingly being filled by tens of millions of dollars' worth of imports.⁵⁶ Grocery retailers can help expand organic agriculture in the U.S. by supporting farmers during transition, prioritizing products from domestic organic farmers, and pushing for public policies to advance the U.S. organic sector. This would be a win-win-win: retailers will ensure a steady supply of high-quality organic products, U.S. farmers and local communities will get an economic boost and U.S. agriculture will become more pollinatorand climate-friendly.⁵⁷

Support non-organic farmers to shift to least-toxic approaches

Companies' pesticide reduction goals in non-organic supply chains must go hand-in-hand with helping farmers to adopt the ecological farming methods that underpin robust integrated pest management and regenerative agriculture systems. These farming methods reduce the overall need for pesticides. Phasing out hazardous pesticides without shifting production practices is likely to result in regrettable substitution, replacing one type of hazardous pesticide with another.

Support public policies

We need far-reaching changes in our food system to respond to the biodiversity and climate crises we're facing. We cannot rely on market change alone. There is a great need for company leadership in Washington D.C. to advance public policies aimed at reducing use of toxic pesticides, protecting pollinators and spurring a rapid shift to organic and regenerative agriculture in the U.S.

How companies shape up

To highlight leaders and laggards, Friends of the Earth created a retailer scorecard benchmarking 25 of the largest U.S. grocery stores on pesticides and pollinator health.

We evaluated four criteria related to pesticide use in companies' food and beverage supply chains: policies, implementation, transparency and collaboration. Additional points were awarded for companies with complimentary pesticide policies in their home and garden supply chains.

We looked at whether these companies are setting goals to reduce use of key toxic pesticides, what they are doing to increase organic offerings and whether they are taking steps to support non-organic farmers to shift to least-toxic approaches. We also looked at whether they are educating consumers about these issues and if they are using their power to advocate for public policies that shift government support from pesticide-intensive agriculture to organic and ecological farming systems.

Grades were assigned based on publicly available information concerning retailer policies and self-reported information concerning retailer practices. We reviewed company websites, annual reports, SEC filings, corporate social responsibility and sustainability reports, press coverage and industry analyses. We also reached out to retailers, giving them an opportunity to review their draft score and provide additional information. The following companies responded: Ahold Delhaize, Albertsons, Aldi, Amazon, BJ's Wholesale, Costco, CVS, Giant Eagle, H-E-B, Kroger, Trader Joe's, Walmart, and Whole Foods. Dollar Tree and Dollar General responded via collaborating organization Campaign for Healthier Solutions, which has an ongoing dollar store campaign.

I Friends of the Earth used the Supermarket News 2019 Top 75 Retailers and Wholesalers report to determine which companies are among the top 25 U.S. grocery retailers. Although Amazon acquired Whole Foods in 2017, we graded these companies separately given that Whole Foods still maintains distinct policies and a substantially different business model. 508 of Amazons' 533 brick-and-mortar grocery locations are Whole Foods stores. The remainder are Amazon Go stores.

COMPANY	GRADE	TOTAL POINTS
Whole Foods	С	73
Costco	С	73
Giant Eagle	D+	52.5
Rite Aid	D+	49
Albertsons	D	44
Aldi	D	43.5
Kroger	D	39
Trader Joe's	D	37
Ahold Delhaize	F	20
cvs	F	17.5
Target	F	15
Wegmans	F	15
Amazon	F	13
Walgreens	F	13
Walmart	F	11.5
Н-Е-В	F	11
BJ's	F	9
Dollar General	F	5
Dollar Tree	F	5
Hy-Vee	F	5
Wakefern	F	0
7-Eleven Inc.	F	0
Meijer	F	0
Publix	F	0
Southeastern Grocers	F	0

We found that:

Pesticide reduction to protect biodiversity and human health lags behind other sustainability goals in the food retail industry.

While 23 of 25 companies evaluated have policies related to energy and climate, just six have taken steps in the right direction on agricultural pesticides.

Giant Eagle has the leading pollinator health policy.

Giant Eagle's new pollinator health policy states the company's commitment to work with suppliers to eliminate use of neonic pesticides in its produce supply chain. This makes Giant Eagle the first food retailer to set a measurable goal for pesticide reduction.

Six major grocery retailers have pollinator health policies.

