



Webinar: How Cities and States Can Accelerate E-Bike Adoption Using RMI's Free E-Bike Calculator

Audience Q&A

Below, we provide answers to several questions during RMI's [webinar](#) on February 11th, 2025. The responses include answers from panel participants, who were:

- **Matthew Gabb, City of Edina**
 - **Mike Salisbury, Colorado Energy Office**
 - **Tejas Kotak, Atlanta Regional Commission**
 - **Ben Kamber, Atlanta Regional Commission**
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- **Mike Salisbury discussed the Colorado E-Cargo Bike Grant Program. Where can I find out more information on this?**
 - *Mike Salisbury:* Here's a link to that program:
<https://energyoffice.colorado.gov/ecargobikegrant>
 - **Have there been any pilots, studies, or research examining the potential of e-bikes to mitigate electrical load, load growth, and peak demand for utilities? Similar to a distributed energy resource or demand-side management program, I am interested in whether e-bikes could contribute to reducing electricity consumption and, in turn, help delay or avoid costly grid upgrades and improvements.**
 - The RMI e-bike calculator includes an output for calculating the avoided electricity demand, due to the difference in energy usage between e-bikes and EVs. [Research in California](#) has indicated that using e-bikes can reduce peak demand and total electric load.
 - **Have any of the municipalities installed L1 e-bike docking stations?**
 - *Matthew Gabb:* Edina has not, but we have talked about this and creating a charging network as the program grows. Minneapolis does not have an e-bike rebate program but is planning to begin installing [e-bike docking/charging stations](#) (separate from the private bikeshare e-bikes like Lime).
 - **Have any of these programs been evaluated with respect to effects on travel behavior of the participants? Any plans to do so?**
 - Denver has done follow-up [surveys](#) to examine how participants changed their behavior, finding in the 2023 survey that people replaced on average 3.4 round trip car trips per week after getting their e-bike. Preliminary data from the state of Colorado's e-bike rebate program shows similar results as far as vehicle trip replacement.
 - **How do the municipalities speaking fund their climate funds?**



- **Matthew Gabb:** The Climate Action Fund (CAF) is supported by the City's Conservation Fund, which is funded through [utility franchise fees](#) (which I know often have other names in other states). These fees are paid by all Edina residents and commercial customers as part of their Xcel Energy electric and CenterPoint Energy gas bills. Each year, the Conservation Fund generates approximately \$1 million from these fees, with \$100,000 specifically allocated to the CAF.
- **What do you suggest for securing funding for e-bike incentives, especially from city or county governments, and what do you think is a sufficient amount of incentive funding for an initial program to meet demand, collect statistically significant data and make the case for additional funding?**
 - One positive about e-bikes is that they address many goals that a government might have such as climate, air quality, mobility and transportation equity. If trying to tap into existing revenue sources, one can tailor an e-bike proposal to meet the goals of that funding source.
 - The amount of funding to start a program is probably dependent on the population of the community.
- **At what threshold do you need to contract out the rebates to deliver rebates to applicants and reimburse the bike shops?**
 - This probably depends on the capacity of existing staff to take this on. It can be a lot of work to process applications and rebates but at a small scale may be much more cost effective than contracting out.
 - **Matthew Gabb:** At least here in Edina, reimbursing bike shops, while certainly more equitable for lower-income residents, would be a far higher administrative lift. Especially because there are no bike shops in Edina, we have found simply asking residents to submit a W9 and a copy of their receipt to be easiest. Plus, this allows them to shop at whatever bike shop they are most comfortable (so long as it is on the [Minnesota Department of Revenue list of approved e-bike retailers](#) (PDF), which includes brick and mortar shops and some online retailers).
- **What group have you seen shift more trips from cars to bikes: Income-qualified or general recipients?**
 - Denver's survey work found that low-income residents biked more miles than the market-rate group (32 miles a week compared to 22 miles a week). However, lower income residents are less likely to have consistent access to a vehicle. Access to an e-bike can expand low-income participants' economic opportunities, as found in the [Colorado Can-Do E-bike](#) pilot program.
 - **Matthew Gabb:** We have not yet conducted this type of evaluation in Edina. However, we do know that two-thirds of our recipients met at least one of our [Environmental Justice \(EJ\) criteria to receive additional reimbursement](#). These criteria are self-reported and include factors such as low income, senior status,



disability, or participation in government assistance programs like Supplemental Nutrition Assistance Program (SNAP), Women, Infants, and Children (WIC), and Temporary Assistance for Needy Families (TANF).

