

City Recycling Update

October 10, 2023





Presentation Objectives

- Update Council and the community on the status of the City's recycling program and operations
- National v. local recycling landscape
- Brief history of Materials Recovery Facility (MRF)
- Recap of recent events and current recycling operations
- Sustainability and public engagement updates
- Behavior and recycling contamination updates
- Next steps and projected timeline





Recycling Landscape

- Recycling programs in rural and geographically isolated communities have and continue to be challenging
- Recycling is complicated and has become more confusing to the consumer
- Many communities have a misconception that recycling is “free” or makes money
- Post-collection recycling costs have seen large increases in the past 10+ years
- The Norton Environmental MRF and former City contract was based on now obsolete recycling models and processing equipment



History of the Flagstaff MRF

- 1998: Materials Recovery Facility (MRF) was constructed
- 1998-2023: MRF operated by Norton Environmental, Inc.
- 2017: National recycling markets changed dramatically due to China National SWORD policy
- May 2020: MRF Alternatives Analysis study completed
- October 2020: Council provided direction to pursue the transition of the MRF to a transfer of recyclables operation
- April 2023: MRF to Transfer Station Technical Report completed
- May 3, 2023: Norton facility was assumed by the City



Recycling in Flagstaff

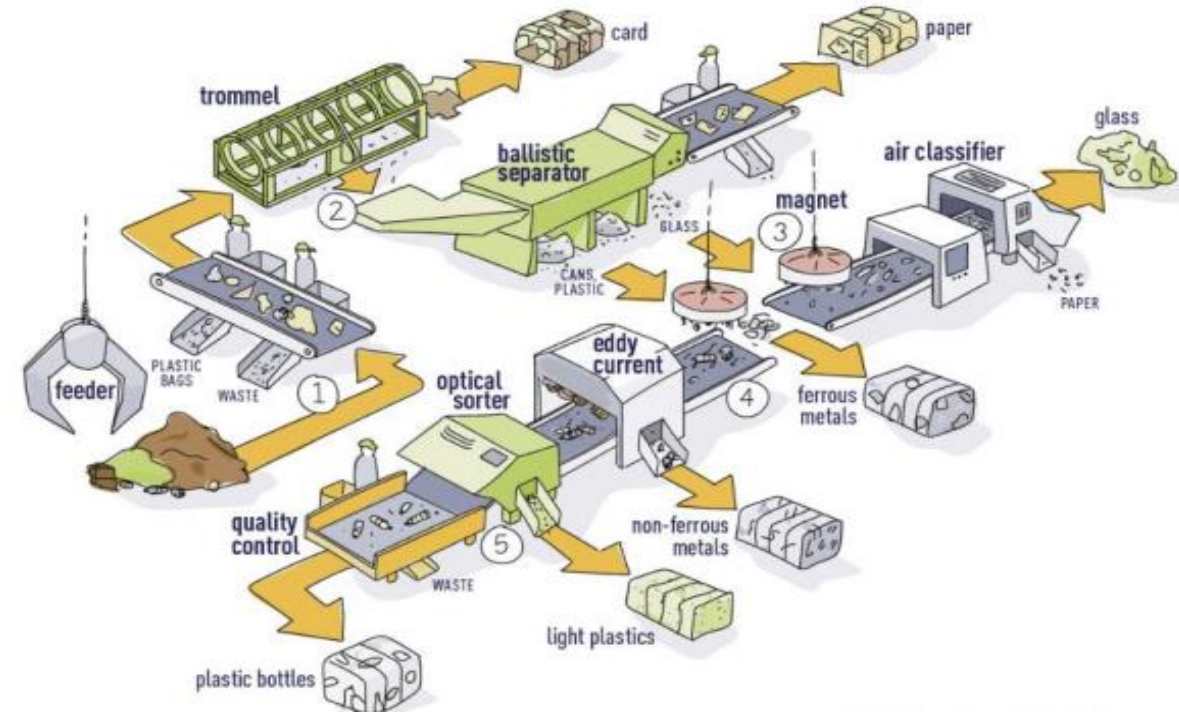


- The city has been operating the MRF as a recycling transfer facility since May 2023
- Public recycling drop-off sites are available for city and county residents
- City staff have developed a cross-departmental MRF Transition Team from nearly every city division
- All city divisions have been supportive in the transition with little disruption to our residents and businesses
- Continuous improvements are being targeted for the city's overall recycling program and we are still very much in a transitional period

