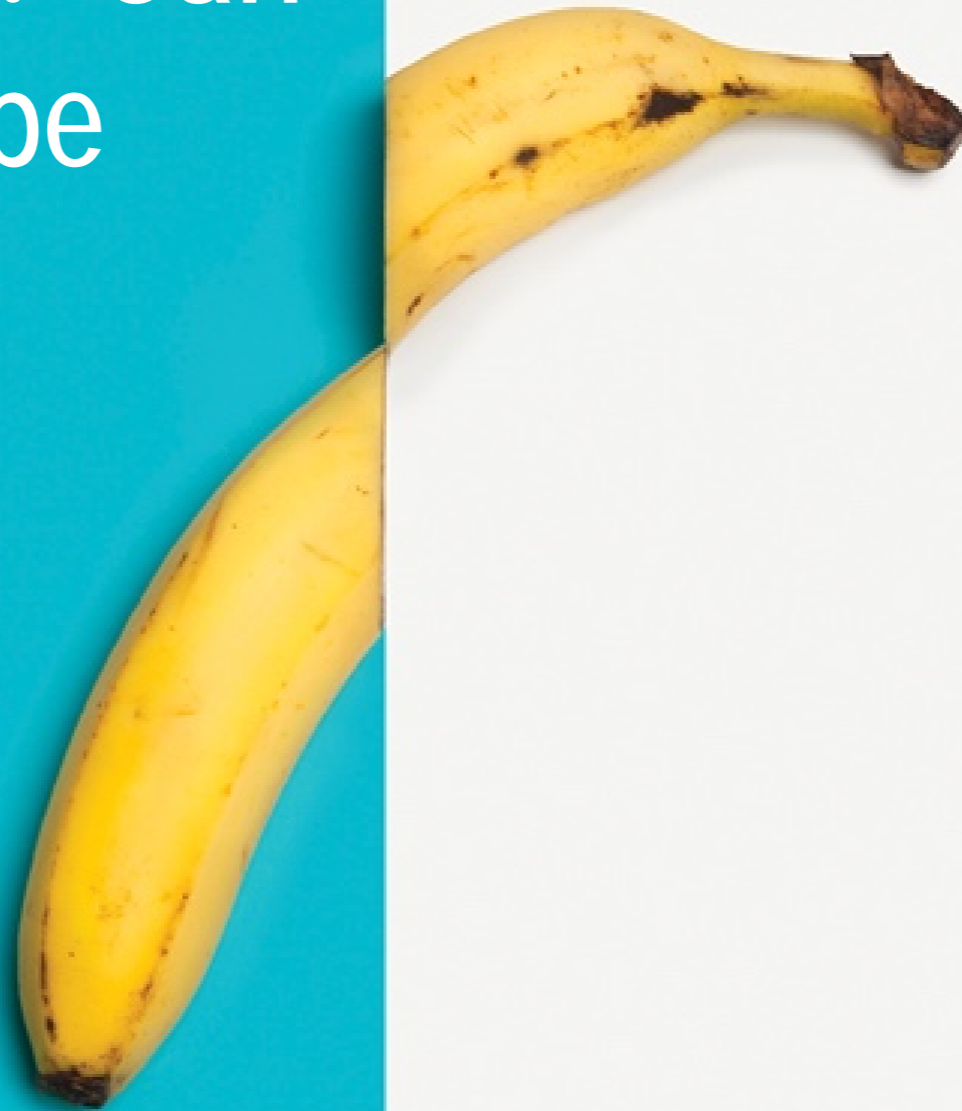


Wasting Away: Can Wasted Food be Curtailed?



