



MEMORANDUM

TO: Mayor and Council

FROM: Lucia Athens, Chief Sustainability Officer
Zach Baumer, Climate Program Manager

DATE: April 20, 2017

SUBJECT: Resolution No. 20150604-048
Austin Community Climate Plan Semi-Annual Progress Report

BACKGROUND

Resolution No. 20150604-048 adopted the Austin Community Climate Plan to achieve the goal of net-zero community-wide greenhouse gas emissions by 2050. The plan also established interim targets for emissions reductions for 2020, 2030, and 2040.

The Resolution calls for semi-annual progress reports to Council. This progress report provides a status update on each of the five key Recommendations identified in the Austin Community Climate Plan.

RECOMMENDATION 1:

IMPLEMENTATION OF KEY ACTIONS TO REDUCE GREENHOUSE GAS EMISSIONS

When the Austin Community Climate Plan was adopted two years ago, ten strategies were prioritized as new initiatives that were critical to implement and expand over time to meet long-term emissions targets. **Each of these prioritized strategies is currently underway, and many are ramping up to meet expected levels of emissions reductions.**

The following progress has been accomplished for each strategy:

Electricity and Natural Gas:

- Buildings and Integrated Efficiency (BIE)-1: Explore financing mechanisms (such as Property Assessed Clean Energy, or PACE) to enable energy efficiency, demand response, distributed generation and energy storage.

Austin Energy provides loans for bundled energy efficiency projects in single family homes, and it has taken action to reduce barriers to participation in PACE projects (namely, decreasing credit score requirements from 740 to 600).

- Behavior Change (BC)-1: Increase efforts to engage customers to be energy efficient and drive demand response.

Austin Energy is currently evaluating metering programs that will utilize energy usage data to benefit both customers and emissions reduction targets. This evaluation process will continue through FY17.

- Resource Technologies (RT)-1: Begin a coordinated effort to prioritize strategic development and evolution of a Smart Grid / Intelligent Energy Management System.

Austin Energy is investing in the capabilities needed to leverage meter data and continues to work on battery-PV integration under the SHINES grant. Several pilot projects focused on distribution grid efficiency are currently underway; if successful and expanded system-wide, these have the potential to result in significant energy savings.

Transportation and Land Use:

- Transportation Demand Management (TDM)-1: Support efforts to work with large employers and academic institutions to implement and improve trip reduction programs.

This spring, 20/20 Mobility Challenge participants will submit an inventory of existing mobility programs and survey employees to find out about current commute behavior. After analysis of the results, Movability Austin and the Thrival Company will lead each company through a process to develop a three- to five-year plan for reducing drive alone commuting.

- Transportation Demand Management (TDM)-4: Support programs that help commuters make first and last mile transit connections.

Rocky Mountain Institute and Movability Austin worked with employers in the Market District west of downtown to develop and launch an employer-funded first-/last-mile shuttle that connects employees to Capital Metro services in eastern downtown during peak traffic hours. Capital Metro and the City of Austin are working to prioritize and implement bike-pedestrian connections along the MetroRail route. Eighteen new Austin B-Cycle stations will be provided in 2017 using federal funding matched with private funds.

- Vehicles and Fuel Efficiencies (VFE)-1: Support expansion of electric and alternative fuel infrastructure and consider incentives for the purchase of electric and alternative fuel vehicles.

Austin Energy has developed a showcase for sustainable transportation in the heart of downtown Austin called Electric Drive that features a DC fast charger that meets both standards for EV charging, as well as Level 2 charging. A solar powered kiosk includes Level 1 charging for electric bikes, scooters, motorcycles, and mopeds. Austin Energy is also integrating electric vehicle charging into their demand response programs and has recently conducted a pilot to successfully show that PEV charging can be centrally managed to further improve grid reliability.

Materials and Waste Management:

- Purchasing (PU)-2: Adopt procurement specifications for the City of Austin for materials reuse, reduced packaging, products with low embodied energy, materials with recycled content, and locally manufactured products.

The Office of Sustainability is working with Central Purchasing to develop sustainable procurement specifications for large, multi-departmental contracts centered on furniture, office supplies, janitorial supplies/services, and uniforms.

- Methane Management (MM)-2: Refine landfill gas capture and combustion systems to destroy methane at landfills.

Reported emissions from private landfills is down 7% from 2013, even though disposal increased by 12%.

- Organics Diversion (OD)-1: Ensure that businesses affected by the Universal Recycling Ordinance maximize diversion of organics.

In FY17 the Universal Recycling Ordinance began requiring 220 food service establishments to establish programs to divert organic materials. The number of affected establishments will increase through FY19, when all will be required to comply.

- Recycling (RE)-4: Ensure that businesses and multifamily properties affected by the Universal Recycling Ordinance maximize diversion of recyclable materials.

Austin Resource Recovery provided education and training on compliance, resulting in 90% of the 3,300 affected properties completing annual diversion plans in FY16.

RECOMMENDATION 2:

IMPLEMENTATION OF PHASE 1 ACTIONS AND PUBLIC ENGAGEMENT STRATEGIES

More than 50 actions and strategies from the Austin Community Climate Plan have been identified as Phase 1 Actions to meet the first interim emissions reduction target of 11.3 metric tons of carbon-dioxide equivalent community-wide by 2020. **Based on reduction strategies that are currently underway, it is estimated this target will be surpassed, resulting in a reduction to 10.2 million metric tons community-wide.**

Details about the status of each Phase 1 Action are provided in the attachments to this memo.

