



CLIMATE EMPOWERMENT

SUMMER 2024 POLICY MEETING AUGUST 8-10 • KNOXVILLE, TN

The science is largely settled: We already know what strategies we need to implement to reduce the impacts of climate change and build climate resilience. But many require effective engagement and empowerment of both the public and partners to effect real and lasting change. This session will focus on the process of climate action: how to communicate effectively across multiple audiences, build support, and meaningfully engage to build a climate resilient future.



DISCLAIMER

For length, clarity, and printing purposes, many of these sources have been abbreviated and/or edited from their original form. To read the full, unabbreviated resources from this book, please visit our website or view them on the usb drive provided in your meeting materials.

RESOURCES

PAGE

1

Pages excerpted from: “The Spectrum of Community Engagement to Ownership,” Rosa González, Facilitating Power, 2019.

12

“Behavior Change Communications,” Dr. Michael Shank, Carbon Neutral Cities Alliance, Aug. 2019.

22

Pages excerpted from: “Knoxville Urban Forest Master Plan,” Trees Knoxville, 2023.

31

“DEUSA Fleet Success Stories: City of Knoxville, TN,” Drive Electric USA, Jun. 27, 2023.

34

“Madison preparing for big leap in air quality monitoring,” Dean Mosiman, Wisconsin State Journal, May 15, 2023.

36

“Conservation voters launch innovative canvass campaign,” Wisconsin Conservation Voters, Urban Milwaukee, Oct. 12, 2023.

37

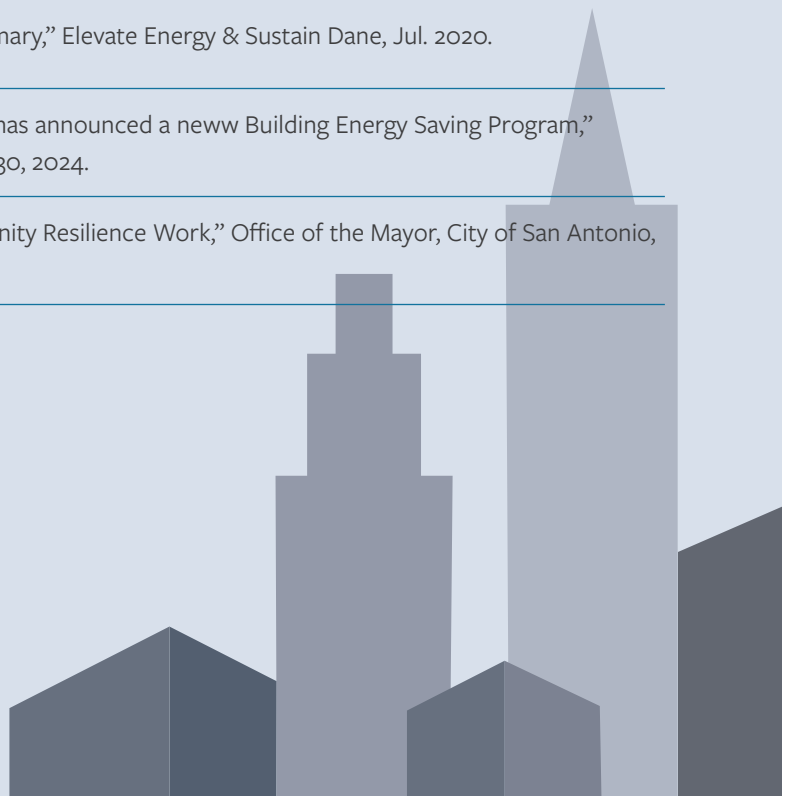
“Multifamily Owners Interviews Summary,” Elevate Energy & Sustain Dane, Jul. 2020.

38

“The City of Madison Mayor’s Office has announced a new Building Energy Saving Program,” Lauryn Abozeid, WKOW News, May 30, 2024.

40

“Youth Leaders to Showcase Community Resilience Work,” Office of the Mayor, City of San Antonio, TX, May 6, 2024.





The Spectrum of Community Engagement to Ownership charts a pathway to strengthen and transform our local democracies. Thriving, diverse, equitable communities are possible through deep participation, particularly by communities commonly excluded from democratic voice & power. The stronger our local democracies, the more capacity we can unleash to address our toughest challenges, and the more capable we are of surviving and thriving through economic, ecological, and social crises. It is going to take all of us to adequately address the complex challenges our cities and regions are facing. It is time for a new wave of community-driven civic leadership.

Leaders across multiple sectors, such as community-based organizations, local governments, philanthropic partners, and facilitative leaders trusted by communities, can use this spectrum to assess and revolutionize community engagement efforts to advance community-driven solutions.

THE SPECTRUM OF COMMUNITY ENGAGEMENT TO OWNERSHIP



This tool was developed by Rosa González of Facilitating Power, in part drawing on content from a number of public participation tools, including Arnstein's Ladder of Citizen Participation, and the Public Participation Spectrum created by the International Association for Public Participation. The contents have been piloted with municipal community-centered committees for racial equity and environmental justice at the cities of Portland Washington, Providence Rhode Island, Seattle Washington, and Washington DC; and with the Building Healthy Communities Initiative in Salinas, California, and developed in partnership with Movement Strategy Center.

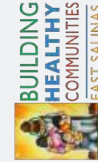
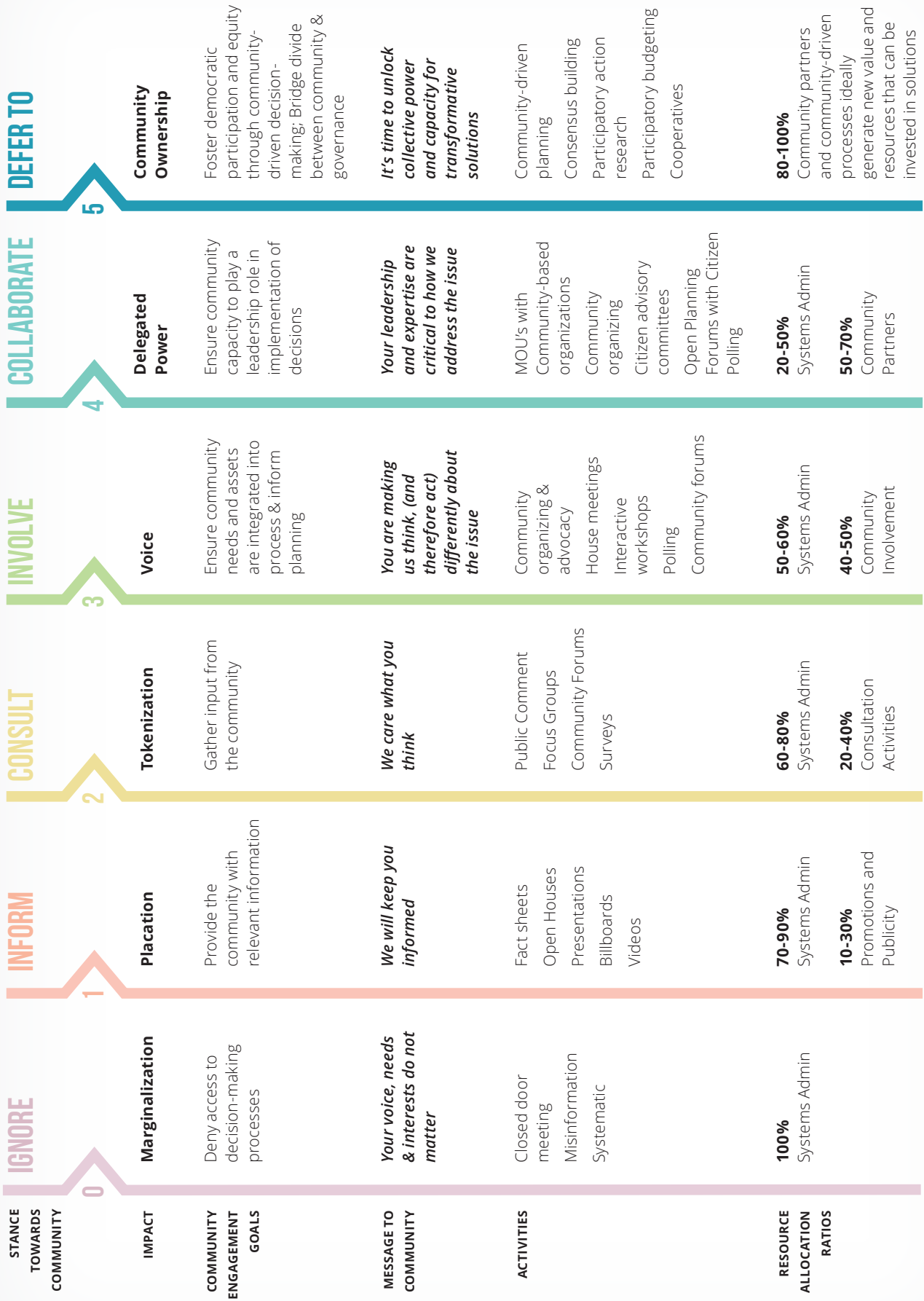


Photo by Monserrat Soto

TABLE OF CONTENT

Spectrum of Community Engagement to Ownership	2
Why Community Engagement to Ownership?	3
Why Developmental Stages?	5
Understanding the Spectrum within Local Contexts	6
Using the Spectrum as a Tool for Assessment	9
Applying the Spectrum to Policy Development	9
Applying the Spectrum to Community Campaign Development	11
Using the Spectrum as a Tool for Assessing Projects, Programs & Campaigns	13

THE SPECTRUM OF COMMUNITY ENGAGEMENT TO OWNERSHIP



WHY COMMUNITY ENGAGEMENT TO OWNERSHIP?

The key to closing equity gaps and resolving climate vulnerability is direct participation by impacted communities in the development and implementation of solutions and policy decisions that directly impact them. This level of participation can unleash much needed capacity, but also requires initial capacity investments across multiple sectors to strengthen our local democracies through systems changes and culture shifts.

- *Community-based organizations* play a critical role in cultivating **community capacity** to participate in and lead decision-making processes that meet community needs and maximize community strengths.
- *Staff and electeds within local government* have essential roles to play in helping to facilitate **systems changes** to increase community voice and decrease disproportionate harms caused to low-income communities and communities of color.
- *Philanthropic partners* have a role to play in partnering with impacted communities to **balance uneven power dynamics** and ensure adequate resourcing of essential community capacities.
- *Third party facilitators and evaluators* can help **cultivate the conditions for collaboration and participation across sectors**, while assessing and documenting progress towards practice goals and community solutions.