NRDC

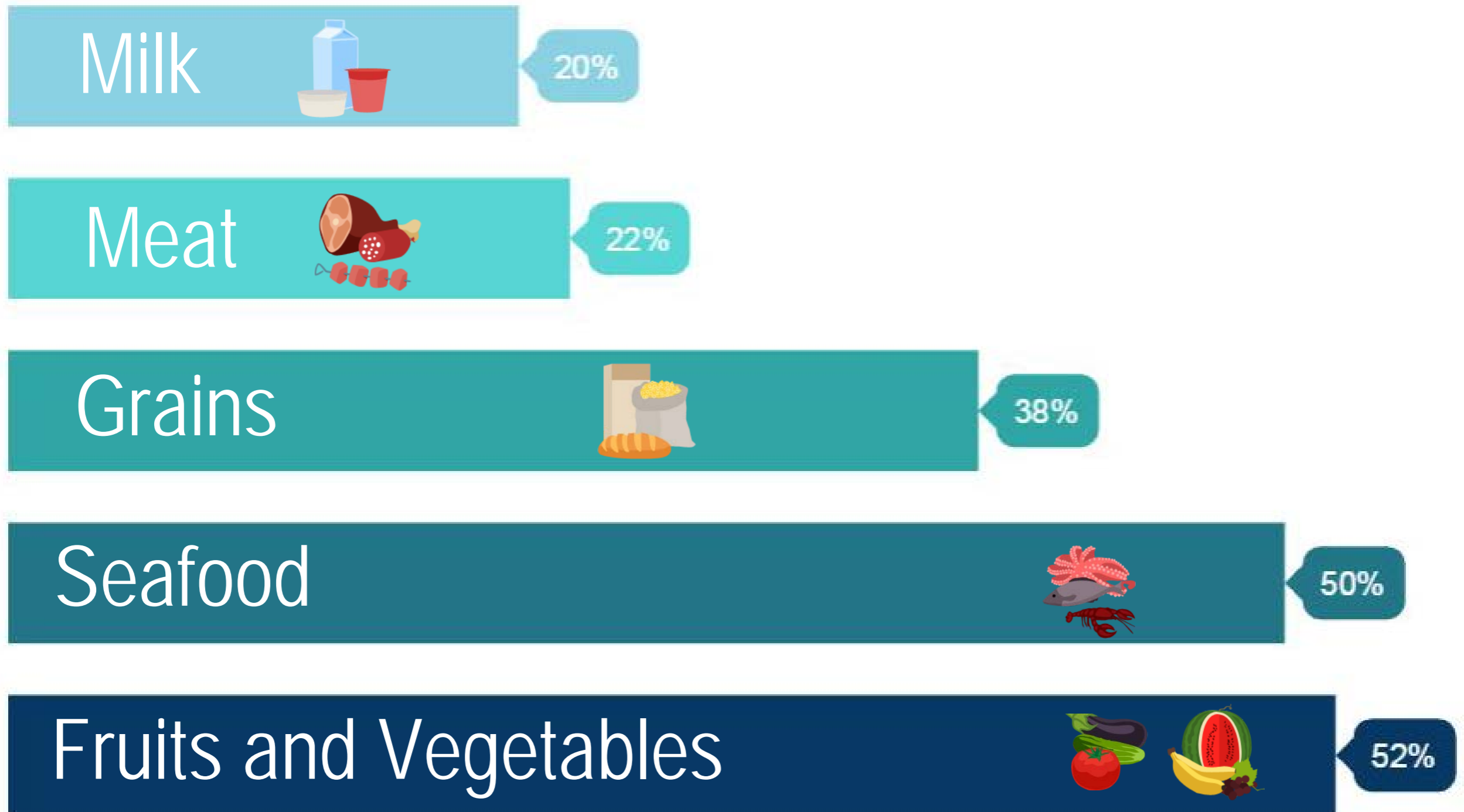
Erik D. Olson
Director, Health Program



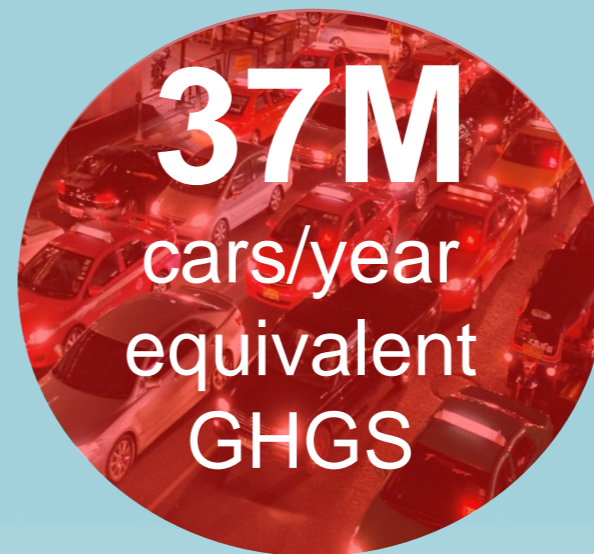
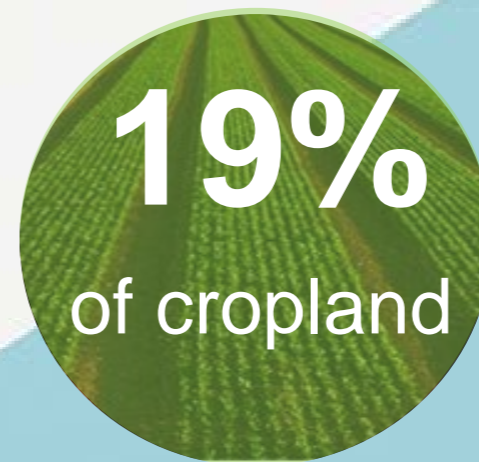


40%
of all food
goes uneaten –
enough to feed
164 million people

What gets wasted?





















And it's not just the food that is wasted....



Not all
wasted food
is equal

Water Required to Produce Certain Products, in Shower Minutes

PRODUCT	QUANTITY	WATER USE EQUIVALENT IN SHOWER MINUTES	 = 10 SHOWER MINUTES
Beer	8 oz/240 ml	4	
Tomato	1 lb/455 g	5	
Wine	4 oz/120 ml	6	
Milk	8 oz/240 ml	6	
Potato	1 lb/455 g	7	
Egg	1 egg	11	 
Banana	1 lb/455 g	42	
Apple	1 lb/455 g	43	
Pasta, dry	1 lb/455 g	44	
Rice, white	1 lb/455 g	60	
Personal pizza	26 oz/735 g	67	
Chocolate	4 oz/115 g	90	
Chicken	1 lb/455 g	104	
Cheese	1 lb/455 g	122	
Pork	1 lb/455 g	144	
Beef	1 lb/455 g	370	



95%

**OF FOOD WASTE IN MSW
GOES TO
LANDFILL OR INCINERATION**

Greenhouse Gas Emissions

If food waste globally were a country, it would be the third largest GHG emitter after China and the U.S.