- **How would you make the case for an ebike program in an area that already has a (relatively) high saturation of bike usage and public transportation?**
 - E-bikes can allow for people who might feel unable to bike on an acoustic bicycle to be able to bike. This includes older individuals, people with disabilities, and people who struggle with fitness. [Research](#) has shown e-bikes to be an inclusive mobility enabler. [Women](#) are also much more likely to bike when they have access to an e-bike.
 - **Mike Salisbury:** I would say ebikes have a lot more potential to reduce vehicle trips than regular bikes and that e-bikes can also help make connections to transit hubs.
- **Among trips shifted from cars to bikes, which group tended to shift longer trips (in miles): income-qualified recipients or the general participant group?**
 - **Mike Salisbury:** In Denver's [survey](#) following the first round of e-bike incentives, they found that the low-income residents biked 50% more miles than the market rate participants (32 miles compared to 22 miles). While income qualified residents tended to ride more miles, I don't believe that they had longer trips, they were just taking more trips on their e-bikes.
- **Do the cost-per-ton assessments from the e-bike calculator, as referenced by Mike Salisbury, account for co-benefits such as health benefits or cost savings for users?**
 - The e-bike calculator assesses the cost per ton for greenhouse gas emissions, but can also be used to show the reduction in traffic congestion and air pollution, and to demonstrate fuel and maintenance costs for riders.
- **Is there an age requirement for your programs? If participants under 16 are eligible, are there any specific education or training requirements?**
 - The RMI e-bike calculator specifically looked at trips taken by individuals over the age of 18. Replica's dataset estimates the ages of trip-takers. In addition, [Colorado's e-bike rebate program](#) does currently require participants to be over the age of 18.
 - **Matthew Gabb:** We currently do not have an age limit, and I know at least two of our recipients last year were teenagers who wanted to rely less on being driven by their parents. We don't currently have education/training requirements, although the state of Minnesota has required bike safety education in all (I believe) elementary schools since 2023.
- **Are program beneficiaries encouraged to serve as ambassadors for biking, such as sharing safe routes or mentoring newer riders?**



- *Matthew Gabb:* Not yet but I love this idea and will be bringing this to some folks in leadership!
- **Have there been any programs that address charging stations or battery exchange?**
 - New York City's Department of Transportation finished a [pilot](#) on public e-bike charging in November 2024. The pilot successfully reduced at-home charging by 35% and improved fire safety, productivity, and convenience for delivery workers, with over 12,000 battery swaps in six months. The program's success will inform an expansion, including partnerships with New York City Housing Authority (NYCHA) to install charging stations at 173 locations and updated regulations allowing battery swap cabinets on sidewalks. Additionally, NYC plans to launch an e-bike trade-in program and a public education campaign to further enhance fire safety and support safe micromobility.
- **Does the calculator distinguish between e-bikes and cargo bikes in terms of their respective benefits?**
 - The calculator assumes a set split of cargo and community e-bikes. The calculator assumes 40% of e-bikes are cargo bikes and 60% are commuting. This is a variable that users can change with an unlocked version of the calculator. Denver's [survey](#) that followed the first round of their incentive program found there was not much variation in riders who used commuting bikes compared to those who used cargo.
- **From a city and state that offers no e-bike rebates or incentives, what no/low cost options are there to collaborate with local bike shops?**
 - *Matthew Gabb:* I don't know exactly their funding mechanisms or shop collaboration, but I've always heard nothing but good things about the Iowa City bike library, and could be a good model to base a program off of:
<https://www.icbikelibrary.org/>
- **Does the calculator include information on incentives for multifamily developments or homeowners' associations (HOAs) to support e-bike charging and secure storage?**
 - The calculator does not directly contain information specifically regarding incentives for MFHs or HOAs. However, it makes the benefits of e-bikes very clear in terms of affordability, pollution reduction, and increased mobility to destinations within five miles and these are highly relevant data points for both MFHs and HOAs to consider supporting e-bike charging and storage.
- **Is there a consumer-friendly version of this tool? It could be valuable for those less familiar with e-bike benefits, such as calculating expected costs and savings over time. Many rebate programs have dedicated pages with educational materials or links where it could be featured.**
 - RMI has also produced the [Green Upgrades](#) calculator, which is designed to help individuals assess the impact of changes to their home or transportation setup.



The calculator has the option to let users assess the impact of replacing a portion of their trips with an e-bike. The calculator also has an API. Cities or states with a program interface could use the API to display just the results for an e-bike on their program website if they wish to do so.