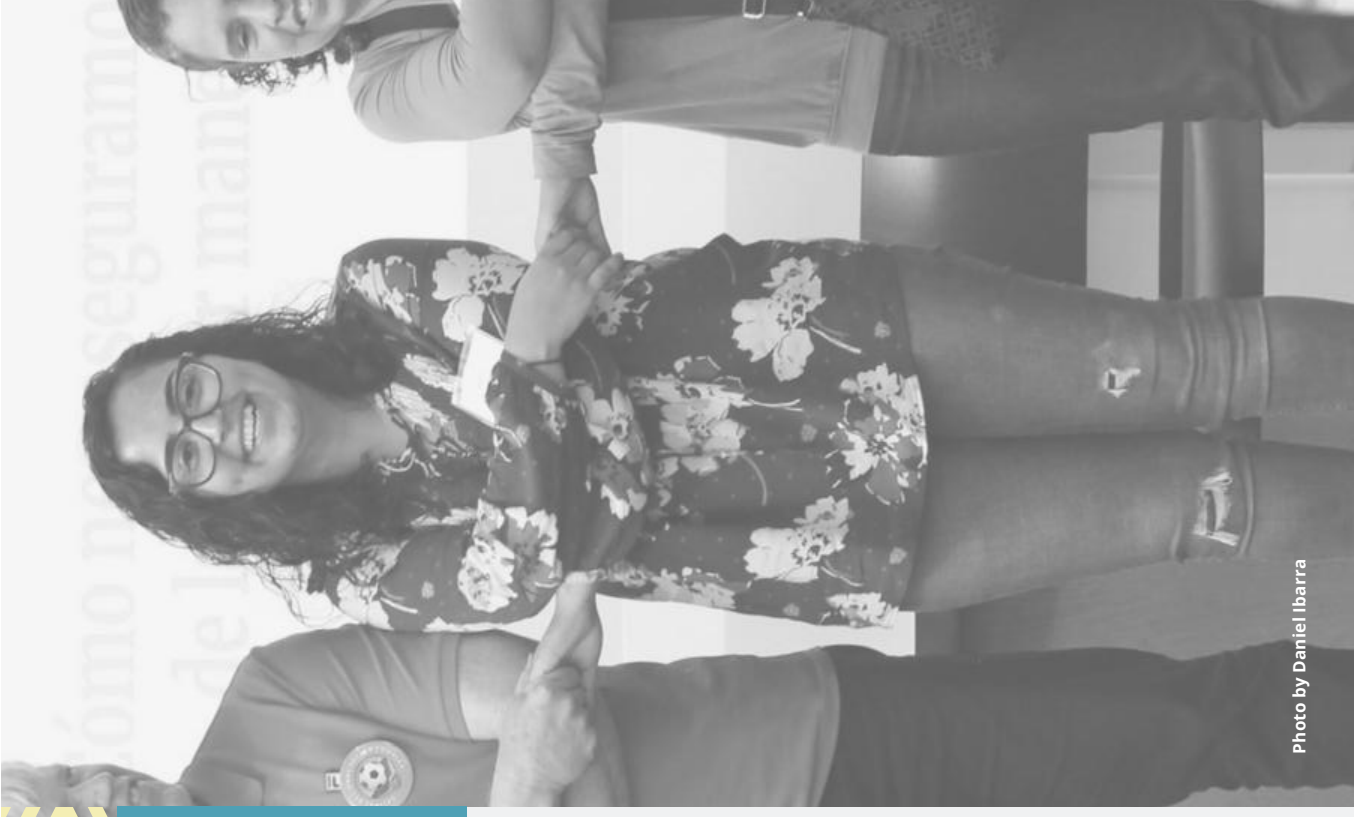


Photo by Daniel Ibarra



Photo by Monserrat Soto

This spectrum can be used by local governments and by non-profit organizations or community groups working to facilitate community participation in solutions development and decision-making. It is designed to:

- 1. Acknowledge marginalization** as the status quo practice of current systems that have been historically designed to exclude certain populations, namely low-income communities, communities of color, women, youth, previously incarcerated people, and queer or gender non-conforming community members. This understanding is important because if concerted efforts are not made to break-down existing barriers to participation, then by default marginalization occurs.
- 2. Assert a clear vision** for rebuilding our local democracies, as key to solving today's toughest crises, through inclusion, racial justice, and community ownership.
- 3. Articulate a developmental process** for rebuilding our local democracies that requires significant investment in the capacity to participate as well as the capacity to break-down systemic barriers to community participation.
- 4. Assess community participation efforts** and progress toward participation goals.





WHY DEVELOPMENTAL STAGES?

With the exception of marginalization (a zero on the spectrum), each of the steps along the spectrum are essential for building capacity for community collaboration and governance. Communities must be informed, consulted, and involved; but through deeper collaboration we can unleash unprecedented capacity to develop and implement the solutions to today's biggest crises in our urban centers. To achieve racial equity and environmental justice, we must build from a culture of collaboration to a culture of whole governance, in which decisions are driven by the common good. Whole governance and community ownership are needed to break the cycle of perpetual advocacy for basic needs that many communities find themselves in. **Developmental stages allow us to recognize where we are at, and set goals for where we can go together through conscious and collective practice, so key to transforming systems.**



UNDERSTANDING THE SPECTRUM WITHIN LOCAL CONTEXTS

Through facilitated dialogue, reflect on each of the developmental phases in the context of your city/region.

PHASE

DESCRIPTION

REFLECTION QUESTIONS

0

IGNORE

MARGINALIZATION

Marginalization represents the status quo, given current systems have been historically designed to exclude certain populations. If concerted efforts are not made to break-down existing barriers to participation, then by default, marginalization occurs. The history of the United States can be understood as generations of social movements striving to extend the rights of democracy to groups that have been previously excluded. The health of our democracy AND our economies depends on our capacity to recognize and address marginalization and exclusion. There is a direct connection between economic exclusion (slavery, taking land by force, taxation without representation, exploitation of labor, etc.) and political exclusion (denying citizenship and voting rights, top-down decision-making practices, etc.).

- What are the roots of systematic marginalization in your city/region? How is political exclusion related to local economic factors?
- How does the legacy of political exclusion based on race and class persist to today? What forms does it currently take in your city/region?

1

INFORM

PLACATION

Information is the foundation for taking action towards real solutions to the threats we face. As the saying goes, knowledge is power. If, however, community engagement efforts remain at the level of one-way information sharing, such efforts result in placation. The role of the community is reduced to absorbing information from those with more positional power; meanwhile, the notion that every day people can actually shape solutions is stifled.

- What does information flow look like for impacted communities in your city/region? What is contributing to information flow? What is hindering it?
- Reflecting on existing community assets, what will it take for impacted communities to have equitable access to information about the issues that directly impact them?

2

CONSULT

TOKENIZATION

The most common form of 'community engagement' among mainstream institutions is consultation, usually in the form of semi-interactive meetings in which members of the community have the chance to offer input into pre-baked plans. This is of course a step up from one-way information-sharing; a two-way exchange is initiated. The biggest critique of this form of engagement is that decisions are often already made; the community input period simply serves to check a box. What's more, if the people participating have not had the chance to develop a shared analysis of the problem or articulate a shared vision, values, and priorities, with their peers, then they don't actually represent a 'community' they are simply participating as individuals, and therefore are only 'tokens' of the community they are supposed to represent. This is the trap of consultation.

- When is it appropriate for impacted communities to be in a consultation role? What should impacted communities in your city/region be consulted on?
- Where, in your experience of community engagement does it feel like consultation can be a trap?
- What is needed to move beyond consultation and get to solutions that benefit from the genuine involvement of impacted communities?



PHASE

DESCRIPTION

REFLECTION QUESTIONS

3

INVOLVE

VOICE & POWER SHIFT

Community organizing and power building is needed to bring community engagement out of tokenization and into true involvement of impacted residents in the decisions that impact them. Community organizing offers vital elements to local democracies: 1) Community power puts needed pressure on local systems to make change; 2) Education and leadership development supports residents to make informed decisions that reflect the needs and interests of their communities; 3) Organizing builds the public will to develop, advocate for, and implement viable solutions; 4) Community organizing can also balance uneven power dynamics so that communities can effectively collaborate among sectors with more institutional power.

- What does it take for residents of impacted communities in your City to have a real voice in the decision-making that impacts them? What are the examples?
- What is needed to build sustained voice & power?
- What community-based organizations are building an informed base of resident leaders with the capacity to advocate on behalf of the needs and interests of the community?

4

COLLABORATE

DELEGATED POWER

As a culture of systems change develops through community organizing, advocacy, and relationship-building, the limits of local systems to carry out changes on their own becomes apparent. At this point, the opportunity to collaborate across sectors emerges and makes culture shift possible. Through the leadership and delegated power of community leaders, structures of participation can be made more accessible and culturally relevant to groups that have been historically excluded. In turn, collaboration requires and makes possible more trusting relationships and the healing of old divides within systems that tend to be more transactional. Collaboration also brings together unique strengths, assets, and capacities essential to enacting needed solutions, and that unconsciously go untapped.

- Where are the opportunities for meaningful collaboration between impacted communities & local government to co-develop solutions to racial & environmental injustices?
- To what extent have impacted communities built an informed base of community members with the power and influence to achieve policy & systems change?
- What culture shift and system changes are needed for authentic collaboration between institutions and impacted communities?

5

DEFER TO

COMMUNITY OWNERSHIP

We are building to community ownership to ensure communities have a direct say over what is needed to survive and thrive.

Throughout each of the developmental phases, we must be consciously building the capacity for communities currently impacted by poverty, pollution, and political disenfranchisement to have increasingly more control over the resources needed to live, such as food, housing, water, and energy. Strengthening local democracies is about ending dependency and restoring dignity.

- What role will community ownership play in closing equity gaps?
- What is your collective vision for local community ownership?
- What can you be doing now to lay the groundwork for community ownership?
- What infrastructure for community ownership is needed that you can start building now?

