

The background image shows a large industrial facility, likely a waste transfer station or recycling plant. In the foreground, a yellow excavator is working on a large pile of mixed waste. The facility has a high ceiling with structural beams and various pieces of equipment. The overall scene is dimly lit, with a dark overlay on the image.

Talkin' Trash

Myths and Realities of Garbage & Recycling

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What you'll learn today:

- History of recycling in Sunnyvale
- What happens at SMaRT Station
- Why recycling plastic is so complicated
- Food scraps recycling program
- What we can do to reduce waste

Sunnyvale Landfill - 80 Years

- Disposal site used ~1912-1993
- City contracts with Kirby Canyon Landfill builds SMaRT Station® (1990-93)
- Diversion from landfill in 1990: 18%
- SV Landfill closes, SMaRT opens (October 1, 1993)



History of Recycling in Sunnyvale



- 1982 - Resident-led "**Bag, Bundle & Curb**"
- 1993 - Yard trimmings pickup, SMaRT Station MRF opens
- 2001 - Dual-stream carts, trucks
- 2011 - Commercial food scraps
- 2017 - Residential food scraps



Recycling in Sunnyvale Today

- SMaRT processes 600 tons trash & recyclables per day, serves Sunnyvale and Mountain View
- Today, diversion is ~50%



Recycling in Sunnyvale Today

- Five streams collected from single-family households
 1. Garbage
 2. Food scraps
 3. Paper
 4. Containers (metal, glass, cartons, some plastic)
 5. Yard trimmings



Plus:

- Motor oil/filters, household batteries, & cooking oil
- Cardboard—flatten, tie/tape

Inside the SMaRT Station



Inside the SMaRT Station



SMaRT = Sunnyvale Material Recovery & Transfer Station



What happens to recyclables after collection?

- Machine & hand sorts remove contaminants
- Clean material compressed into "bales" at SMaRT
- Material shipped to manufacturers, made into new products



Bale of aluminum cans. Source: International Aluminum Today

I've heard there are challenges with recycling markets?

- Before 2018, most material shipped to China
- 2018 - China "National Sword"
 - Bans most foreign recyclables
 - Maximum **0.5%** contamination



Source: National Geographic

Why does that present challenges?



Source: UNESCO Bangkok

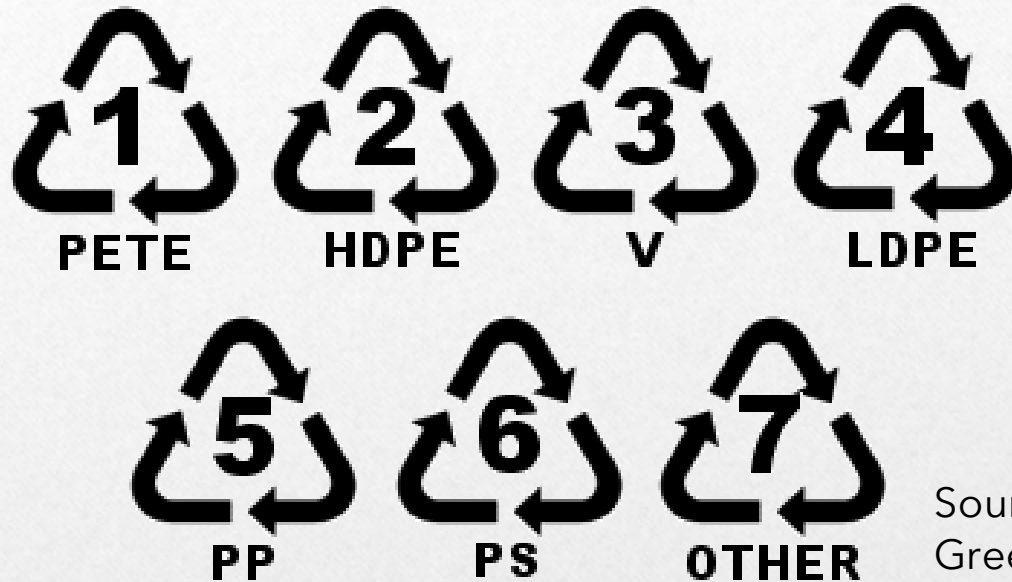
- US has had to find other markets
- Contamination is difficult to prevent - we rely on you to “keep it clean”



Plastics are Complicated

Source: Phys.org

Purpose of Numbered Triangles



Source:
Greenlivingtips.com

- "Chasing arrows" was first created for Earth Day art contest in 1970
- Now, plastic industry uses triangles/numbers for resin types
- Goal: sell more plastic, tell consumers it's the "right thing"

The Problem with Plastics is...