①



②



③



Food Insecurity



New National Goal



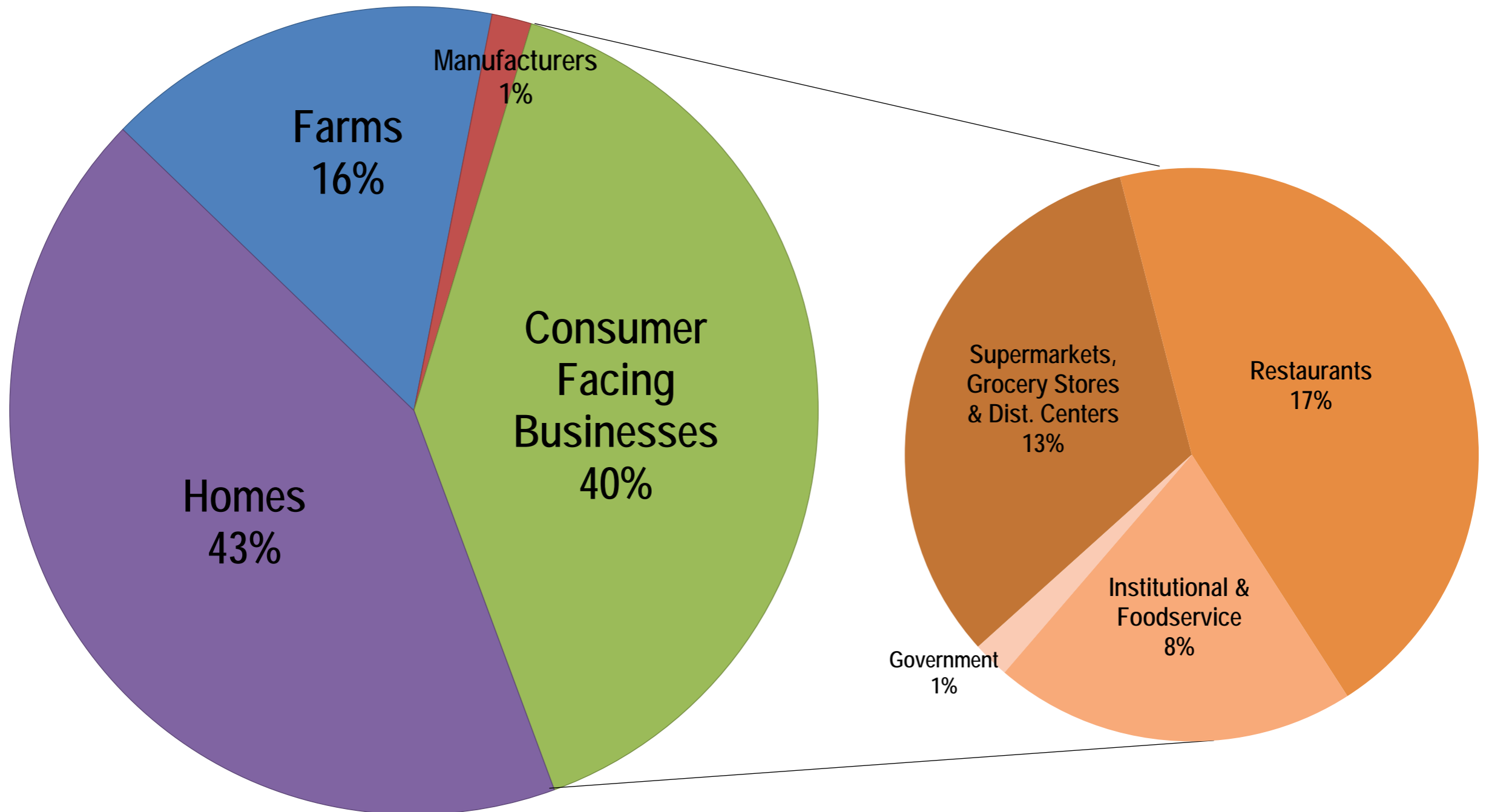
Reduce
food waste by

50%

by 2030

Where Food Waste Happens

Food Wasted By Weight - 63 Million Tons





Food Recovery Hierarchy

Most Preferred

Source Reduction

Reduce the volume of surplus food generated

Feed Hungry People

Donate extra food to food banks, soup kitchens and shelters

Feed Animals

Divert food scraps to animal feed

Industrial Uses

Provide waste oils for rendering and fuel conversion and food scraps for digestion to recover energy

Composting

Create a nutrient-rich soil amendment

Landfill/ Incineration

Last resort to disposal

Least Preferred

Priority Actions



Highest net econ value:

- **Consumer education**
- **Standardized date labelling**
- **Waste tracking & analytics**

Also need food rescue infrastructure and centralized composting

The business case for action:

WRI analyzed food waste reduction efforts at nearly 1,200 business sites across 17 countries and more than 700 companies, including food manufacturing, food retail, hospitality, restaurants and other food service. They found that:

“99 percent of the sites earned a positive return on investment.”

The median benefit-cost ratio—where half of the sites achieved a higher ratio while half achieved a lower ratio—was 14:1. In other words, half of the business sites earned greater than a 14-fold financial return on investment.”

Corporations are Innovating:

Ahold USA, Bon Appetit, Campbell Soup Co, Conagra, General Mills, Kellogg, PepsiCo, Sodexo, Walmart, Unilever, and YUM! Brands, among others:

Committed to national goal to reduce FW 50% by 2030.