APPLYING THE SPECTRUM TO POLICY DEVELOPMENT

When it comes to policy development, where you land on the spectrum is primarily based on what point in the policy development process you engage community. This tool provides a brief overview of what community engagement might look like at each

major phase of the policy development process. Local policy makers can use this chart to determine at which point in the policy development process they will engage (and ideally partner) with community-based organizations from communities most impacted by the given policy issue, as it provides an overview of the costs and benefits of each approach, as well as an overview of possible activities at each stage.

POINT OF ENGAGEMENT	DESCRIPTION	POTENTIAL BENEFITS	POTENTIAL COSTS	COMMUNITY ACTIVITIES	CITY STAFF ACTIVITIES
4					
Whole Process from Problem Definition to Solution Development & Implementation	In this ideal scenario, the entire policy development process is driven by a multi-stakeholder community partnership and is facilitated by authentic collaboration with city staff to achieve the best possible policy solution.	New policy is responsive to actual community needs; has political will to not only pass but be fully implemented with community leadership; builds community capacity to lead in the process.	An investment must be made in community capacity to carry out planning process; this investment can be made by a philanthropic partner, the local government or through a combination of public and private dollars.	• Visioning & Priority Setting • Problem Definition & Community assessment • Solutions Development & possible piloting • Collaboration with policy/planner to translate solutions into policy • Development of metrics • Organizing educational forums with City • Meetings with decision-makers	• Co-fundraising with community-based organizations • Attendance at and sometimes co-planning of community-based events and activities • Capacity-building workshops to support community-driven policy development • Translation of community priorities into policy
3					
Policy Development Phase 1	In this scenario, City staff/planners manage the policy development process and work with a number of community partners to engage community voice and participation at the outset of the process.	Trust is built between Community and City; City gains valuable information to develop a more effective policy; Community groups help to build the political will to pass the policy; ideally the collaboration continues into the implementation phase.	• An investment must be made in community capacity to participate in the policy development process • Because community groups don't have as much agency in the process, it may take more effort to facilitate engagement and buy-in; can become dissolution	• Organize or participate in Community Advisory Committee • Conduct or participate in Problem Definition & Community Assessment • Conduct or participate in Solutions Development and Possible Piloting • Organize and/or participate in Community Forums & Focus Groups • Hold Meetings with elected • Conduct Equity Impact Assessment	• Invitation to community partners to participate • Co-fundraising with community-based organizations • Planning (or co-planning) of community engagement events and activities • Translation of community priorities into policy • Co-development of equity metrics (or planning to implement pre-existing metrics)

POINT OF
ENGAGEMENT

DESCRIPTION

POTENTIAL BENEFITS

POTENTIAL COSTS

COMMUNITY ACTIVITIES

CITY STAFF ACTIVITIES

**Policy
Development
Phase 2**
**COMMUNITY
CONSULTATION**

In this scenario, City staff/planners manage the policy development process and wait until the policy is already in draft form before engaging any community partners

Community partners have the opportunity to provide critical input before a public unveiling of the proposed project thereby helping to screen for negative impacts and political roadblocks.

- An investment must be made in community capacity to participate in the policy development process
- This approach runs the risk of tokenizing community voice
- It may be too late to make significant changes to the policy

- Participate in community forums, focus groups, or surveys
- Conduct or participate in equity assessment of policy proposal
- Possible protest or complaint if recommendations are not heeded, and experience tokenization or being used to rubber stamp decisions that are already made

- Conduct community engagement process
- Facilitate equity assessment of policy proposal
- Translate community input into changes to the draft policy

**Public Review of
Proposed Policy**
**INFORMED
COMMUNITY**

In this scenario, community partners are not pro-actively included in the policy development process, but may take advantage of existing mechanisms to express support or objection to the proposed policy; and/or may be invited by city staff or elected officials to do so

Existing public mechanisms at least provide for people to be informed of proposed policy and have their comments recorded.

- Proposed policy has not been effectively vetted by the people who may be most impacted by it; potential impacts can include significant costs to local government downstream
- City staff/planners run the risk of community groups protesting the proposed policy and lobbying for 'no' votes.

- Prepare community members to make public comment
- Possible protest, depending on the potential impacts

Prepare for potential fallout

**Proposed Policy
Up for A Vote**
**MARGINALIZED
COMMUNITY**

At this point, it is too late for community groups to have any genuine input to the policy

Temporary time savings, not taking the time to engage community.

- Proposed policy has not been effectively vetted by the people who may be most impacted by it; potential impacts can include significant costs to local government downstream.
- City staff/planners run the risk of community groups protesting the policy if it passes.

Possible protest

Prepare for potential fallout

POINT OF
ENGAGEMENT

4

**Reform
Existing Policy
through
Community
Leadership**

**COLLABORATIVE
GOVERNANCE**

DESCRIPTION

In the case of an existing policy, community groups can work in partnership with City staff to assess it and develop a policy for repealing or amending it to undo roadblocks to community-driven solutions

POTENTIAL BENEFITS

Policy barriers to Community and City goals are removed; Collaboration between community groups and city staff is strengthened; builds community capacity to lead in the process.

POTENTIAL COSTS

- An investment must be made in community capacity to participate in the policy development process
- It may take more difficult to reform an existing policy than it does to develop a new one.

COMMUNITY ACTIVITIES

- Visioning & Priority Setting
- Problem Definition & Community assessment
- Solutions Development & possible piloting
- Collaboration with policy/planner to translate solutions into policy reform
- Development of metrics
- Organizing educational forums with City
- Meetings with electeds

CITY STAFF ACTIVITIES

- Co-fundraising with community-based organizations
- Attendance at and sometimes co-planning of community-based events and activities
- Capacity-building workshops to support community-driven policy reform
- Translation of community priorities into policy reform language and technical tools



Photo by Monserrat Soto



Behavior Change Communications

By Michael Shank, CNCA Communications Director

This article may be used as a resource to help guide your communications, campaigns or community engagement activities. It is based on the social impact research of ideas42.org and connects key psychological principles of applied behavioral science to the climate and sustainability work of CNCA member cities.

In order to quickly move cities towards carbon neutrality, one social science game changer that needs to be scaled up is behavior change communications. Few of the more technical game changers – enumerated in [CNCA's](#) report – will be possible unless public and political will is mustered, mobilized and maintained.

This article delves into 12 behavioral science-based principles to consider when rolling out sustainability initiatives in cities. These principles are well-known to the fields of sociology, psychology and behavioral economics (and explained succinctly by [ideas42](https://ideas42.org)) and will be helpful in thinking through how we apply them to our work.

These 12 principles offer useful guidance in the rolling out of any of our game-changing strategies. With each principle, we'll take a look at how a CNCA city's climate and sustainability initiatives are relevant and how they're organized and communicated to the public. Let's begin.

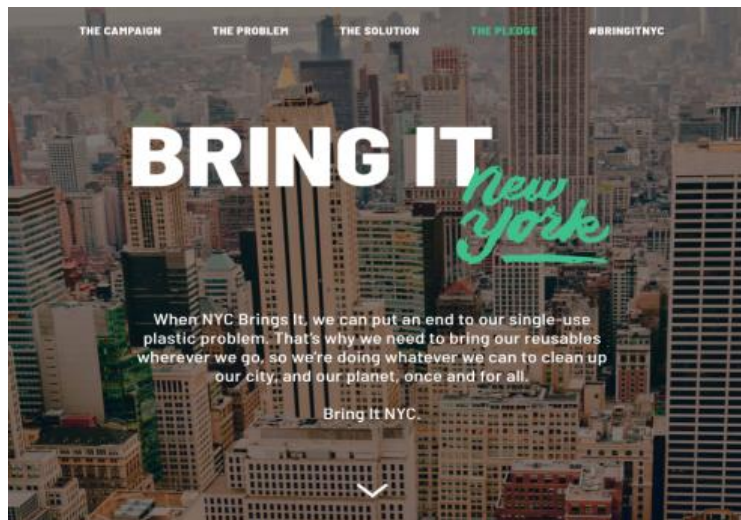
#1 Choice Overload



It's not uncommon to find CNCA member websites advocating for myriad actions and initiatives, because the work is massive in scope. Whether it's big building retrofits, green energy installs, public transit improvements, waste management, bike lane build-outs, or household weatherization, there's so

much that needs to be pursued *now*. But is there a way to deliver this to users that doesn't cause choice overload? And is there a way to deliver it, as [ideas42](https://ideas42.org) put it, that decreases the number of choices presented and increases the meaningful differences between them? What if CNCA members' climate webpages offer a featured action of the month? And we encourage users to take that *one* action during that *one* month. And all of our communications center around that one action. And then, the next month, we roll out a new action that we want residents to take. Residents who are ahead of the curve can always explore more actions: the website could have in the background (off to the side) an easy-to-navigate catalogue of the 12 actions (that run concurrently with the calendar year) that all residents can take to help the city and homes/communities be greener, more efficient and healthier.

Exercise: Take a quick look at your city's communication materials to see if a user might feel choice overload and, as a result, feel too overwhelmed to take action. How could you simplify so that users are directed to one or two priority actions that they can take now?



Example: New York City's "[Bring It](#)" campaign has a singular ask - to bring reusables wherever one goes - and the entire website is devoted to that ask. It avoids choice overload by prioritizing and featuring only one ask, one activity, in this campaign. You can see on their website that even the navigation bar is avoiding choice overload, identifying one problem and one solution. It's empowering for people to get involved in singular campaigns like this; the completion of the task feels more fulfilling when there's not a laundry list of tasks that follow.

#2 Cognitive Depletion and Decision Fatigue



There's plenty of research in the social science field on how fatigue makes for bad decision-making. Considering this when we reach out to the community to build public and political will, are we cognizant of when and where they might be fatigued (and thus less equipped to support our climate initiatives)? And when we're hosting events, are we bringing food so that we're enabling the community of decision-makers to be well-equipped to get on board a sustainability decision?

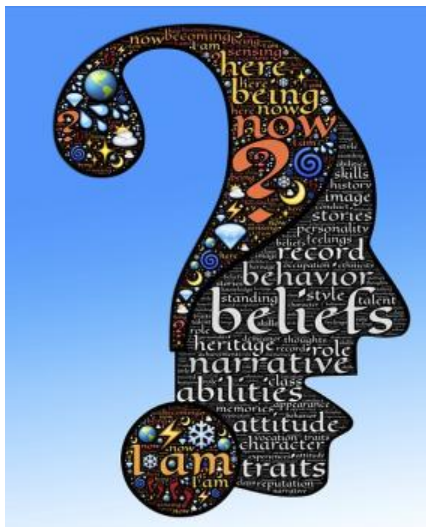
Mindful, also, of how our communities are often underserved in their ability to receive and maintain proper nutrition, how are we managing this food insecurity and working with other city departments to help ensure that the community has what they need? This is a great example of how social and environmental sustainability are interconnected and how we must work together to ensure the community has the resources they need to make the healthiest decisions they can.