Public Engagement and Communications Strategies:

Engagement and communications initiatives related to the Austin Community Climate Plan have been largely focused on creating an array of catalysts to promote taking individual action. These include:

- Launch of the animated *Climate Change in Austin* video, designed to inform the public about what the City is doing to address climate change, as well as inspire action to protect Austin. During a single month of promotion on Facebook, the video reached more than 71,000 people and generated close to 20,000 views. Engagement metrics indicate 1,525 Likes, Shares, and Comments about the video.

- Presentations about the Austin Community Climate Plan at community and educational events, which have reached approximately 750 people since October.
- Creation of tip sheets about easy, intermediate, and advanced actions that people can take to reduce their carbon footprint. These tips sheets have been produced in English and Spanish and provide links to City programs, incentives, and rebates to support their efforts. The tip sheets have been distributed at community events and continue to be promoted via social media.
- Reorganization of climate-related web pages on austintexas.gov to make community resources and content more easily accessible. Since October, these pages have received 7,810 unique page views.
- Continuation of the Net Zero Heroes blog series to highlight the inspiring efforts of Austinites who are doing their part to help meet the net-zero target. The 14 Net Zero Heroes featured to date represent a diverse cross-section of Austin with stories ranging from bicycle commuting, to home composting, to electric vehicle ownership. Altogether, the series has reached more than 45,751 people on Facebook, with engagement metrics averaging 67 Likes/Shares/Comments per post.

Communications and engagement efforts for the remainder of the fiscal year will be focused on a coordinated media / social media campaign to promote the *Climate Change in Austin* video and tip sheets, as well as identification of community events and presentation opportunities to engage with Austinites face-to-face about climate change and the City's net-zero goal.

RECOMMENDATION 3:

CARBON IMPACT STATEMENT FEASIBILITY STUDY

The Office of Sustainability has developed a draft carbon impact statement that would provide Council with an objective assessment of the relative future carbon impacts associated with a specific zoning decision or development directive. This draft carbon impact statement was created based on discussions with internal stakeholders in the Planning and Zoning and Development Services Departments, as well as guidance from executive leadership in the City Manager's office. **Staff have identified large rezoning cases with potential major carbon impacts as an area for focus in a pilot utilizing a draft carbon impact statement.**

The Office of Sustainability will engage with external stakeholders from the development community and members of the Joint Sustainability Committee in the coming months to develop appropriate processes to test this concept further.

RECOMMENDATION 4:

LOCAL CARBON FEE OR TRADING AND INVESTMENT PROGRAM FEASIBILITY STUDY

Continued research on the regulatory and financial aspects of local carbon fees or trading and investment programs has revealed several key findings:

- Based on discussions with the Law Department, the City of Austin is only able to assess taxes as authorized by the State of Texas or based on its status as a home rule city. Creation of a new tax related to carbon would likely require new State-level enabling legislation.

- Austin Energy customers currently contribute to the Community Benefit Charge each month as part of their utility bill. A portion of these funds support energy efficiency services, including rebates to residential customers to make improvements to their homes to reduce their electric bill. Austin Energy solar rebates are also recovered through this line item. **In practice, the Community Benefit Charge functions as a type of local carbon fee based on usage (cents per kilowatt hours used).** It is similar to the Climate Action Plan tax used in Boulder, Colorado.

With the Community Benefit Charge in place, staff recommends reviewing new and evolving opportunities for a local carbon fee as part of the Community Climate Plan update in 2019.

RECOMMENDATION 5:

CLIMATE PROJECTIONS AND CLIMATE RESILIENCE PLANNING

The Office of Sustainability is currently facilitating a cross-departmental process to develop resilience-building strategies, resources, and tools around **key services, infrastructure, and facilities** directly managed by the City of Austin. This effort fulfills Council direction for departmental planning to address future climate change and extreme weather impacts, and also complies with the City of Austin's commitment to the Compact of Mayors.

The following items will be completed as part of this planning process:

- Hazards Assessment: Identification of how future climate hazards, such as wildfires, floods, drought, and extreme heat, could impact infrastructure, natural areas, and City operations over time.
- Vulnerability Assessment: Staff from Austin Water, Austin Energy, Watershed Protection, Public Works, and Homeland Security and Emergency Management will identify climate vulnerabilities within critical assets and facilities. Members of the Imagine Austin priority program *Healthy Austin* will identify climate vulnerabilities related to health.
- Resilience Strategies: Strategies to enhance the City of Austin's climate resilience will be developed to address identified hazards and vulnerabilities, and will incorporate lessons learned and best practices from other cities.

As a follow-on to their 100 Resilient Cities program, the Rockefeller Foundation reached out to the Office of Sustainability and offered to provide a planning workshop on resiliency. On March 30 and 31, 2017, fifty City leaders, Department Directors, and staff attended the workshop to learn from industry-leading experts about national best practices and successful implementation and funding strategies of resilience projects in other cities.

Attendees of the Austin Climate Adaptation Workshop participated in exercises designed to identify and understand interdependencies between City assets and systems; develop aspirational resilience goals; identify potential benefits, stakeholders, funding gaps, and financing levers for specific projects; and create roadmaps and action plans for moving forward. A summary report of the workshop findings will be prepared by the workshop facilitators and provided to all participants to use in their on-going resilience planning efforts.

NEXT STEPS

The Office of Sustainability will continue to work with the Joint Sustainability Committee and relevant City departments to ensure the successful implementation of the Austin Community Climate Plan. The next semi-annual update to Council will occur in September of 2017 and is expected to include:

- The updated Austin/Travis County Community Carbon Footprint based on 2016 data.
- Findings from the Carbon Impact Statement pilot and recommendations for going forward.

CC: Elaine Hart, Interim City Manager
Ray Baray, Chief of Staff
Assistant City Managers