

# ANNUAL REPORT 2021-2022

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**PRESENTED BY**

Auraria Sustainable  
Campus Program



Auraria  
Sustainable  
Campus  
Program



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# WHERE WE ARE NOW

Each academic year presents us with unique challenges, and '21-'22 was no different. In the wake of the pandemic and the campus slowly coming back to life, we forged ahead with our commitments to a more sustainable Auraria Campus. As the schools took a hybrid approach to this past school year, so did we. Our progress was different than in years past but no less important or impactful to our campus community. I'm proud to share the achievements of our growing team in the pages of this annual report, and I encourage anyone interested in being a part of our work to reach out to us. We will find space for your efforts and talents in our mission to create a more sustainable and equitable campus.

In '21-'22, we achieved the highest diversion rate ever recorded at Auraria. We grew to the largest sustainability team we've ever had in our 12 years of existence. Our team drafted the first comprehensive Climate Action Plan in 10 years and continues to engage campus leadership to craft meaningful goals that will make the Auraria Campus a leader in climate initiatives.

I want to thank all the students, staff, faculty, and community members that played a role in our success this past year and for years to come. We couldn't do this without your growing support and commitment to making Auraria more sustainable.

Chris Herr  
**Director of Sustainability**

# OUR MISSION

## Global impact through local action.

The ASCP is a campus-wide program with the explicit mission of reducing the Auraria Campus' ecological impact and dependence on fossil fuels. We work to accomplish this through projects, events, and programs. This annual report for the 2021-2022 Academic school year highlights our accomplishments.

The Three E's of the ASCP: In everything we do we strive to be inclusive, educational, and effective while acting with urgency on these pressing climate issues.

Educate	Engage	Execute
<p>The ASCP strives to educate our campus community on initiatives and methods to reduce the Auraria Campus' ecological impact and dependence on fossil fuels. Our education and outreach methods provide opportunities for campus constituents (students, faculty, staff, and community members) to learn and engage with our sustainability mission.</p>	<p>The ASCP's education and outreach methods provide opportunities to engage with the projects, events, and programs put in place to reduce the campus' ecological impact and dependence on fossil fuels. We use student feedback from bi-annual surveying to set goals and begin projects that best serve the constituents of the Auraria Campus.</p>	<p>The overarching mission of the ASCP is to reduce the Auraria Campus' ecological impact and dependence on fossil fuels. The ASCP uses measurable and specific goals to track its progress and achievements. We execute our objectives and work to reflect and report to the campus community.</p>

*The ASCP proudly serves three institutions on the Auraria Campus in Denver, Colorado.*

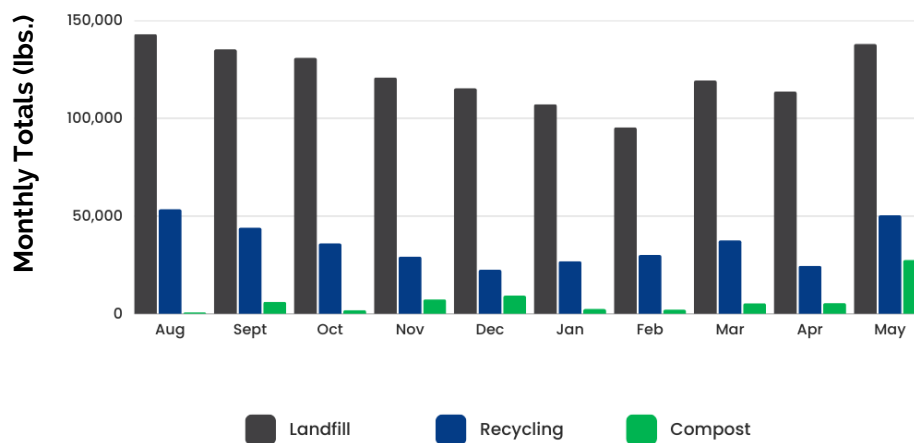


*for the 2021-2022 Academic Year*

# IMPACT BY METRIC

The Auraria Campus total waste for the financial year (FY) 2021-2022 was just over 2 million pounds (2,019,104 lbs), excluding construction waste. Of this, the Auraria Sustainable Campus Program (ASCP) diverted nearly six hundred thousand pounds from landfills with campus-wide composting, recycling, and specialty recycling (Hard-To-Recycle, or H2R) programs. Thanks to these programs, and campus-wide cooperation, **the ASCP's diversion rate for FY 2021-2022 is 29% of total waste.**

## AUGUST '21-MAY '22 WASTE STATISTICS



The compost referendum, approved in 2019 by student vote, removes organic materials like food waste, paper towels, and some specialty flatware products from landfills. The ASCP aids in the collection and transfer of compostable materials to a facility for processing and resale for agricultural use.

A refuse item can be labeled as "hard-to-recycle" if it is not accepted by local curbside collection programs.

The specialty recycling programs offered by the ASCP serve the general campus body with the H2R program as well as the Auraria Higher Education Center (AHEC). The H2R program offers collection and transfer of unusual or difficult to recycle objects like oral care and beauty products, electronics, batteries, and cigarettes. In addition, the ASCP aids AHEC in the collection and transfer of lightbulbs, metal, and other mixed material waste generated by day-to-day campus management.