Example: Partnering with restaurants, bars and beverage companies can help with cognitive depletion and decision fatigue as Yokohama did here in their partnership with Starbucks for the "[Nothing is Charming](#)" campaign. The campaign was held inside Starbucks coffee houses to raise awareness about the benefits of using less electricity.

Can we make it more enjoyable, more
more willing to undertake the effort and
company, with free food, while having a fun time.
's do everything we can to make it hassle-free),
ee food.

#4 Identity



CLIMATE EMPOWERMENT | 14

Exercise: If you were to do a scan or audit of your climate communication vehicles (printed materials, speeches, websites, social media, etc.), how are you being mindful of your community's many identities and how are you tailoring your message to be respectful of and resonate with these worldviews? Ultimately, we want everyone to see our work and connect with it. That means we'll want any and all of our behavior change-related communications to be sensitive to and respectful of the identities that are coming to our events, our websites and our action requests. Let's make sure they see themselves in our work.



Example: Vancouver taps into city/resident identity and city/resident pride with their “greenest city” framing here. This identity framing appeals to people’s – and the city’s – competitive spirit and desire to be first.

#5 Limited Attention



When our communities don't immediately respond to our climate requests it's not because they're not interested. Perhaps they only heard it once from us, perhaps they never heard it at all, or perhaps other priorities took their attention at the time. Mindful of our own limited attention spans, and being cognizant of all that's taking priority in residents' lives, how do we make it easy for them to hear from us by repeating and reiterating our

work through every possible channel that might reach them? Are we simultaneously using radio, television, billboards, community newspapers and newsletters, local associations and advocacy organizations, religious halls, phone and email, text and other ways to communicate with the public?

While this may sound time-intensive (and it is), it'll be necessary if we want to truly engage the community and transform the policy. Surrogates and liaisons can be helpful here, as we don't have all the inroads and we don't always have the credibility as communicators that more local leaders might, so employ others if/when possible. But we have to reach our audience often.

Exercise: Take an audit of the frequency of your city's communications. How and when are you repeating and reiterating and is it resonating? And if not, let's pre-test and focus-group these messages to ensure that it's the right wording and the right messenger for the right identities.



Example: San Francisco's [recycling page](#) understands the limited attention span of internet users by directing the eyes to the desired action. They use white space (also known as negative space) to turn the user's attention to the desired actions.

#6 Loss Aversion



People have an intrinsic disdain for loss. We get attached. And we hold onto that attachment – be it emotional, relational, physical or spiritual. So, how do we communicate our climate work in such a way that it's mindful of the public's proclivity for avoiding loss? When we think about what people care about – quality of life, standard of living, ego, money, health, and physical security – are we articulating our work in such a way that is mindful of what they don't want to lose?

Habitat or species loss quickly translates here, as does the quality of life lost, the money lost, the health lost and the security lost from fossil fuels, global heating, and extreme weather. But can we also build new attachment to the kind of world we're trying to build? For example, after a city turns a few previously road-trafficked blocks into a pedestrian-only zone, full of beautiful park amenities, and encourages active public engagement in that new space, it's much more likely that the public will become attached to this new reality and want to replicate the experience elsewhere.

How do we show that life is better in this new greener world? There's a lot of natural, intrinsic fear in letting go of the known fossil-fueled experience. One way to offset this fear is to provide experiences for people to build new attachment to the new reality that we're trying to create. Most people who have a personal experience and bond with something that's impacted by global heating – a polar bear, a vulnerable community, a seaside view – are more likely to do everything they can to protect it. In our messaging and mobilizing, let's give them something specific to protect.



Yes, we love to swim in Oslo in the summer! And we love it most of all when we have a secluded sunbathing spot all to ourselves. Luckily there are several places where this is a distinct possibility.

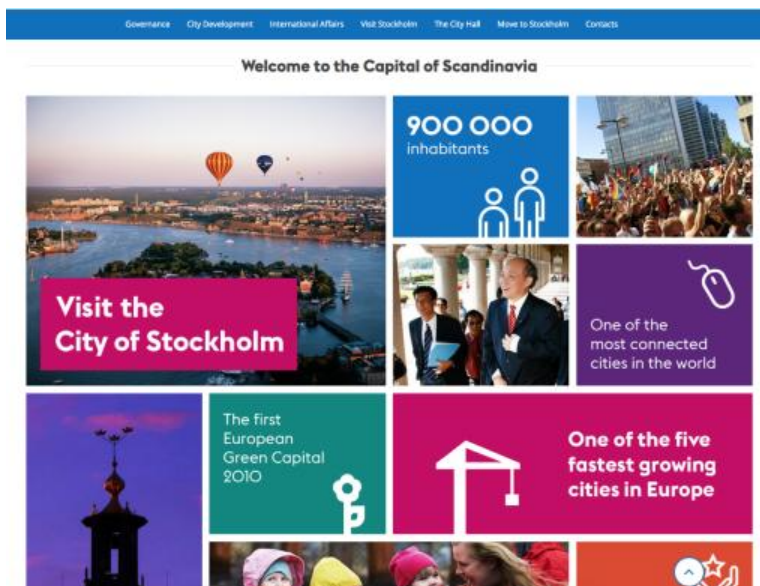
Example: [Oslo's climate website](#) talks first about hidden swimming gems as a way of discussing the importance of protecting water quality. The webpage doubles down on the emotional attachment so that the user will then want to avoid the loss (of these swimming gems) that could result from poor water quality.

#7 Primacy Bias



There is a bias towards information that's presented first, versus information that's less visible. How does that bias impact how we message climate, then? Is it presented in a highly visible way on our websites and do we have social media channels specifically devoted to our climate and sustainability work (to send a message to the public that this is a priority)? Are our mayors and city staff leading with the climate message or are they placing it last on a list?

Exercise: Mindful of primacy bias, it's worth scanning city communication vehicles to see if climate is presented prominently and if not, is that negotiable at all within the city? How can we inch up the city's climate offerings so that, from a behavior change communications perspective, we're on the top, not the bottom, of any city list?



Example: See how Stockholm presents itself to the world in this picture. On the landing page, it prioritizes its green leadership as one of its key selling points, alongside "most connected" and "fastest growing". This sends the message to the world that being a "green capital" is an enduring priority and selling point for Stockholm.

#8 Procrastination



Everyone procrastinates on something at some point in their day/week/month, which is why any far off “2050” framing for our climate initiatives is potentially problematic. Even 2040 or 2030 seems far off. People will wait until the last minute to do whatever it is we’re asking them to do. It’s why it’s problematic for us to talk about future impacts; it merely reinforces the proclivity to procrastinate. We need to talk about impacts that are happening here and now. We need to

offer easy, bite-sized steps that anyone can take now. And we need public-friendly short-term climate goals and deadlines to balance our plethora of long-term climate goals.

People are more likely to take action now if it’s easy now, they can see the difference now, and the goals are relevant now. We need to refocus our communications and public engagement on the 2020 and 2025 realities so that people’s penchant for procrastination is countered by near-term realities and possibilities.



Example: Boulder’s “Four Actions with Impact” aims to get people moving now with simple actions they can take now. [The videos](#) show normal residents taking simple actions in four areas. This helps the user feel like it can be done, that it’s pragmatic and possible, and helps prevent the procrastination that often comes with climate action due to feelings of overwhelm or inefficacy.

#9 Social Norms

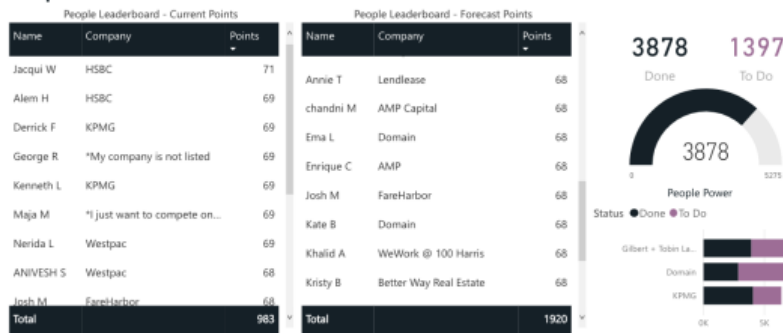


We all know the power of social norming. Approval matters. We all know the study that shows that if your neighbor has solar panels, you’re more likely to get solar panels. And if your neighbor is saving money on their utility bill, due to some energy efficiency measures, you’re more likely to pursue the same or better savings by taking similar action. Given this, how can we use our city communication vehicles to show that a movement is happening in our cities and that our public and private sectors are changing the game?

How are we reflecting back community actions so that residents and building owners see their peers taking action across the city and are motivated to do what others are doing?

We recognize that it'll take time to present a picture of what the new (green) social norm is within the community. Reflecting back the green actions happening within the community not only works from a social norming perspective, but in the field of climate action, where people can feel like their individual action won't make a big difference, this reflecting back can also lift people up emotionally, provide inspiration and hope, and counteract defeatism.