MRF vs. Transfer Facility

Materials Recovery Facility (MRF)

- Mixed recyclables are deposited on tipping floor
- Conveyors used to move materials through processing/recovery system
 - Physical and mechanical sorting of materials by type
- Commodities are compressed into bales
- Baled commodities are marketed for sale and transport to recycling mills for manufacture into new products

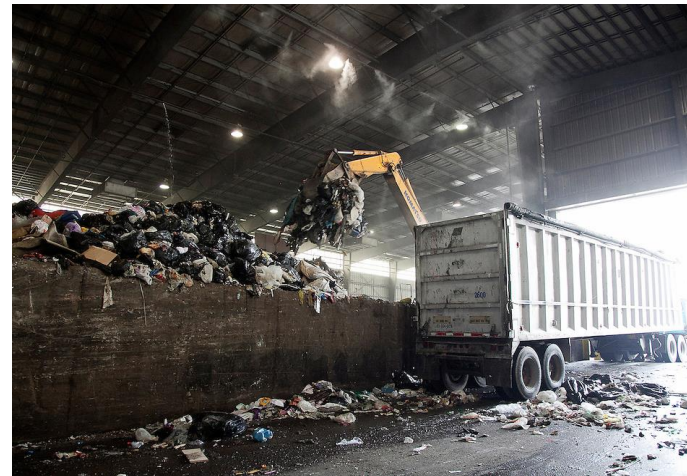




MRF vs. Transfer Facility

Recycling Transfer Facility

- Mixed recyclables are deposited on tipping floor
- Mixed recyclables are bulk loaded into large containers or semi-tractor trailers
- Bulked recyclables are transported to a MRF for processing and recovery





2023 Actions and Impacts

- April 26, 2023
 - Norton Environmental stopped accepting recyclables
- May 8, 2023
 - The City resumed all recycling operations and began using the Butler property as a recycling transfer facility
- May 18, 2023
 - The public recycling drop-off was reopened at the Butler facility

Hold onto your cans: Flagstaff recycling halts with sudden closure of facility

Services halted suddenly upon facility's closure

Adrian Skabelund Apr 27, 2023 11

Recycle pickup to resume Monday as city occupies facility, pays Norton \$75,000

City cans contract with Norton, takes over facility

Adrian Skabelund May 4, 2023 13





2023 Actions and Impacts

- **May-June 2023**
 - IGA developed with the City of Phoenix to deliver recyclables to their North Gateway MRF
 - An emergency hauling contract was used to facilitate the transport of recyclables to Phoenix
- **July 2023**
 - Six-month contract executed with Friedman Recycling for transport and processing
- **September-Present**
 - An RFP is being developed for the City's long-term recycling needs





Recycling Costs



Post-collection

	Norton Environmental (Former City Contract)*	Joe Dirt Excavating (Emergency Contract)	Friedman Recycling Co. (Current Contract)
Timeframe	Final Contract Year	May-June 2023	July-August 2023
Tons Transported/Processed	20,800 (Put-or-Pay)/6,732 (estimated)	871	1,009
Processing Costs	\$712,400	\$58,088	\$70,657
Equipment/Hauling Costs	N/A	\$284,072	\$88,992
Internal/Other Costs**	\$163,398	\$32,400	\$66,853
TOTAL COST	\$875,798	\$374,560	\$226,502
Cost per Ton	\$130	\$430	\$224

* Norton Environmental costs are extrapolated for the entire final contract year, which includes the put-or-pay provision in order to calculate the fully-burdened cost per ton.