Giant Eagle, Albertsons, Aldi U.S., and Rite Aid established new pollinator health policies this year, joining Costco and Kroger. With these announcements, three of the four largest grocery retailers in the U.S.-Costco, Kroger and Albertsons — have policies. This demonstrates important momentum amongst grocery retailers to protect bees and other beneficial insects that their food supply chains depend on. However, other than Giant Eagle, none of the policies set measurable commitments for pesticide reduction; they encourage food and beverage suppliers to reduce use of pesticides of concern and to shift to least-toxic approaches. The policies also state that the companies are committed to expanding their bee-friendly organic offerings. Whole Foods, which used to have the industry-leading policy on pesticide reduction as part of its discontinued Responsibly Grown program, no longer has a pesticide or pollinator health policy.

Top grocery stores are failing to set measurable goals to reduce toxic pesticide use in their food supply chains.

Only Giant Eagle has set a measurable goal to reduce use of toxic pesticides. To save bees and other beneficial insects, companies must make measurable commitments to phase out pollinator-toxic pesticides in their supply chains immediately.

Top grocery stores don't know which pesticides are being used in their supply chains or how much is being used.

In the U.S., only the state of California tracks and reports on agricultural pesticide use. This means that grocery stores need to first survey their suppliers in order to understand how to set measurable goals for pesticide reduction. Just three companies have taken first steps on this criteria. Costco and Whole Foods have pilot-level pesticide tracking programs through their participation in the Equitable Food Initiative. Aldi requires suppliers of key commodities to disclose whether they use chlorpyrifos and neonicotinoids.

Top grocery stores must step up to support conventional growers to shift to least-toxic approaches.

Only Costco and Whole Foods report having pilot-level programs in place to provide training and other meaningful support to non-organic growers to shift to least-toxic integrated pest management approaches through the Equitable Food Initiative.

Companies must disclose organic sales data and include organic sales in formal sustainability goals.

Most companies are not disclosing their organic sales data, which makes it difficult to assess their growth and competitive advantage in this marketplace.

- Ahold Delhaize, Albertsons, Costco, CVS, Kroger and Target publicly reported expanding organic offerings within the past three years.
- Only Whole Foods, Trader Joe's and Ahold Delhaize publicly provide organic sales data. Whole Foods reports that over 30% of overall sales are organic, Trader Joe's reports that over 20% of overall products sold are organic, and Ahold Delhaize reports that 3% of total food sales were organic as of its 2019 annual report.
- Only Ahold Delhaize and Aldi include organic sales in company key performance indicators or formal

sustainability criteria. None of the companies we evaluated include pesticide reduction in formal sustainability criteria.

Some companies report organic and "natural" sales together, significantly confounding the data.
 Organic is a robust, federally regulated standard whereas "natural" is not a regulated label claim, has no clear definition, and has no meaning in relation to use of pesticides or other synthetic inputs in farming. We recommend that companies track and report organic and "natural" sales separately to provide more transparency around organic sales data.

Whole Foods and Trader Joe's are leading on organic as a percent of overall grocery sales.

It is difficult to compare organic sales between grocery stores. While some of the largest retailers can claim the highest total organic sales – for example, as of 2015, Costco reportedly surpassed Whole Foods as the largest organic grocer by reaching \$4 billion in annual sales, 58 and Albertsons' house brand O Organics hit \$1 billion in sales in 201859 – we attempted to evaluate the extent to which companies have made organic central to their business model by assessing organic as a percent of overall grocery products or sales.

Independent grocery stores far surpass the largest U.S. food retailers on organic as a percent of overall sales.