People



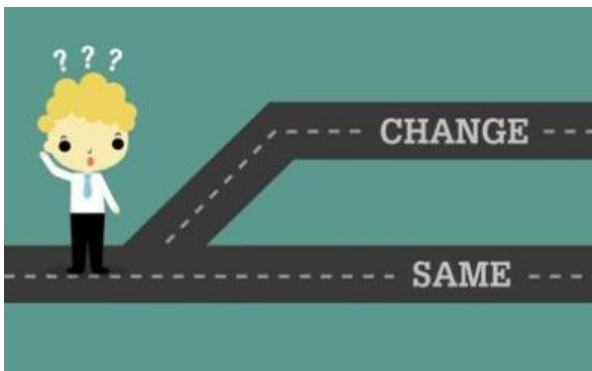
Activities

Building Activities
Status ● Done ● To Do



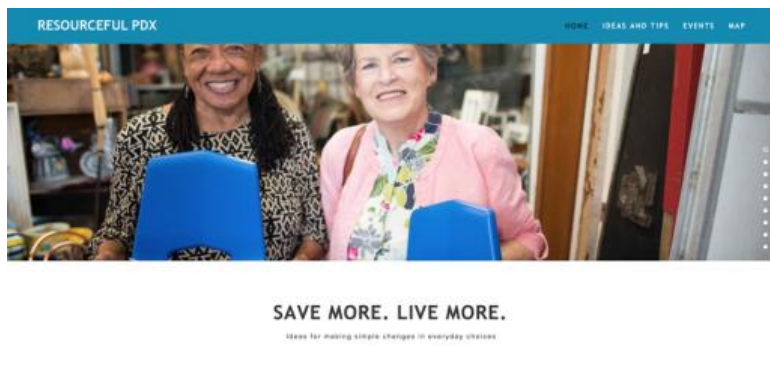
Example: Sydney, in its partnership with the [Better Buildings Cup](#), is working to create social norms for greener living and greener buildings. By creating competitions that track waste and energy management and then mirror back the results and the winners on their media channels, this effort is conveying to the public that many people are doing this and, thus, so should you. Their sites show lots of activity in this space, show people having fun, and show plenty of diversity (in action taken and persons taking action) so that the user feels represented in this space.

#10 Status Quo Bias



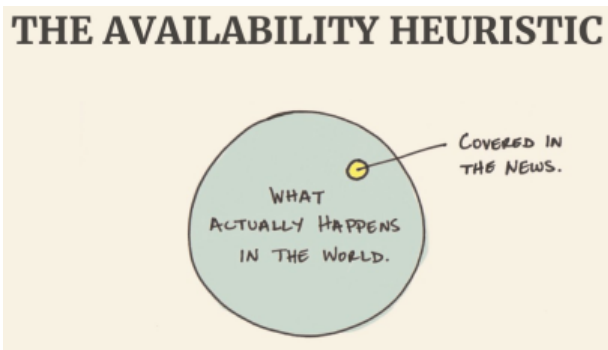
Default settings are powerful. We like routine. If a status quo has been established, we're less likely, in general, to deviate from that. So, how does this principle impact our city-based, climate-focused behavior change communications?

Let's reach people within their routine, versus asking them to find us, which is often outside of their routine. Let's meet them with our messages and messengers and go to where their routines take them. Let's set up default settings that are more sustainable, with opt-out versus opt-in options (since the former produces significantly higher participation rates than the latter). And let's take this further so that the new status quo is increasingly sustainable.



Example: This [Portland partnership](#) presents “ideas for making simple changes in everyday choices”. No big leaps here. It’s about living more and saving more. This is something people can stomach and it understands people’s proclivity for keeping the status quo. It gets a foot in the behavioral door with small bite-sized steps.

#11 The Availability Heuristic

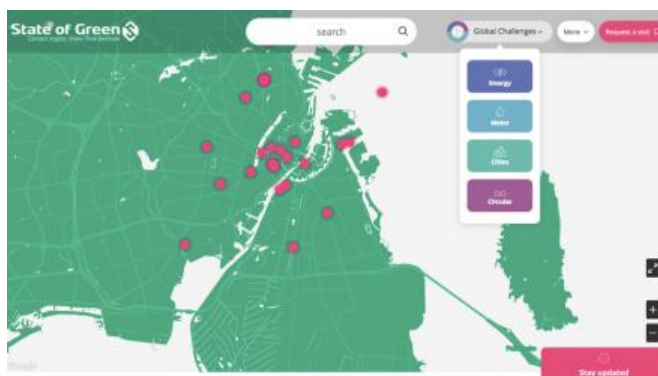


Our publics may think they’ve never experienced a climate impact before, or if they have there’s only been a few events, not many. This is due, in part, to the fact that the press and often policymakers aren’t contextualizing extreme weather events within a global warming reality. The availability of our climate memory, and how easily things come to mind where the climate dots are connected, is limited. This is a problem because, as ideas42

put it, “we judge probabilities based on how easily examples come to mind.”

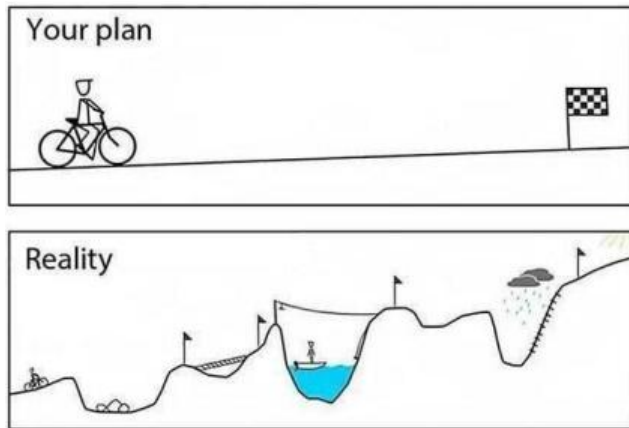
How are we chronicling for our communities, then, the repeated climate impacts so that the public is able to calculate more realistic probabilities because examples are more readily available to them? Can we use our media channels to document the climate impacts so that people have a more realistic assessment of probability? Similarly, how are we repeatedly showcasing solutions so that people have constant and common examples of the kind of behavior we’re encouraging? So that when they think of “going green”, there are plenty of highly public examples that come to mind.

The more we individually and organizationally message this – so that the public is seeing the city mayor and staff going green, too, in what they eat, drive, fly, wear and power – the more the public has available examples for mental and memory recall.



Example: Copenhagen’s partnership with [“State of Green”](#) to showcase the green initiatives happening across the city helps the user feel that there’s a lot happening. This site is presenting back to the community all of the activity in the climate space so that there’s ample available evidence and data for resident learning and discovering.

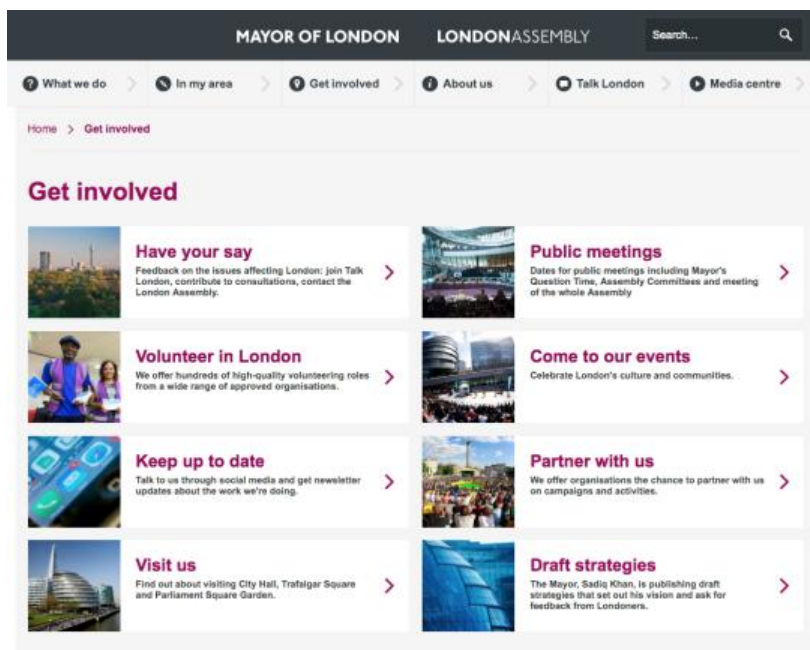
#12 The Planning Fallacy



Humans rarely account for and allocate sufficient time for a given task. We're overly optimistic about how much time it will take to accomplish a specific task. This has huge implications for any of our sustainability targets and timelines for 2030, 2040 and 2050. And why it's essential to be very clear about how much time these tasks will take. Reorient the deadlines so that it's an easier estimable planning period for the public (since we aren't often planning other tasks in 20 or 30 year timeframes). Admittedly, since

city-scaled game-changing will take time, we want to be both clear about the necessary planning and positive about our ability to accomplish the task so that the public isn't overwhelmed by the amount of time needed.

Give examples of similar time requirements (associated with other behaviors in their lives) so that any green initiative we're requesting has a salient comparison. By helping our communities know how much planning is required to make the necessary shifts, we help set expectations. And doing it in shorter increments (versus 2050 timeframes) may be helpful in making sure those expectations are realistic, the short-term planning is reported and made public, and everyone is witnessing what's involved.



Example: London provides ample options, which appeals to citizens of all sorts. It gives multiple time-sensitive and time-specific actions so that people can participate based on the time they have available to them. And we know that once we get them involved in one thing, they're more likely to take action in other areas.



UFMP Public Input Summary Report

January - June 2023

- I. Introduction
- II. Avenues of Input
- III. Reach of Engagement
- IV. Findings & Recurring Themes

Introduction

As approximately 80% of tree canopy in Knoxville is located on private property, it will take engagement and dedication by a wide range of players in Knoxville. This ranges from all residents, to public agencies like the City of Knoxville, utility companies, large landholders, institutions, the development community, foundations, nonprofit organizations, and engagement at the local level through neighborhood groups and other active entities working with the communities within Knoxville.

For this reason, it is vital to actively include the community in the Knoxville Urban Forestry Master Plan (UFMP) planning process. The goals of the campaign were to bring together the community in dialogue, to learn about the public's priorities related to tree canopy, as well as understand current local challenges and potential solutions.

This document provides an overview of the outreach campaign as well as a summary of findings. The project was facilitated and managed by Trees Knoxville, together with project consultant Urban Canopy Works.

Avenues of Input

The public gave input on the Knoxville UFMP in six different ways:

1. Meetings with Community Groups (30 groups, combined 800+ attendees)
2. Two Open Houses (89 people/views)
3. Online Survey (488 submissions)
4. Advisory Group Workshops (98 members, 3 workshops)
5. UT Workshop (30 attendees)
6. One-on-One Interviews (17 interviews)

Information on each of these avenues follow. Findings from all avenues combined can be found in the next report section *Recurring Themes / Findings*.

Avenue #1: Meetings with Community Groups

- January - May 2023
- Combined total of +/- 800 attendees

In an effort to “go where the public already is,” the project team put out an offer to meet with a wide range of groups or clubs across Knoxville about this project, and enter into dialogue the importance of trees, providing a forum to collect input. Notes were collected on the dialogue overall, and at the conclusion of each event, attendees were also asked to submit their comments via the online survey at the KnoxvilleTreePlan.org website. Paper copies of the survey were also provided for those uncomfortable with or without access to technology. Over the course of 5 months, Trees Knoxville met with 30 groups (shown below), reaching approximately 800 people directly.