Aramark:

Is installing FW tracking software across its 500 highest-volume food service locations in 2017.

Walmart:

Improved forecasting, packaging, alternative store displays and discounting some items close sell-by date. Also shifting all private-label products to standardized date labels, which it expects to eliminate 660 million pounds of food waste and avoid 900,000 MT GHG emissions.

Kroger:

Donated 83 million pounds of unsellable food in 2015.

Tesco:

Became the first U.K. retailer to publish data about their food waste for a full financial year (2014); it has committed to publishing annual, independently verified data going forward.

Cities and States are Mobilizing:

- **Restrictions** on landfilling of food waste:
CT, VT, RI, MA, CA
- Added **tax incentives** for food donation: AZ, CA, CO, IA, KY, MS, OR, VA and DC
- 2016 Conference of **Mayors resolution** aligned with national goal to reduce food waste 50% by 2030.
- **City level:** e.g. Nashville's holistic suite of food waste efforts



Consumers: 43% of Wasted Food



The average American family of four spends **\$1,800 on food** they throw away each year.

And most believe **they don't waste food...**

How can we help consumers be part of the solution?

SAVE THE FOOD.COM





SELF-IMPROVEMENT



COMFORT



SECURITY



THOUGHTFULNESS

GRAPPLING WITH GOOD INTENTIONS

Our aspirations to be good caretakers, generous hosts, healthy and adventurous eaters lead to food waste.

Need to disrupt, inform and inspire

So far....

- **Outreach to 33,000 media channels**
- **Garnered \$34 million in donated media to date**
- **Inviting partners:** cities, counties, colleges and universities, waste haulers, trade associations, grocery stores, restaurants, foodservices, K-12, faith groups, healthcare industry etc.
- **Free to download, opportunities to co-brand**



BEST IF USED.

40% OF FOOD IN AMERICA IS WASTED

COOK IT, STORE IT, SHARE IT.
JUST DON'T WASTE IT.

SAVETHEFOOD.COM



BEST IF USED.

**TRASHING ONE EGG WASTES
55 GALLONS OF WATER**

COOK IT, STORE IT, SHARE IT.
JUST DON'T WASTE IT.

SAVETHEFOOD.COM



Sealed Skinless Chicken Breast

BEST IF USED.



TOTAL PRICE
\$1,500.00

**A FAMILY OF FOUR SPENDS \$1500
A YEAR ON FOOD THEY DON'T EAT**

COOK IT, STORE IT, SHARE IT.
JUST DON'T WASTE IT.

SAVETHEFOOD.COM



BEST IF USED.