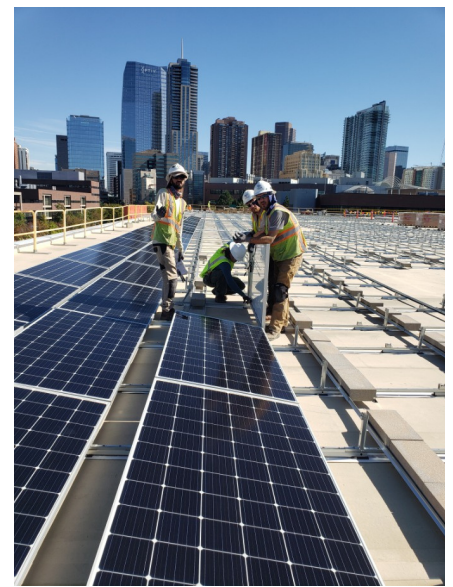
With the support of the Auraria Campus' student body, staff, and faculty, the ASCP is able to reduce the total amount of campus waste sent to the landfill and provide eco-friendly options for the disposal of campus waste.

*for the 2021-2022 Academic Year*

# IMPACT BY METRIC

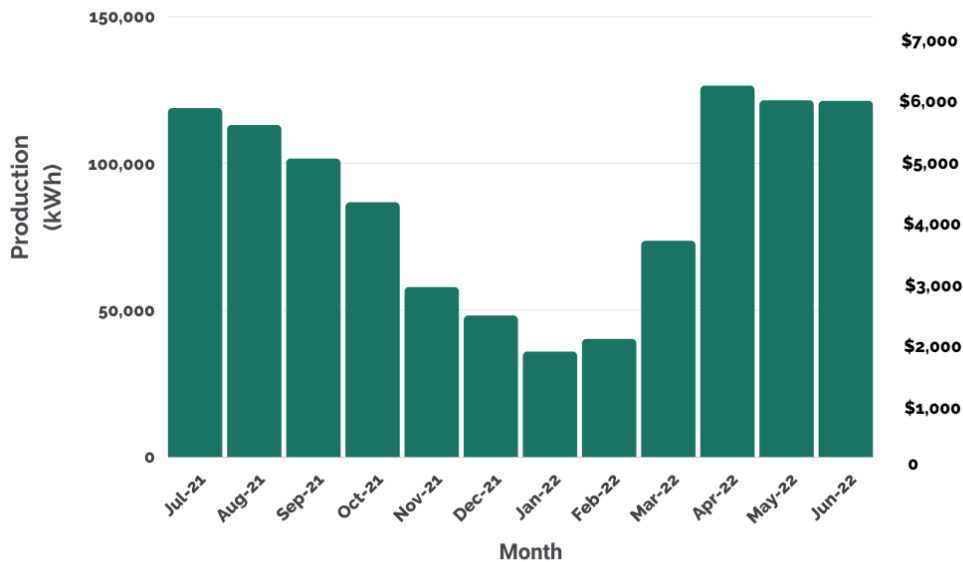


The completed solar array under the Denver skyline



Solar workers install the first panels on the Auraria library

**Library Solar Array 2021-2022  
Production (kWh) and Cost Savings (USD)**



The ASCP installed the largest solar array in downtown Denver on the Auraria library during 2019-2020. The panels and installation was entirely student funded, and is an award-winning array. Over the 2021-2022 academic year, it produced 1,044,857 kilowatts per hour of electricity that saved the Auraria campus \$53,629.31 in energy costs.

# MAJOR PROJECT HIGHLIGHTS

## Our mission in action.

### Shade Garden

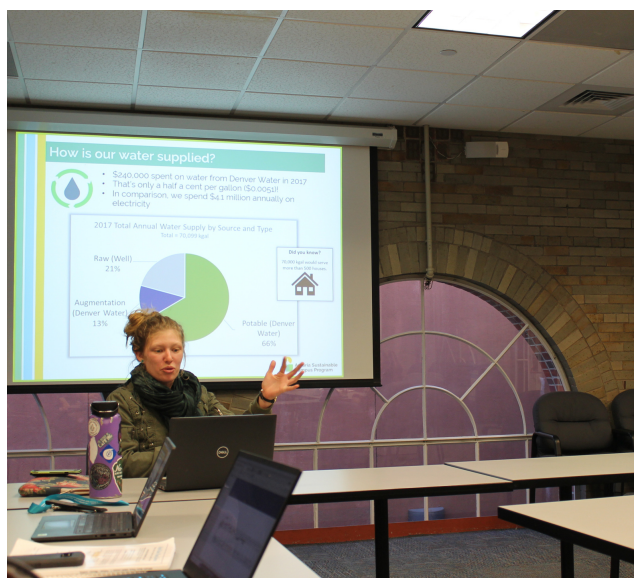
We built a shade garden to reduce water use by planting species native to Colorado which can help retain soil irrigation, provide critical habitat for wildlife and pollinator species, and provide a place for students and staff to not only find respite from the heat, but also impart an educational opportunity. This garden will engage and educate the students and staff here at Auraria about what else we can do here on campus and beyond to conserve water. Thank you to all the volunteers that helped us execute this project with their sweat and shovels! The garden will save thousands of gallons of water annually after we swapped out the pop-up spray irrigation with the more efficient drip system.