January 2023

- *City of Knoxville Neighborhood Advisory Board*
- *Water Quality Forum*
- *UT Grounds Management ShortCourse*

February 2023

- *Dogwood Arts Home and Garden Show*
- *4th and Gill Neighborhood (Woolly Bears)*
- *South Knoxville Open House*
- *County of Knox Greenways Commission*
- *Knoxville- Knox County Food Policy Council*
- *North Hills Garden Club*
- *American Society of Landscape Architects - East TN Chapter*
- *Green Drinks*
- *University of Tennessee - Urban Forestry Class*

March 2023

- *Knoxville Area Association of Realtors (KAAR)*



- *Forest Heights Neighborhood Association*
- *Colonial Village Neighborhood Association*
- *Three River Market CO-OP*
- *Kiwanis Club of Knoxville*
- *Smoky Mtn Wild Ones Chapter March meeting*

April 2023

- *Parkridge Neighborhood Meeting*
- *Knox County Master Gardeners April meeting*
- *East TN Ornithological Society*
- *South Knoxville Neighborhoods Meeting*
- *Sierra Club-Harvey Broom Group*
- *East Knoxville Community Open House*
- *Roots in South Knoxville Earth Day Event*
- *Sequoyah Hills Neighborhood Meeting*

May 2023

- *Town Hall East's May Meeting*
- *Waterfest*
- *Alice Bell Neighborhood Meeting*
- *West Knoxville Open House*

Avenue #2: Two Public Open Houses (one virtual, one in-person)

- Virtual UFMP Open House - May 4, 2023 via Zoom
- In-Person UFMP Open House - May 11, 2023 at Cansler YMCA
- 40 attendees across both in person and virtual event, plus 49 views of recorded YouTube video of presentation.

Both a virtual and in-person UFMP Open House were held in May 2023 to not only present findings from the Discovery process thus far, but also provide a way for the public to voice what is most important to them. A recording of the virtual open house was also made available for later viewing, and housed on the Trees Knoxville YouTube channel - www.youtube.com/@treesknoxville

Both open houses included a fifteen-minute presentation from consultant Urban Canopy Works on tree canopy, why it is important, and what has been learned so far about Knoxville's urban forest. Following presentations, the virtual open house was opened-up for group discussion and Q&A, while the in-person open house had mini-stations to direct smaller conversations around urban forestry goals, challenges and solutions. Each of 10 stations was set up for community members to visit and provide input, and were staffed by Trees Knoxville volunteers. Stations asked attendees where they lived, where they wanted more trees, ideas on how to encourage tree planting and preservation on private property, what the challenges are (and solutions to) maintaining and improving tree canopy in Knoxville, thoughts on equitable tree canopy, and how they envision participating in this effort and finally an opportunity to Ask the Arborist any tree question they had.



Figure 1. Selection of photos from Knoxville UFMP in-person open house on May 11, 2023

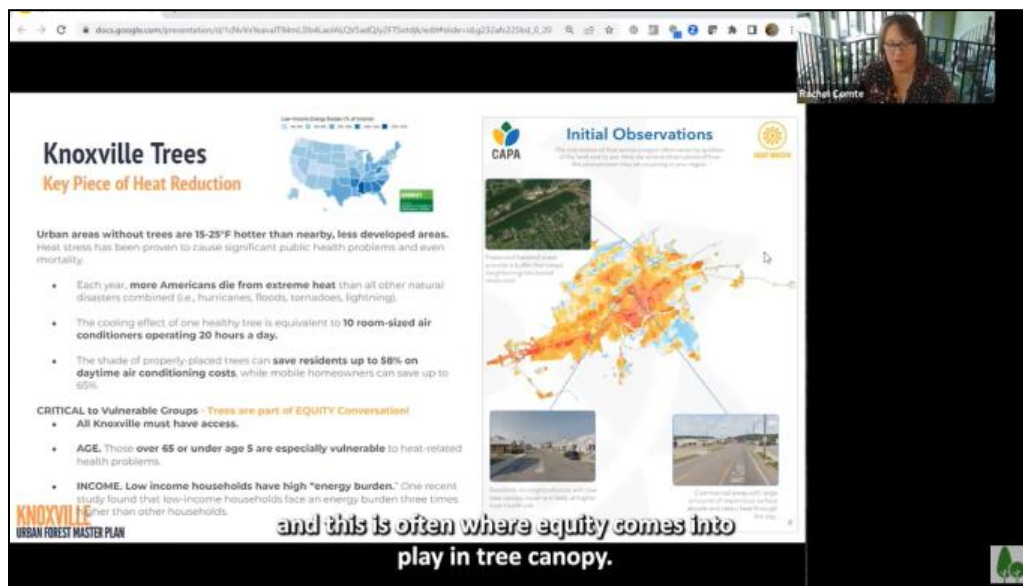


Figure 2. Screen shot of Knoxville virtual UFMP open house on May 4, 2023

Avenue #3: Web-Based Survey and Comment Form

- Online Comment Form live February 1 - June 7, 2023 at www.KnoxvilleTreePlan.org
- Total Submissions Received: 488

Throughout the project, extensive information on the UFMP process, Knoxville trees and canopy cover, and more was provided on the UFMP website www.KnoxvilleTreePlan.org. The site also included an online public comment option in which anyone could provide their input and ideas. Questions mirrored the input requested at the open house above, as well as in the workshops, including:

1. Top three most important roles of trees.
2. Top three biggest challenges with trees.
3. What should our goal(s) in Knoxville be regarding trees and tree canopy?
4. What are the challenges we are likely to face when working toward those goals?
5. What are some solutions to those challenges?
6. What else would you like to tell us?

KNOXVILLE
URBAN FOREST MASTER PLAN

Home UFMP Process About Knoxville Trees Plan Updates Get Involved

What do you think?

Let us know your thoughts, questions and concerns, wishes and goals, regarding Knoxville's urban forest by filling out the input form below. **This form will be open until June 7, 2023.**

Name *

First Last

Email *

Do you live (or work) within the boundaries of the City of Knoxville? *

☐ Yes

☐ No

If so, what part of Knoxville do you live in?

Unsure/Other

Most Important Role of Trees (choose 3) *

☐ Heat Reduction

☐ Flooding Reduction

KNOXVILLE TREES COMMUNITY EVENTS
www.knoxvilletreesplan.org

2023-2025 URBAN TREES COMMUNITY EVENTS

APRIL 10 South Knoxville Conversation (SKNBC)
6 p.m. at Ijams Nature Center
Registration not required - just show up!

APRIL 11 East Knoxville Community Open House
5-7 p.m. at The Jacob Building
Registration not required - just show up!

APRIL 19 Urban Trees Workshop at UT
3-5 p.m. at the Student Union - Ballroom A
Registration not required - just show up!

MAY 4 Virtual UFMP Open House
6-7:30 p.m. via Zoom
Registration required - available on website.

MAY 11 In-Person UFMP Open House
4-7 p.m. at Candler YMCA
Registration not required - just show up!

Can't make any of these? Invite us to come to your next meeting or fill out the online survey at knoxvilletreesplan.org

Invite us over!

Consider inviting us to your next neighborhood or organization meeting so we can come talk to your group about this project and get your perspectives.

[Contact Kasey Krouse to schedule!](#)

Other ways to engage.

Figure 3. Online survey page on KnoxvilleTreePlan.org

Avenue #4: Advisory Group of Community Organizations

- 98 member advisory group
- 3 sequential workshops over three months

Two stakeholder groups were formed to guide the development of this work: the Steering Committee and the Advisory Group. The Steering Committee was made up of 15 people representing Trees Knoxville leadership and project partners (KUB, Keep Knoxville Beautiful, City of Knoxville and the University of Tennessee). This team worked together at the beginning of the project to develop a 98-member UFMP Advisory Group that would meet multiple times to provide in-depth knowledge and insight into Knoxville's urban forest.

The advisory group was made up of representatives from a wide array of entities within the Knoxville community, including non-profits, city/county staff, utilities, development, architects/engineers, green industry professionals, foundations, schools & campuses, a representative from each neighborhood, and more. Representatives invited to join the group were required to commit to attending three workshops, designed to collectively explore

current conditions in Knoxville, and start identifying community goals, as well as challenges and their solutions. This forum-style workshop format provides an opportunity for the community at-large to self-evaluate the sustainability of Knoxville's urban forest. The full member list for both of these groups can be found at

www.KnoxvilleTreePlan.org/ufmp-process.html



Figure 4. Selection of photos from Knoxville UFMP Advisory Group at the first workshop in February 2023.

Avenue #5: UFMP Workshop at the University of Tennessee

April 20, 2023, 3-5pm. 30 Attendees

A workshop was held at the University of Tennessee on April 20, 2023, open to the public. Similar in format to the advisory group workshops, this event started with a short presentation on the importance of trees and findings to date, and then prompted small groups to brainstorm and discuss what Knoxville's goals are, the big challenges to reaching those goals, and innovative solutions to move forward.



Figure 5. UFMP Workshop at the University of Tennessee Student Union, on Wednesday, April 19, 2023.

Avenue #6: One-on-One Interviews

In addition, 17 one-on-one interviews were conducted to explore specific areas of urban tree canopy in Knoxville. These included interviews with city departments and elected officials as well as representatives from organizations across the community. Interview findings will be used to help develop the plan.

Reach of Public Input Process

As public input data was collected, location data was requested to ensure comments and outreach included as many communities in Knoxville as possible. Figure 6 only represents the data collected from the online survey, where other neighborhoods were reached through other avenues of input. Most neighborhoods were represented from the online survey, though some more heavily than others.