- Resin code #'s oversimplify—does not mean recyclable
 - There are actually hundreds of resin codes & polymers!
- MOST single-use plastics NOT accepted in recycling markets



Source: Canva

Examples of #1 PETE



- Water or soda bottle
- Recycle this!

Source: Stockton Recycles



- "Thermoform" clamshell
- Avoid, garbage

Source: Amazon.com

Single-use plastics and why they're problematic

- Production harms environment
- Only used for seconds
- U.S. generates more plastic than any country
- Less than 10% recycled
- Much ends up as litter on land/ocean



Source: Canva

What IS

Recyclable?

Recycle the

Nice Nine

Place these items in your recycling cart:



1
Plastic Bottles



2
Glass Bottles/Jars



3
Aluminum and Steel Cans



4
Plastic Tubs

Rinse containers, remove and recycle lids

Rinse containers, remove and recycle lids



5
Newspaper & Magazines



6
Cartons



7
Paper



8
Cardboard

Boxes must be broken down



9
Paperboard

No frozen food boxes

Avoid the

Dirty Dozen

Keep these out of your recycling cart:



Clamshells

Hinged and lidded

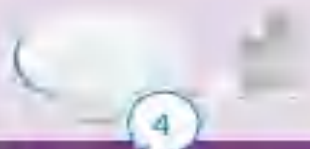


Plastic Wrap and Bags

Recycle at retail stores



Black Plastic



Ceramics/Glassware

No cookware,
serving dishes



Hot and Cold Cups

No cup lids or straws



Egg Cartons

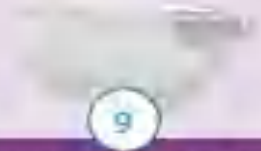
No paper, plastic or foam



Frozen Food Boxes



Padded Envelopes



Takeout Containers

No paper, plastic or foam



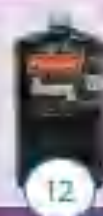
Food/Liquids

Empty food/liquids from recyclable
containers



Foam

No peanuts, packaging
or food trays



Propane Cylinders

Visit HHW.org
for disposal options



Sunnyvale

Please
REcycle,
don't
Wishcycle...



Source: Recycle Cartons Facebook page

What's Wrong with Wishcycling?

- Putting something in your cart **DOESN'T** mean it is going to get recycled
- Must be removed at SMaRT and sent to landfill
- Rule of thumb: When in doubt, throw it out AND memorize the Nice Nine 😊



Source: Apartment Therapy

Let's talk about food scraps recycling!

- Program for single family homes since 2017; multi-family starting in 2022!
- Accepts ALL food
- Leftovers, spoiled food
- Tea bags, coffee filters & grounds, even pet food
- NO paper products (e.g. napkins, paper towels, coffee cups)





Why separate food scraps?

- 40% of US food is wasted and never eaten
- Diverts **8,000** tons of food per year from landfill
- Food = methane in landfill, worsens climate change
- We use our food scraps to create **electricity!**