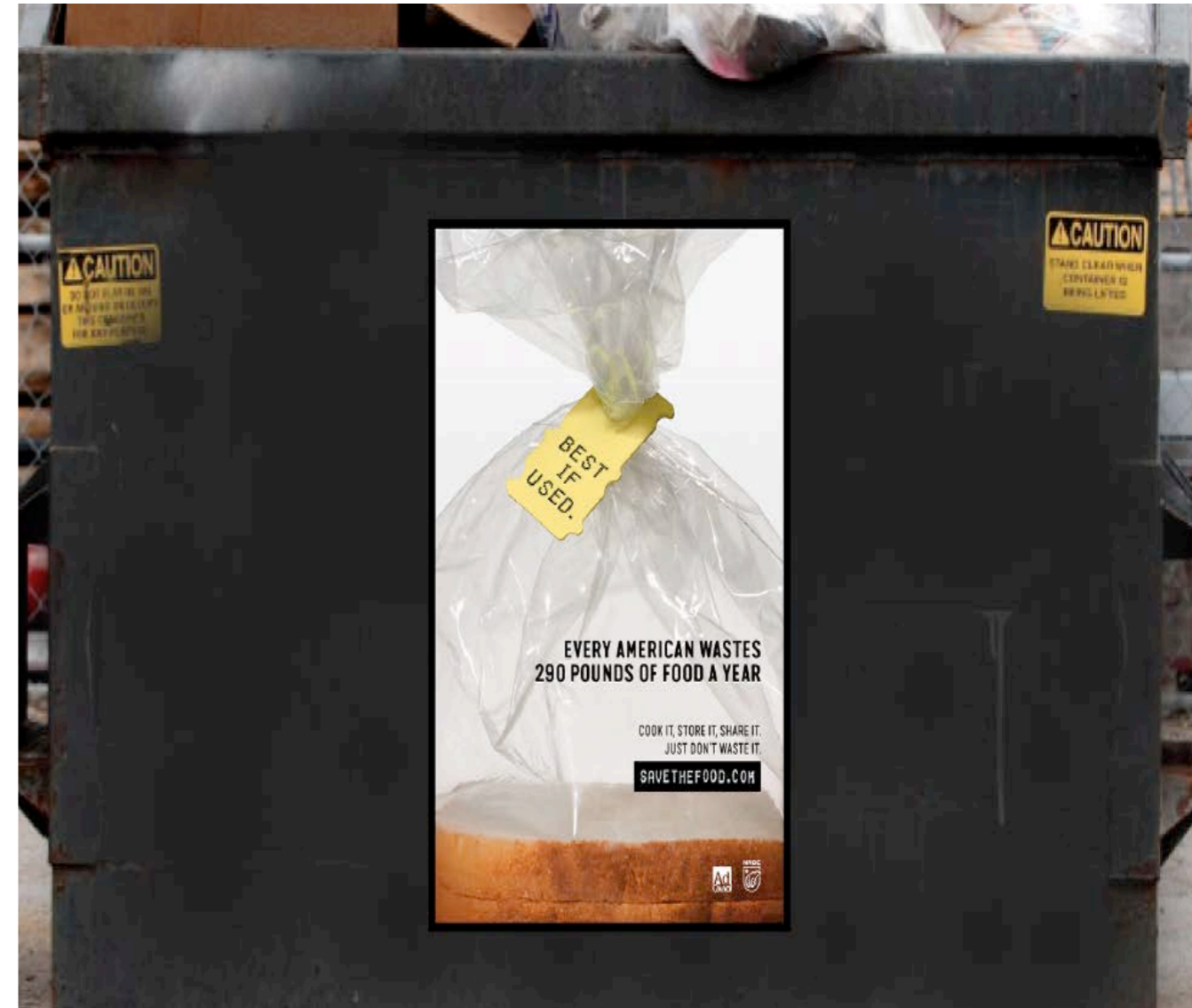
**EVERY AMERICAN WASTES
290 POUNDS OF FOOD A YEAR**

COOK IT, STORE IT, SHARE IT.
JUST DON'T WASTE IT.

SAVETHEFOOD.COM



TRASH FACTS: GUERRILLA TACTICS



TRASH FACTS: GUERRILLA TACTICS



**WASTE
FREE
KITCHEN
HANDBOOK**

A guide to eating well and saving
money by wasting less food

DANA GUNDERS

Additional NRDC Resources

- **Guidance for Investors** (with Trillium Asset Mgmt)
- Second edition of **“Wasted”** forthcoming soon
- **Baseline Waste and Rescue Potential in Denver, Nashville, NYC** (this fall)

 **NRDC** ISSUE PAPER
AUGUST 2012 IP:12-06-B

Wasted: How America Is Losing Up to 40 Percent of Its Food from Farm to Fork to Landfill