** Internal/other costs include City staff labor and equipment. City hauling and disposal fees are included here for the former Norton Environmental operation where the City hauled MRF residual to the Cinder Lake Landfill for disposal.



Outreach Updates

• FLAGSTAFF RECYCLES •

Recycle items loosely in the bin, without a bag



**METAL
CANS & PANS**
empty & clean



**PAPER &
CARDBOARD**
flatten boxes



**PLASTIC BOTTLES
JUGS & JARS**
empty & clean

To learn more about recycling visit: flagstaff.az.gov/recycle or call 928.213.2153



Direct Outreach

NAIPTA Bus Advertisements:

- August - December 2023
- ~60,000 people engaged

KAFF Radio Advertisements:

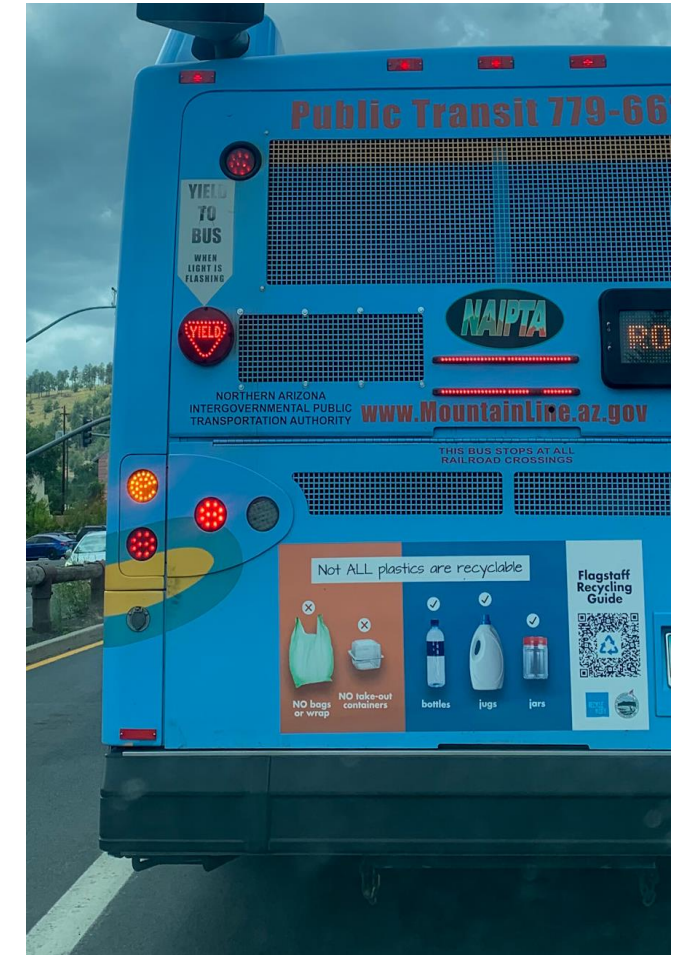
- June - September 2023
- ~6,300 people engaged

Recycling Education Tabling:

- June - July 2023
- 275 people engaged

Residential Bin Checks:

- May - July 2023
- 315 households engaged





Social Media Outreach


#FlagstaffRecycles started July 2023

- Graphic-based & video-based posts
- Different types of posts to engage different audiences





Social Media Engagement

 **Karen Rhode**
Thank you for getting the message out. Not everyone knows these things and they just need to be educated

7w **Love** Reply Hide 1 ❤️

 **William Seven**
Awesome post!

6d **Love** Reply Hide 1 ❤️

 **Socorro Ortiz**
Nice job 🙌

6d **Love** Reply Hide 1 ❤️

 **Christina Marie**
I appreciate this information, because some things I thought that were recyclable, aren't. I wouldn't have known if it wasn't for you bringing this awareness. Thank you all! [Flagstaff Sustainability Office](#) [Flagstaff City Government](#)

2w **Love** Reply Hide 2 🙌❤️


A **Al W.** • Christmas Tree Estates • 2w
This Public Service Announcement is spot on! However, until we have enforcement- especially Commercial accounts- progress will be slow.