Comments received online by neighborhood:

Responses	% of Responses	Knoxville Neighborhood
58	12%	South Knoxville / Old Sevier
36	7%	Holston Hills
33	7%	Island Home / South Haven
25	5%	Fourth & Gill / Old North Knoxville
24	5%	North Hills
21	4%	West Knoxville
20	4%	North Knoxville
19	4%	Fountain City East
19	4%	Sequoyah Hills
17	3%	Bearden
14	3%	Bearden Village / Westwood / Forest Heights
14	3%	Downtown / Market Square
11	2%	Parkridge
11	2%	University of Tennessee
10	2%	Chilhowee Hills
9	2%	West Hills
7	1%	Lincoln Park / Oakwood
6	1%	Alcoa Highway
6	1%	Fort Sanders
6	1%	Vestal / South Waterfront
5	1%	Woodlawn
4	1%	Colonial Village
4	1%	Delrose Road
4	1%	Fountain City West
4	1%	Whittle Springs / Alice Bell

Responses	% of Responses	Knoxville Neighborhood
3	1%	Beaumont / Western Heights / Mechanicsville
3	1%	Charter Doyle
3	1%	Deane Hill / Bearden Hill
3	1%	Timbercrest / Middlebrook Heights
2	0%	Amherst
2	0%	Belle Morris
2	0%	Burlington / Park City
2	0%	Cumberland Estates
2	0%	Morningside
2	0%	Norwood North
1	0%	Callahan Drive
1	0%	Chilhowee / Zoo
1	0%	Civic Coliseum
1	0%	Five Point / Park City
1	0%	Inskip
1	0%	Knoxville Center Mall
1	0%	Marble City
1	0%	North Middlebrook
1	0%	Norwood South
1	0%	Norwood West
1	0%	West View
66	14%	Unsure/Other
488	100%	

Figure 6. Summary of neighborhood response quantities of online survey.



Additionally, open house attendees were also asked to put a pin on a map to indicate where they lived, as shown in Figure 7.

Figure 7. In-person Open House attendees pinned a dot on a board to indicate where they lived.

DEUSA Fleet Success Stories: City of Knoxville, TN



Location: Knoxville, Tennessee

Fleet type: Light-duty electric vehicles

Narrative: The East Tennessee Clean Fuels Coalition (ETCF) began working with the City of Knoxville and its Fleet Services Director Keith Shields in the 2010s to consider and evaluate multiple alternative fuels. The city developed plans around securing several different kinds of alt-fuel vehicles including heavy-duty CNG vehicles, off-road propane mowers, and hybrid vehicles early on, garnering quite a few hybrid vehicles and then growing their propane mower program to nearly 20 mowers (and thanks to the Propane Council, ending up with an [excellent video](#) about the fleet). Around 2015, they began looking more carefully at acquiring light-duty (LD) electric vehicles (EVs).



The city purchased its first LD EVs in 2018, putting them into service in early 2019. They were two Nissan Leafs (the photos below show one of those first two Leafs, and Shields with it in the top photo). Since then, they have purchased six more Leafs (three received in 2021 and three received in early 2022). Those Leafs are used in four different city service departments including Inspections, Civil Engineering, Housing & Neighborhood Development, and Fleet Services. The original two Leafs were basic Leafs, while the purchases since have been Leaf SVs and SV Plusses.

A core partner with the City of Knoxville's Fleet Services team is the city's Office of Sustainability. The Office of Sustainability installs and manages free public EV charging at city-owned parks, parking garages, and offices. Their team took over previous public-private partnership installations and began offering free charging in 2017 as a way to incentivize EV adoption to residents and visitors to Knoxville. The Office of Sustainability, formed in 2007, works with elected officials to set ambitious greenhouse gas (GHG) reduction goals and implement operational strategies with other city departments.

After exceeding its 20% by 2020 goal, the Office of Sustainability sponsored a city council resolution to set a 50% by 2030 operations target and an 80% by 2050 community-wide target. To set a path to



achieve those goals, Mayor Indya Kincannon convened the “Mayor’s Climate Council,” led by Sustainability Director Brian Blackmon, which held numerous meetings during 2020 and 2021. ETCF representative Jonathan Overly served on the Transportation Technical Working Group which reviewed and recommended priorities for the city to adopt. With input from the technical expertise of committee members, the city produced the “[2021 Energy & Sustainability Work Plan](#).”

Spurred by the new priorities, the city’s Fleet Division, now under the leadership of Nicholas Bradshaw, began refining past fleet-procurement planning in partnership with the Office of Sustainability. The city adopted a [Green Fleet Policy](#) in 2021 that uses a Total Cost of Ownership (TCO) model to evaluate future purchases, and the policy outlines a five-tier system wherein the highest, cleanest tier should be purchased if the technology is available and fares well in the TCO modeling. Tier 1 includes only zero-emission vehicles; Tier 2 is an alternative fuel vehicle; Tier 3 is a hybrid vehicle; and Tiers 4 and 5 are gasoline and diesel vehicles, respectively. Since the development of the plan, the city has ordered 21 additional EVs (now including Hyundai Kona Electrics) as they retire gasoline vehicles in their fleet. *Mr. Bradshaw is proud to say that his Fleet Department has not purchased a non-emergency light-duty vehicle that does not utilize electricity or alternative fuels in the past three years.* (Along with their EV work, the Fleet Division has also implemented a renewable propane program and is growing vehicle use of that fuel in LD vehicles.)

The city’s Office of Sustainability has also increased available EV charging throughout the city. In 2022, the city developed a GIS-based site analysis tool that considers the potential viability of new city-owned EV installations. It considers nearby housing density, traffic volumes, and proximity to commercial properties, but also includes equity factors such as car ownership, income, and localized air quality. They’ve also created an interactive map that allows residents to drop pins on a map, along with some context about why they may need charging in that area, to request new installs that are considered when evaluating potential new replacements. The city has used this information to place four new sites in the last year, and through a partnership with the local electric utility (Knoxville Utilities Board) will place a new public fast-charging location soon.

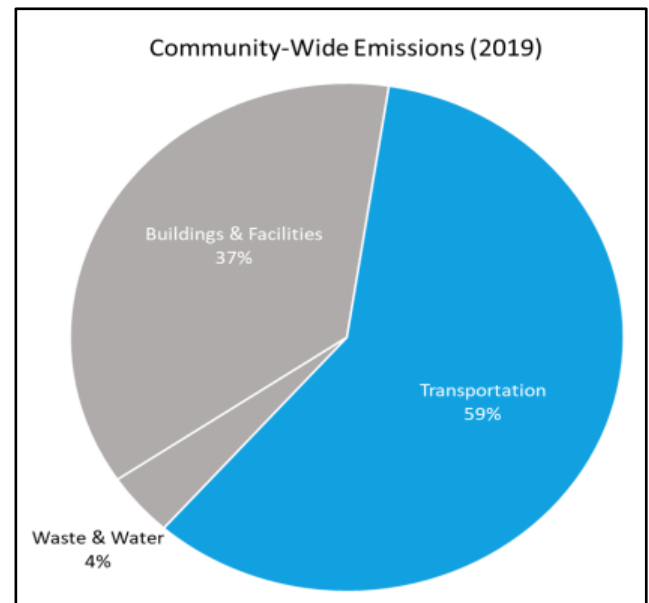
Outputs & Outcomes: The *outputs* from the city’s efforts are numerous but clearly include a ramping up of EV purchases, as well as the creation of the Green Fleet Policy and Energy & Sustainability Work Plan. However, the City has produced [numerous informational pages and links](#) for citizens to learn about EVs on their website which gives community citizens easy access to know what is going on in their city with cleaner-vehicle planning. Another outcome from their work was the continued expansion of free charging around the city in parking garages and at city parks, which has grown to [31 Level 2 charging ports at 12 sites](#) in 2023.

The *outcomes* from this work span several layers:

1. The GHG emission reductions from each LD vehicle replaced with an EV in the city are on the order of 70%, which is huge (and depends on the fuel economy of the vehicle that it replaced).
2. It helps the city and community make inroads toward the developed climate impact reduction goals. (See the graph below from 2019 that shows the magnitude of the community wide transportation-based GHG problem; see the [discussion and graph here](#) on the city’s website.)
3. More community citizens and visitors to the area see EVs at work around the city.

4. The city and the local EV chapter (KEVA, the Knoxville EV Association) work together more on publicizing information about EVs, which in turn educates more citizens about the benefits of EVs while breaking through perceived barriers in the minds of potential EV owners.

Best Practices & Lessons Learned: Having been a part of some of this work and witnessing first-hand the city's efforts, it boils down to a) having a good team to work collectively on the mission, b) setting clear goals, and c) selecting your working partners carefully. It is not uncommon for cities and their sustainability offices to have limited experience with EVs and EVSE (EV chargers), so learning along the way is part of the process. One lesson learned is to select your EVSE partners carefully, and do your homework on their service after the sale.



Madison preparing for big leap in air quality monitoring

Mosiman, Dean

Wisconsin State Journal

May 15, 2023

May 16 - With some of the state's highest concentrations of air particulate matter pollution in recent years, Madison is moving to use a big federal grant to install a citywide network of air quality sensors to provide real-time information at the neighborhood level and address health disparities.

The City Council on Tuesday will consider amending the capital budget to accept the \$430,000 grant from the U.S. Environmental Protection Agency and execute an agreement with the EPA authorizing non-competitive contracts with a leadership team to implement the project. Currently, the city has two regulatory-grade air quality sensors, but the initiative will install a network of 68 sensors focusing on particulate matter across the city, which will deliver far better information on when and where that type of pollution happens.

"This would make Madison the most monitored community in Wisconsin with regard to particulate matter," said Tim Bertram, a professor of chemistry at UW-Madison and a member of the project's leadership team.

The project is important because particulate matter air pollution, especially fine particles, poses serious risks to respiratory and cardiovascular health, the city's project plan says.

Solid particles and liquid droplets suspended in the air are known as particulate matter and include everything from dust and pollen to fine particles that result from smoke or from tailpipe and smokestack pollutants. The fine particles (known as PM2.5), can penetrate deep into the lungs and even the bloodstream, causing breathing problems, heart attacks and even premature death in people with heart or lung disease.

The project's leadership team, which includes the city, the Foundation for Black Women's Wellness, the Latino Health Council, the Hmong Institute, Public Health Madison and Dane County and UW-Madison will engage the community through multiple venues to raise awareness about the connections between air quality and health, especially regarding people of color.

Using data from the sensor network, the city will show the distribution of particle matter pollution across the city, identify neighborhoods experiencing the highest levels of pollution, and work with the community to determine next steps for improving air quality and protecting the health of residents.

The funds will be used to install the network of air quality sensors on city-owned light and traffic signal poles throughout the city and support community engagement to provide greater awareness, education and action to address disparities. The Foundation for Black Women's Wellness, Latino Health Council, and Hmong Institute will each receive \$50,000 and UW-Madison will get \$37,019.