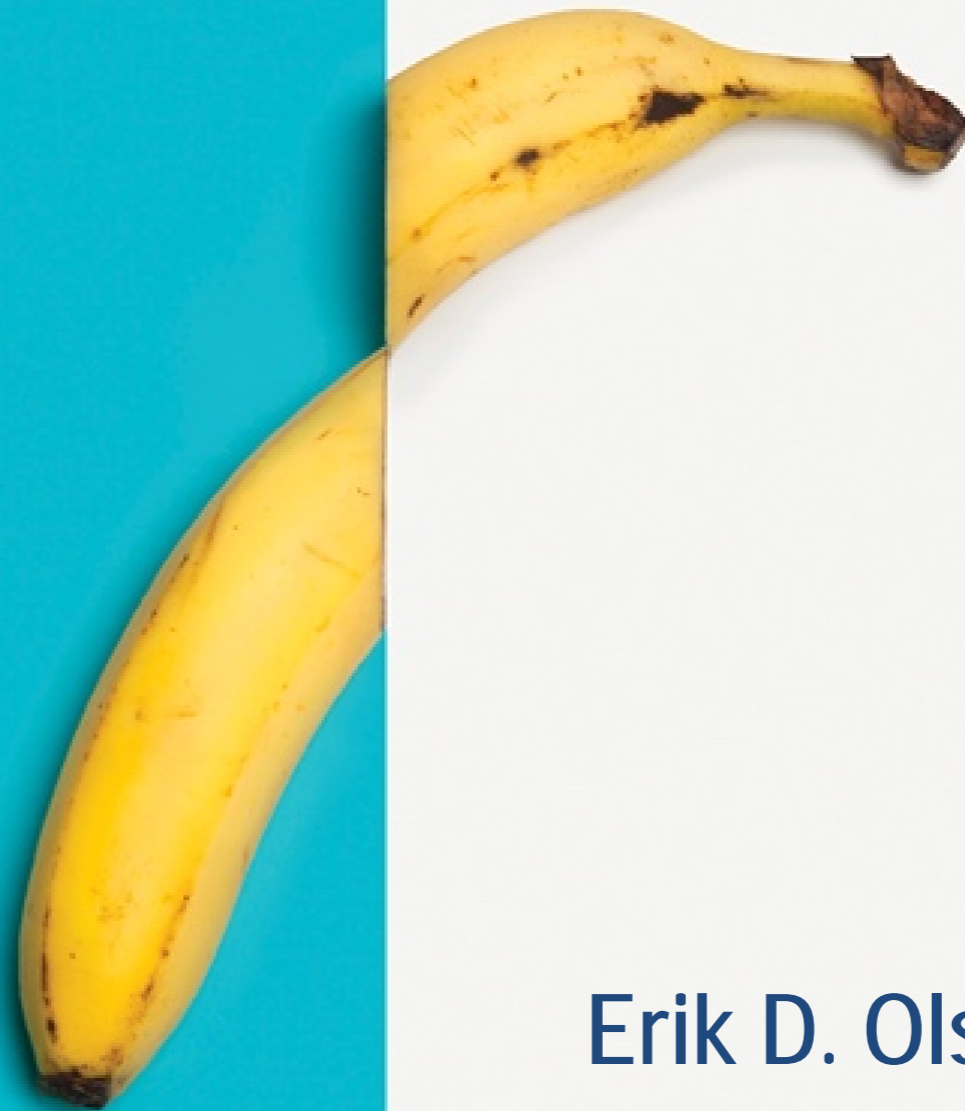
AUTHOR
Dana Gunders
Natural Resources Defense Council



Getting food from the farm to our fork eats up 10 percent of the total U.S. energy budget, uses 50 percent of U.S. land, and swallows 80 percent of all freshwater consumed in the United States. Yet, 40 percent of food in the United States today goes uneaten. This not only means that Americans are throwing out the equivalent of \$165 billion each year, but also that the uneaten food ends up rotting in landfills as the single largest component of U.S. municipal solid waste where it accounts for almost 25 percent of U.S. methane emissions. Reducing food losses by just 15 percent would be enough food to feed more than 25 million Americans every year at a time when one in six Americans lack a secure supply of food to their tables. Increasing the efficiency of our food system is a triple-bottom-line solution that requires collaborative efforts by businesses, governments and consumers. The U.S. government should conduct a comprehensive study of losses in our food system and set national goals for waste reduction; businesses should seize opportunities to streamline their own operations, reduce food losses and save money; and consumers can waste less food by shopping wisely, knowing when food goes bad, buying produce that is perfectly edible even if it's less cosmetically attractive, cooking only the amount of food they need, and eating their leftovers.



NRDC



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