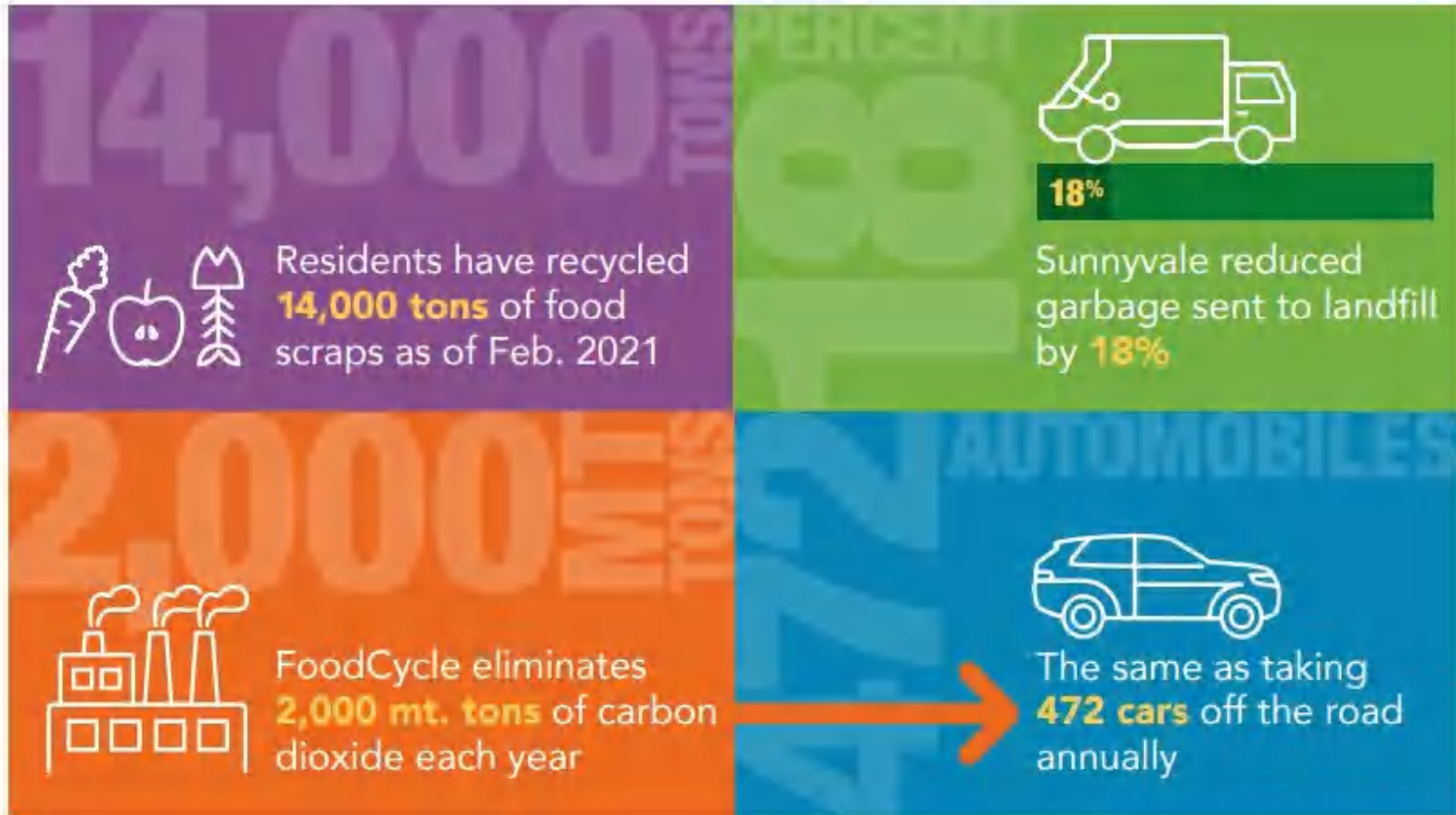
It's also CA State Law



SB 1383: Short-Lived Climate Pollutants

- Went into effect 2022
- Reduce amount of organics going into landfill by 75% by 2025
- Increase edible food recovery by 20% by 2025

FoodCycle Impact



Still not sure what to recycle? There's an App for that!

- App & web look-up tool
- Sunnyvale.ca.gov, How to Get Rid of Anything
 - Collection schedule
 - Street sweeping schedule
 - Order extra pick-ups
- OR, call our Recycling line: **408-730-7262**



What can you do to make a difference?

- Recycle right! (Nice Nine)
- Recycle all your food scraps
- Look for less/recyclable packaging
- Remove caps, dump liquids
- Go bulk shopping
- Refuse single-use plastics
- "Mend it, don't end it"
- BYO container for leftovers at restaurants



Source: Canva

Other Ideas?





Sunnyvale



Q & A

Looking for a New Year's Resolution?

Try making some zero waste swaps!



Aluminum Foil



Silicone Baking Mat



Plastic Bag



Reusable Bag



Plastic wrap



Beeswax wrap



Plastic Coffee Cup



Reusable Coffee Cup



Dryer Sheets



Dryer Balls



Plastic Utensils



Bamboo Utensils

Food scraps are turned into:



1. Fertilizer amendment that improves soil quality
2. FDA-approved animal feed ingredient for chicken, pigs, fish
3. Electricity (energy production) with anaerobic digesters

Challenges, cont.



Source: PR Newswire

- Recycling industries moving out of China
- Paper mills convert paper to "pulp," ship pulp to China

FoodCycle Video



New FoodCycle outreach campaign:

- Surveys have told us residents have challenges with:
 - Space in kitchen
 - “Ick” factor
 - Dirty cart
 - Remembering to separate
- New videos, ads and information starting in May
- Test outreach methods in pilot areas
- Continue using outreach that works!

