trashblitz x LITTERATI

AUSTIN REPORT

2021

INLAND OCEAN COALITION

INTO THE SEA

L

LEADING ORGANIZERS

The 5 Gyres Institute

The 5 Gyres Institute is a leader in the global movement against plastic pollution with more than 10 years of expertise in scientific research and engagement on plastic pollution issues. Since 2009, the team has completed 19 expeditions, bringing more than 300 citizen scientists, corporate executives, brands, and celebrities to the gyres, lakes, and rivers to conduct first-hand research on plastic pollution.

Litterati

Litterati empowers anyone to identify, map, and collect the world's trash, while also connecting to a broader community of associated brands, cities, schools, and individuals. Using AI technology, Litterati applies geospatial data science to uncover where and why littering is occurring so that effective solutions can be implemented to reduce it at the source.

Into the Sea

Into the Sea is a service-based nonprofit bringing awareness to plastic pollution in the ocean. Working collaboratively with community partners to organize trash cleanups, community-building events, and in-depth educational trainings. Into the Sea has been an organizing partner of TrashBlitz since its second iteration in Denver, Colorado in 2020.
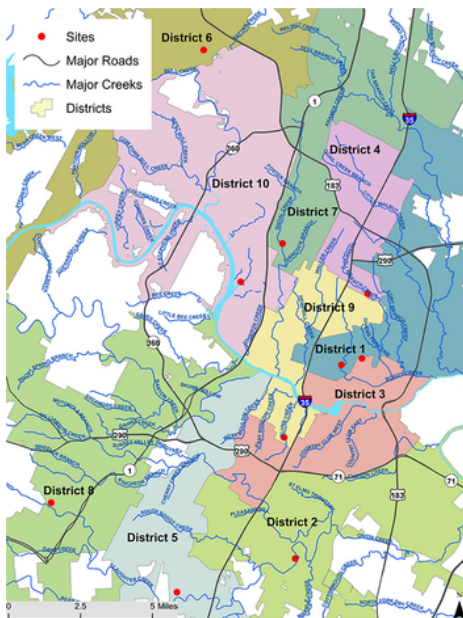
Inland Ocean Coalition

The Inland Ocean Coalition's unifying charge is to develop a two-way relationship with the ocean and the inland. Those who live among mountains, rivers, and inland cities have a direct impact on the cycles of life in the ocean. As the nation's first Inland Ocean Movement, the goal is to be a wellspring for literacy and community engagement across North America.

trashblitz x LITTERATI

PROJECT GOALS

May 22 - June 12, 2021

TrashBlitz is a community-based initiative that utilizes a network of NGOs, volunteers, and local projects to collect data that can be used to support better policies around plastic production, usage, and disposal. The 5 Gyres Institute partnered with Litterati, Inland Ocean Coalition, and Into the Sea to execute TrashBlitz Austin, along with 78 trained citizen science researchers.

A City of Creeks: A creek in every Council District in Austin City

Over a three week period, 168 community members from all over the city joined forces in collecting information on urban waste - categorized by type, material, and brand. Volunteers helped collect data from 80 randomly selected sampling points across Austin, TX in order to determine where a relevant trash problem existed.

Recognizing the value of their AI-powered waste data, the #TrashBlitzAustin team commissioned Litterati's Professional Service & Data Science Teams to conduct research on single-use plastic items with the intersection of land use types, population density, and watersheds. Their ANALYZE Researcher tools and methodology were used to generate in-depth looks at how trash moved throughout the city.

trashblitz x LITTERATI

FINDINGS

6,656 total pieces of litter were observed in Austin

- Almost 70% of trash was plastic

- Drinkware (1,238) and food-related waste (969) comprised a combined 33.33% of total trash

- Smoking-related items (1,323) made up 19.9% of total trash

- Uncategorized pieces (2,563), including plastic fragments, composed 38.5% of total trash

- Face masks made the top 10 list of *plastic* items found

- Single-use items were prevalent in open spaces, parks, and commercial and civic areas

- The highest concentrations of plastic were found at Walnut Creek, Shoal Creek, and Lady Bird Lake watersheds

Items   Top 10

Items	count	percent
Cigarette butt	1,289	31.5%
Wrapper	909	22.2%
Bottle cap	286	6.99%
Bottle	201	4.91%
Label	198	4.84%
Can	171	4.18%
Lid	146	3.57%
Cup	123	3.01%
Bag	98	2.39%
Straw	89	2.17%

Brands   Top 10

Brands	count	percent
Coca-Cola	34	0.51%
Marlboro	25	0.38%
McDonald's	23	0.35%
Swisher Sweets	21	0.32%
Gatorade	16	0.24%
Taco Bell	16	0.24%
Bud Light	15	0.23%
Corona	14	0.21%
Modelo	11	0.17%
Budweiser	10	0.15%

trashblitz x LITTERATI

COMMUNITY APPROACH

Communities care

Austin's 168 volunteers got involved in TrashBlitz because they noticed an increase in trash on the streets of their city and wanted to find out why.