Anna Zapel smiles for the camera as she breaks ground on the Auraria shade garden

### Sustainability Workshops

We have continued to build upon the success of the past year to renew and improve our co-curricular Leadership in Sustainability workshops. These sessions are open to all students and, for CU Denver students, can amount to a certificate. One of our primary goals as a program is to continue to engage with and educate students at Auraria about what sustainability is, what the ASCP does, and how they can be a part of the solution. Our workshops include: Sustainability 101, The Triple Bottom Line, State of Waste ROI and the Pitch: How to Get Things Done, Water: Planning for the Future, and Food Waste: An Issue of Social and Environmental Sustainability.



Cassy Cadwallader explains water supply in Denver  
Photo Credit: Travis Brooks of "The Metropolitan"



## Sustainability Trail

In partnership with the One World One Water Center, we have established an Earth-Month Sustainability Trail throughout the Auraria Campus. This trail is marked by signs and highlights outdoor sustainability features while giving students and staff a peaceful and hopefully restorative experience as the semester winds down. Some of the features include a: Shade Garden, Bioswale, Native Landscaping Options, an Air-to-Water Capture System, and many other highlights.



A freshly planted Rocky Mountain Blue Columbine along the trail.

## Water Education

Our team this year was limited in which projects we could pursue due to lingering effects from the COVID-19 shut down, but we were still able to safely pursue outdoor items like water conservation and education efforts. We were able to map all leaks on our outdoor irrigation system and flag them for repair or replacement which we expect will save tens of thousands of gallons of water annually. We also hosted regular Creek Cleanups at the Cherry Creek near campus through which we saw a huge increase in volunteers and averaged about 900 pounds of trash removed from the creek monthly. Thank you to the dedicated students and staff that were willing to really get their hands dirty, their waders on, and improve our community.



ASCP staff and volunteers at the Cherry Creek Clean-Up

# CLIMATE ACTION PLAN

## OVERVIEW & ANALYSIS

*Overall GHG Emissions Target: Reduce emissions 50% below 2007 baseline by 2030, 90% by 2040 and achieve climate neutrality by 2050.*

This Climate Action Plan offers a set of recommended goals, benchmarks and strategies to aggressively reduce Auraria's greenhouse gas (GHG) emissions; it aims to serve as a roadmap for Auraria's Climate Action. Note that this report focuses on three of the largest quantified emissions sources: energy (50%), commuting (32%) and waste (5%). This inventory does not include strategies to reduce air travel emissions or emissions not quantified in the 2019 GHG inventory.

The Covid-19 pandemic has altered campus operations such that FY2020 and FY2021 do not accurately depict campus emissions, but we attempted to quantify these years anyway. The ASCP will conduct a GHG inventory for FY2022 (ending July 2022) to determine performance in relation to the 2008 benchmark. Ideally, these inventories would take place every 2-3 years to confirm our emissions are trending in the right direction.

The next five to ten years will be defining for the issue of climate change. The manner in which our Auraria campus conducts itself over that time frame—as a higher education institution embracing and symbolizing a spirit of ingenuity—will have a lasting impact on the planet we all share.

The ASCP hopes that the following plan provides a roadmap for Auraria's climate action over the next decade (and beyond). We hope that Auraria's executive leadership team makes a bold commitment to reduce campus emissions, both over the next 10 years and beyond. It's time to get to work.

**Note:** You can access the complete FY2019 Auraria GHG Inventory on the ASCP website.

A photograph of the Auraria campus skyline, featuring several modern skyscrapers under a clear blue sky. In the foreground, a large array of solar panels is visible, with colorful flags marking the installation site.

# CLIMATE ACTION PLAN

**The Climate Action Plan was collaboratively developed in 2020 in response to the "Declaration of Climate Emergency" by the Auraria Campus Student Body.**

The students of Auraria Campus have expressed the need for climate action, not only by voting to approve student fee increases, but also by attending protests on the steps of the state capital and speaking to local and state representatives. However, it must be recognized that students should not, and cannot, bear the sole responsibility and cost of advocating for greener practices on our campus. We, the Auraria Campus student body, feel it is imperative for the implementation of a more systemic and campus-wide effort to contribute resources towards greater sustainability efforts.

The Auraria Climate Action Plan created by the ASCP recognizes the aggressive and decisive action that is necessary to achieve our climate goals and serves as a testament to the commitment of students to sustainability. Auraria Campus is positioned to combat the global climate crisis and lead with innovation and dedication. By making a concerted and collaborative effort to decrease our greenhouse gas emissions and improve energy efficiency on our campus, we can ensure the safe futures of our students and communities.

This plan would not be made possible without the contributions of numerous stakeholders across the Auraria campus and beyond.

Marlena Fay Harwood, MS Environmental Science  
[Former Chairperson, ASCP Advisory Committee](#)