"Clean air is fundamental to the health and well-being of everyone in our community," said Jessica Price, the city's sustainability and resilience manager. "But exposure and vulnerability to air pollution are experienced more acutely by people with low to moderate income, (Black, Indigenous and people of color) communities, people with disabilities, children and the elderly."

The city plans to start installing the sensors next summer.

Serious risks

In Madison, there are two regulatory-grade air quality sensors - Madison University Avenue established in 1992 and Madison East established in 1999 - that are run by the state Department of Natural Resources.

While Dane County is in compliance with federal air quality standards, the sensors in Madison have detected some of the state's highest concentrations of particulate matter in recent years.

From 2018 through 2020, the University Avenue station recorded the second-highest annual PM2.5 and the highest 24-hour PM2.5 of all sensors in the state DNR's ambient air monitoring network. The Madison East station recorded the fifth-highest annual PM2.5 and the third-highest 24-hour PM2.5 in the state.

Research by UW professor and project partner Tracey Holloway has found that vehicles are the leading contributor to high particle matter pollution in Madison, followed by sources such as buildings and power plants, Price said. Over the past few years, the community also has seen an increase in the number of air pollution events that are related to the long-range transport of smoke from wildfires in the western U.S. and Canada, Bertram said.

While the current sensors give a broad understanding of air pollution in the region, they aren't able to identify differences across Madison's neighborhoods.

Exposure and vulnerability to air pollution are experienced more acutely by low- to moderate-income residents, BIPOC communities, people with disabilities, children and the elderly. In Wisconsin, BIPOC and low-income communities are disproportionately burdened by respiratory and cardiovascular illnesses.

Getting real-time, ground-level information from the new sensor network, combined with satellite data, will enable an understanding of locations, magnitudes and potential sources of particulate matter, and inform short- and long-term solutions to improve air quality and protect community health.

Bertram, with input from the leadership team, will design the spatial arrangement of the air quality sensor network to provide the best data on ground-level particulate matter. Community members will be invited on-site for the installation of three to five of the sensors.

The project's community partners will provide community-based expertise for the project's development and help disseminate the findings, Price said.

"The project partners will work together to raise awareness about the connections between air quality and health, spread the word about this new source of air quality information, and provide resources so folks can reduce their own and their family's exposure to particulate matter pollution," she said.

The leadership team will plan a host of community engagement activities and the city will create a web page for the project where the public can get information about project aims, progress and outputs. The city and partners also will host multiple opportunities to engage in the project.



PRESS RELEASE

Conservation voters launch innovative canvass campaign

By Wisconsin Conservation Voters - Oct 12th, 2023 03:32 pm

MADISON – Wisconsin Conservation Voters launched a door-to-door canvass last week to spread information about the benefits available to them through President **Biden**’s Affordable Clean Energy Plan, the largest investment in climate in the country’s history.

“We all want to do our part to protect the environment, and now we can, thanks to the largest investment in clean energy in U.S. history. President Biden’s Affordable Clean Energy Plan allows consumers to make major home purchases – things like solar panels, electric appliances, energy efficiency measures, and much more – with major cost savings,” said Deputy Director **Seth Hoffmeister**.

The campaign’s goal is to knock on 80,000 doors and have 15,000 conversations in the coming weeks. And, with continued support, the goal is to make that footprint even bigger, and deliver this information to thousands more people and households.

As part of the campaign, Wisconsin Conservation Voters built this webpage filled with resources for folks interested in saving money under the plan.

NOTE: This press release was submitted to Urban Milwaukee and was not written by an Urban Milwaukee writer. While it is believed to be reliable, Urban Milwaukee does not guarantee its accuracy or completeness.

Naturally Occurring Affordable Housing Project

Multifamily Owners Interviews Summary

Multifamily owners need:

- Fast payback time** for efficiency upgrades - a focus on the **bottom line**
- Single point of contact** for upgrade work
- Guidance** to interpret incentive options
- Technical assistance** to complete upgrades
- More durable and longer lasting** appliances
- Good **customer service** for tenants
- Resident education**

How do we preserve affordable housing and provide energy, water, and health upgrades?

Naturally Occurring Affordable Housing

Naturally Occurring Affordable Housing (NOAH) stock is considered to be affordable based on the rents charged and the average median income of its residents which tend to be at or below 80% of the area median income. Over 40,000 units of NOAH stock exist in Dane County, which comprises a notable amount of affordable housing options. It typically consists of small size buildings (often less than 30 units) and is privately owned and managed by small companies.

Who did we interview?

We interviewed over 24 property owners and programs working with them in the Dane County area to understand their experience with energy efficiency, water, and health upgrades. Seven NOAH properties have been selected for a pilot program to conduct assessments and understand challenges and opportunities for upgrade implementation.

When things aren't broken, owners often do not want to replace them. More efficient equipment can be a harder sell, but if the equipment we're offering is durable and high quality with cost-saving measures, they may be more interested.

What do the owners know about rebate/incentive programs?

Owners understand that incentives exist to help reduce the cost burden of the potential upgrades, however, some say that the incentive levels are not high enough to meet their financial needs, especially the smaller owners who do not have as much cash flow. Some owners have suggested that seeing the payback math done for them would be helpful, with clear graphics and figures to explain the financial benefits (ROI) they would receive from these upgrades. Many owners also lamented the overwhelming paperwork, which can be confusing to understand, saving a navigator-type role present to explain the choices may be beneficial. For example, some owners are interested in saving energy costs through heat, so smart thermostats may be a target incentive option to suggest.

What impact could this have on NOAH stock?

Reducing energy and water use in Dane County's NOAH housing stock is a key climate planning strategy, and providing owners and managers with the means to reduce operating costs is critical to maintain affordability. Enhancing resident health and comfort, reducing utility bills, and providing resiliency for these homes is a key strategy to provide a more equitable and sustainable housing market.



https://www.wkow.com/news/environment/the-city-of-madison-mayors-office-has-announced-a-new-building-energy-saving-program/article_11f1dcfe-1ed0-11ef-88c0-17f8cf4687b3.html

The City of Madison Mayor's Office has announced a new Building Energy Saving Program

By: Lauryn Abozeid

May 30, 2024



MADISON (WKOW) – The City of Madison launched a new program designed to target building energy efficiency on Thursday.

The Madison Common Council adopted a new program, the Building Energy Saving Program (BESP) last year that is supposed to improve the energy efficiency of buildings across the city. The program requires commercial building owners of lots over 100,000 square feet to enter a portal and benchmark their building's register, by September 6th.

Buildings that benchmark consistently are calculated to save an annual 10 percent, and tune-ups cuts 12 percent of energy use on average.

This new program will reduce energy waste, cut pollution, and save building owners money. According To the City of Madison Mayor's Office, the BESP will reduce 91,000 tons of CO2 greenhouse gas emissions.

“We’ve provided an array of resources to help building owners and managers successfully benchmark their building’s energy use. There’s never been a better time to start measuring energy use, setting goals, and taking action to improve efficiency,” Madison Mayor Satya Rhodes-Conway said.

The City of Madison will be having a virtual training for building owners, walking them through the benchmarking and reporting process. This training will be offered multiple times throughout the next six weeks.

The Covered Building List of 2024 has all buildings that have to register for benchmarking and will have to report their energy progress. The program will be in the beginning phases between 2024 and 2026.

For more information, you can visit the Building Energy Savings program website.

Lauryn Abozeid



CITY OF
SAN ANTONIO



Home (<https://www.sa.gov/Home>) / Directory (<https://www.sa.gov/Directory>) / News (<https://www.sa.gov/Directory/News>) / News Releases (<https://www.sa.gov/Directory/News/News-Releases>) / **Youth Leaders to Showcase Community Resilience Work**

Youth Leaders to Showcase Community Resilience Work

Published on May 06, 2024



Office of the Mayor
Ron Nirenberg

Mayor's Youth Engagement Council for Climate Initiatives will present sustainability initiatives on May 16 at UTSA Downtown.

SAN ANTONIO (May 6, 2024) — The City of San Antonio Office of Sustainability and EcoRise present the 6th Annual San Antonio Student Innovation Showcase on May 16 from 5:30 - 7 p.m. at the University of Texas at San Antonio (UTSA) Downtown Campus Durango Building at 501 W. Cesar Chavez Blvd. Attendees will learn from youth and educators working to improve local climate resilience. To RSVP for the event, visit [SAShowcase24.eventbrite.com](https://www.eventbrite.com/e/6th-annual-san-antonio-student-innovation-showcase-tickets-883496119677?aff=oddtcreator) (<https://www.eventbrite.com/e/6th-annual-san-antonio-student-innovation-showcase-tickets-883496119677?aff=oddtcreator>).

The Mayor's Youth Engagement Council for Climate Initiatives (MYECCI) will present the work they have done this school year in collaboration with local organizations to engage communities in the City's Climate Action and Adaption Plan (CAAP).

(<https://www.sanantonio.gov/sustainability>) This year's council represents the fourth cohort of 31 local youths, representing each City Council district and 18 different public, private, and charter schools.

"These young people have immersed themselves in the complex challenges involving climate change, and I am excited that they are responding with their own innovative ideas," said Mayor Ron Nirenberg. "Their voices are important as we work to ensure our community and world are healthy and sustainable, and climate solutions are crucial for their generation."

Twelve local student teams who were awarded EcoRise Eco-Audit Grants (<https://www.ecorise.org/our-work/grants/>) will also showcase their work. Each student group collected data in their school community, identified a sustainability issue, designed a solution, and received a grant from EcoRise to implement their solution.

"Youth are bringing their bright ideas to climate solutions at every level," said EcoRise Co-Executive Director Jon Stott. "EcoRise is proud to provide these young leaders with resources to bring their ideas to life and a platform to share their impact at our regional showcases."

MYECCI was established in 2020 to foster and include youth voices in the implementation of the City's first Climate Action and Adaptation Plan. The council is generously supported by the City's Office of Sustainability and the Hollomon Price Foundation. For more information about EcoRise and its youth programs, visit Ecorise.org (<https://www.ecorise.org/youth-programming/meet-the-22-23-myecci/>).

JOIN US!

Interested in connecting to additional resources from the Mayors Innovation Project? Learn more about the benefits of membership today.

Visit us at mayorsinnovation.org



mayors
innovation
project

7122 Sewell Social Sciences Building | 1180 Observatory Dr | Madison, WI 53706

608.890.0730 | mayorsinnovation.org