Larry Franklin, founder of Black Lives Veggies, makes sure to incorporate sustainability into his organization's mission to help contribute toward positive change. Larry sees plastic pollution as a **"huge crisis"** and is greatly concerned for his community and the amount of trash that's in it. He chose to participate in TrashBlitz Austin to make his environment a better place for those who come after him.
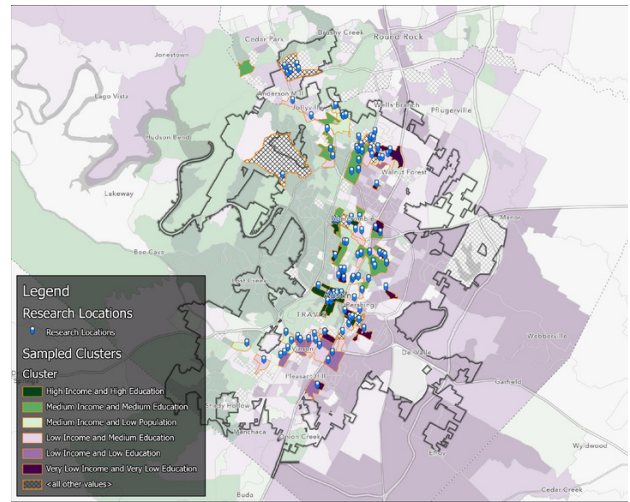
Nevia Lopez believes TrashBlitz can inspire communities to repair our systems. **"I think it raises awareness of how the systems that we currently have in place here really aren't doing the best job that they could be. I love that TrashBlitz is gathering data to hold companies accountable to figure out ways that everybody, whether it's a person picking up trash or a big corporation, can work together to clean up our planet."**
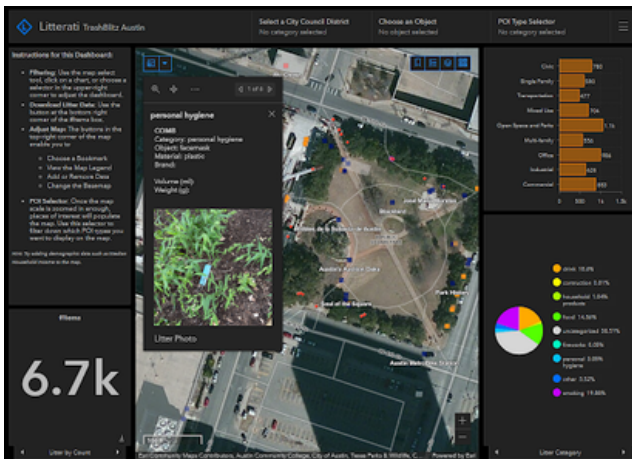
trashblitz x LITTERATI

METHODOLOGY

Robust data collection using Litterati's AI

Litterati identified census block group clusters with statistically similar demographic profiles to generalize findings of the amount and composition of Austin's trash. Data was collected from about 13 miles of linear sampling across research locations, covering a diverse and representative set of sociodemographic areas throughout the city.

For further information on the full functionality of Litterati's platform and technology, click here.

Take a deeper dive into Litterati's research portals

ArcGIS Online Dashboard
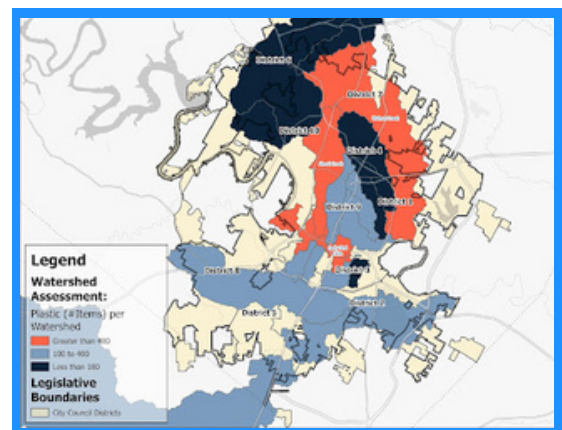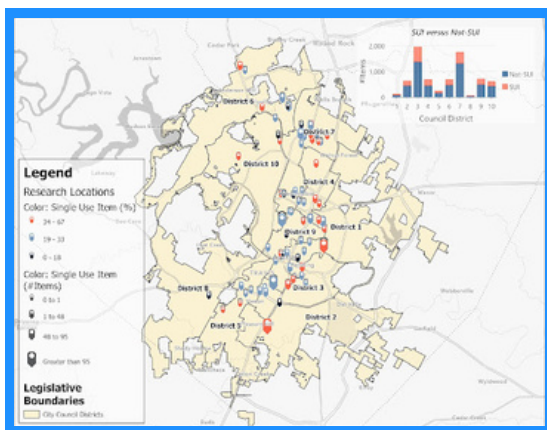
trashblitz x LITTERATI

RECOMMENDATIONS

Using data to find solutions

Single-use food/drink items (bottles, wrappers, straws, and utensils) were the most common items found.

Walnut Creek, Shoal Creek, and Lady Bird Lake Watersheds (Districts 3&7) had the most observed plastic waste.

Recommendation of Action

Implement a "Skip the Stuff" legislative policy that would eliminate unnecessary single-use plastic products in food orders.

Recommendation of Action

Direct future clean ups and research in Districts 3 and 7 to formalize better conservation and reduction practices.

trashblitz x LITTERATI

SPONSORS & SUPPORTERS

Participating Organizations

Active Recovery Coaching
Austin Community College
Austin Creative Reuse
Austin Farm Sanctuary
Austin Parks & Recreation
Austin Parks Foundation
City of Austin Watershed Protection
Black Lives Veggies
CLEAN Cause

Cosmic Coffee
Driftwood Recovery
Good Apple
Keep Nature Wild
Kiwi Eco Box
My Vinyasa Practice
Prep to Your Door
St Edward's Students for Sustainability
Zero Waste Strategies

trashblitz x LITTERATI

FOR MORE INFORMATION

Read the comprehensive report here

Learn more about TrashBlitz here

trashblitz x LITTERATI