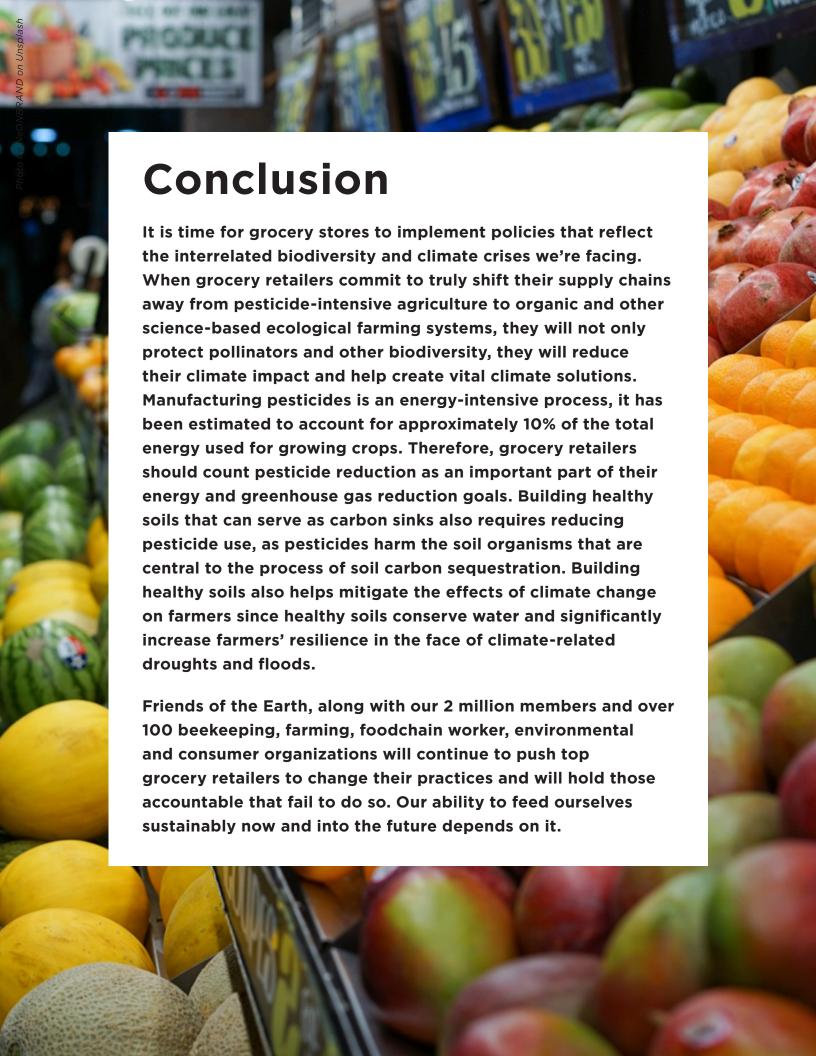
In addition to our evaluation of 25 of the largest U.S. grocery stores, we conducted a survey of 36 independent food retailers across the country in order to provide insight on companies that have made organic central to their values and business. Ninety four percent of these retailers (34 of 36) report exceeding the benchmark that Friends of the Earth has challenged top grocery stores to meet: increasing certified organic offerings to 15% of total sales or products. Sixty-four percent (23 of 36) report that over 50% of their total sales are organic. These retailers are leading the way on offering consumers bee-friendly food and are helping to reduce the use of toxic pesticides on farms in the U.S. and beyond.

Companies must support the expansion of organic agriculture in the U.S.

Only Whole Foods, Costco and Wegmans report taking measures to expand U.S. production of organic food. Costco reports working with U.S. farmers and ranchers to transition land to organic production. Wegmans operates its own research-oriented organic farm to educate farmers about best practices. Whole Foods reports the most extensive set of practices supporting U.S. organic growers, including committing to price floors for farmers in transition to organic, providing financial support for organic and family-scale farmers via loans and investing resources in educating suppliers about organic practices and how to transition. Whole Foods was also the only company to report that they advocate for federal policies that support strong organic standards and increased funding for organic research. This is critical, as U.S. farmers are currently being left behind as demand for organic food far outstrips supply.

Nine companies have pesticide policies in their home and garden supply chains.

Agriculture accounts for the vast majority of pesticide use, however, companies are also taking important steps to protect pollinators in their home and garden supply chains. Costco no longer sells products containing neonicotinoids in its U.S. locations or products containing glyphosate in any store locations worldwide. Walmart has eliminated almost all garden products containing neonicotinoids, CVS and Ahold Delhaize have committed to end sales of Roundup and other products containing glyphosate and Whole Foods does not sell garden products containing neonicotinoids or glyphosate. In addition, Giant Eagle, Costco, Aldi, Kroger, Walmart, and BJ's Wholesale Club have committed to greatly reduce or eliminate the sourcing of plants and/or flowers that have been treated with neonicotinoids.



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