 **Vanessa Lawson**
Excellent PSA! DO MORE!! Sharing Flagstaff Westside

5w Like Reply 1 🙌

 **Susan McCullough**
[Joan Richardson](#) I didn't realize this!! Good to know!

7w **Love** Reply Hide 2 🙌❤️

 **Annie D.** • Lake Mary • 6d
I wish more people would pay attention to what is recyclable and what in't. Thin plastic bags clog the machines and make it much harder for staff. It holds up production. Please post more info about recycling! I can't believe the things people put in their bins :(

C **Carolyn and Neil G.** • Cherry Hill • 5w
Community Engagement Specialist [Samantha Victor](#) Thanks for the information. It's great to have the city reaching out to inform and educate so be can try to get our recyclables actually recycled. Hope this continues

Like Reply Share 5 ❤️

 **Karla Kennedy**
[David McIntire](#) bringing the knowledge!

3w **Love** Reply Hide 2 🙌❤️

Follow & Share!



[Linktr.ee/FlagstaffCityGovernment](https://linktr.ee/FlagstaffCityGovernment)



Outreach Strategy – Next Steps

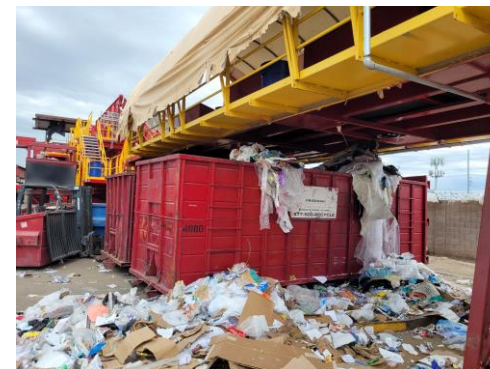
- A broader outreach strategy to expand our reach:
 - Flagstaff Local "My Actions Matter" Campaign
 - Print and digital ads (targeted at residents, businesses, and visitors)
 - Media interviews and articles
 - Continued organic and paid social media
 - Community events and open houses
 - Educational materials (fridge magnets, stickers)
 - Collaboration with community partners
 - Creative campaigns – creating names and personalities for bins, holiday-themed engagement (Halloween, Black Friday) and more!





Community Behaviors

- Recent materials audit completed by Friedman Recycling on August 21, 2023
 - 53 tons of residential and commercial recyclables from City were audited
 - Lower than anticipated contamination rate
 - 20% --> Good News!
- Top contaminants observed
 - Plastic bags and film
 - Polystyrene (styrofoam)
 - Textiles (clothes, shoes, stuffed animals)
 - Trash





Next Steps & Projected Timeline



RECYCLE



RECYCLE



METAL CANS & PANS

Empty & clean.

PAPER & CARDBOARD

Flatten cardboard.

PLASTIC BOTTLES, JUGS & JARS

Empty & clean. No other plastics.



No Plastic Bags*



No Glass*



No Hoses, Cables



No Aerosol Cans



No Needles

*Plastic bags can be recycled at grocery stores. Separate glass recycling is available, contact us for details.

Contact us at 928-213-2110 or visit www.flagstaff.az.gov/recycle





Timeline

Fall 2023

- Maximize Friedman operational efficiencies and capacity
- Identify additional resources needed to optimize current operations
- Issue RFP solicitation for longer-term recycling needs

Winter 2023-2024

- Evaluation of recycling RFP responses
- Cost analysis and understanding of recycling program and city support
- *Council award(s) for recycling services*

Spring 2024

- Former MRF processing equipment decommissioning and auction
- Transition to longer term contract

COMMUNITY ENGAGEMENT / EDUCATION & OUTREACH



RFP Goals and Objectives

- Identify the most efficient and cost-effective means and methods to operate the Butler facility and support the City's ongoing post-collection recycling needs
 - Facility operations
 - Material densification
 - Transportation/hauling
 - Material processing/recovery
 - Material rebates/marketing





Questions and Discussion

• FLAGSTAFF RECYCLES •

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