Successful electric bus pioneers overcome challenges of early adoption

By Matt Casale, U.S. PIRG Transform Transportation campaign director

Electric buses are a relatively new technological advance. And, like every new mode of transportation, electric buses have faced bumps and hurdles, and a fair share of skeptics.

Take the car, for example—the staple of modern American transportation. Today, around 88 percent of Americans own cars. But in the late 19th and early 20th centuries, when the technology was new, people weren’t immediately sold. According to a 1930 article by Alexander Winton in the Saturday Evening Post, onlookers often taunted pioneering drivers with cries of “Get a horse!”

Early cars were noisy, unreliable, expensive and plagued by mechanical problems. It was also hard to gas up. The United States simply didn’t have the infrastructure needed for Americans to drive en masse. Over time, as people began to see the potential in these vehicles, and investors poured money into their development and production, the problems that had dogged the early cars were ironed out. Flash forward to 2019, and take a look at pretty much any drive way in America, and you’ll see how that turned out—for better or worse.

I don’t know of anyone yelling at early electric bus adopters to “get a diesel bus,” but electric buses certainly have their skeptics. Nascent electric buses have had some issues, like all new technologies do. However, user experiences indicate that those challenges are not insurmountable and are far outweighed by the benefits.
For example, King County Metro, the transit agency in the Seattle area, began testing electric buses in 2016. Metro’s service area covers a range of terrain, including rural areas, and dense urban and suburban corridors. In all of these settings, the buses have generally performed well, but with minor problems that, at first, gave the agency “a moment of pause.” In some instances, batteries have depleted faster than expected, and the buses have not been able to travel as far as advertised, particularly during the colder months.

But, despite the early performance challenges, King County Metro’s experience has been positive enough that it has decided to go all-in on electric buses. A big reason why: The agency includes the environmental and health benefits of buses in its evaluation of costs and benefits, estimating that the total societal cost over the life cycle of a 40-foot diesel bus is $121,000, vs. approximately $18,000 to $19,000 for a 40-foot electric bus using renewable energy.

School buses are going electric, too. The state of Massachusetts sponsored a pilot program that designated one electric bus each to three school districts, and their performance was measured over the course of a year. While the buses provided significant greenhouse gas and air pollution reductions, they had mechanical problems and failed to deliver the fuel and maintenance cost savings expected.

Despite the challenges, all three school districts in Massachusetts chose to keep their electric buses. On the other side of the country, Twin Rivers Unified School District outside of Sacramento has had a different experience. Its buses have experienced few problems and saved 75 to 80 percent on fuel costs (largely due to very favorable utility rates), exceeding the district’s most optimistic expectations. Early success allowed Twin Rivers to scale up its program, and the district now runs a fleet of 25 electric buses.

Electric buses are a new technology. Will there be challenges in implementing the new technology? Of course. Are those challenges insurmountable? No. And the public health and environmental benefits of switching away from diesel to zero-emissions buses should motivate us even more to overcome whatever challenges arise. Consider this: The Chicago Transit Authority estimates that each of its electric buses will save the city around $55,000 every year in avoided healthcare expenses. That big number sounds great, but it actually undersells the benefit. When you think about it in terms of money, it almost sounds like some kid gets his asthma treatment paid for. It’s better than that. Instead, that kid doesn’t have asthma.

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**21ST CENTURY TRANSPORTATION**

**Colorado to see more electric vehicles as state joins Zero Emission Vehicle program**

You’re likely to see more electric cars on Colorado’s roads in the next few years, and that means less smog-causing and climate-changing pollution.

On Aug. 16, Colorado’s Air Quality Control Commission voted 8 to 1 in favor of joining the Zero Emission Vehicle (ZEV) program. The new policy requires automakers to ensure that an increasing percentage of vehicles offered in-state are electric-powered.

The mandate will help reduce ozone pollution and greenhouse gas exhaust in a state where smog-alert days are too common and transportation is expected to account for a quarter of carbon emissions by 2020. CoPIRG backed the vote and delivered petitions favoring the move signed by a coalition of 6,200 supporters.
In a state that experiences regular “bad-air” days, CoPIRG Director Danny Katz says “Joining the Zero Emission Vehicle program will cut air pollution ... and quicken our transition to a cleaner, electric-powered transportation system.”

Colorado is the eleventh state to adopt the Zero Emission Vehicle program.

BAN ROUNDUP

Rather than require warning labels for Roundup, Trump administration moves to prohibit them

Does the public have a right to know that researchers for the World Health Organization say the widely used herbicide Roundup is a probable carcinogen?

Not according to the Trump administration. On Aug. 9, the administration’s Environmental Protection Agency (EPA) announced it will prohibit companies from putting warning labels on products containing glyphosate, the main active ingredient in Monsanto’s Roundup—even with mounting evidence that glyphosate is linked to non-Hodgkin’s lymphoma.

“It’s past time to ban Roundup until and unless it’s proven safe,” said our national network’s Ban Roundup Campaign Director Kara Cook-Schultz. “But as long as it remains on the shelf, consumers have the right to know that glyphosate is potentially dangerous.”

As we keep working toward a ban on Roundup in Colorado and across the country, our members and supporters are also holding the EPA accountable. So far, nearly 10,000 people have joined our national network in calling on the EPA to require warning labels on products containing glyphosate.

21ST CENTURY TRANSPORTATION

When it’s faster to walk than ride: Denver’s need for bus lanes

During rush hour, your own two legs can be faster than taking a bus in downtown Denver ... but they shouldn’t be.

Walkers, bikers, drivers and bus riders raced from Union Station to Civic Center Station on Oct. 3 during rush hour to find out who was fastest.

It wasn’t exactly a photo finish. Team Bus lost ground idling in traffic while walkers and bikers cruised along sidewalks and bike lanes.

The race, cohosted by CoPIRG Foundation and the Denver Streets Partnership, highlighted the need for dedicated bus and bike lanes, coming soon to 17th, 18th and 19th streets, and already installed on 15th street, at the time of this writing. The lanes are estimated to improve bus times for more than 900 daily buses by as much as 42 percent, improving transit speed and reducing greenhouse gas pollution.

“Dedicating space for bus and bike will help everyone get to where they are going more safely and reliably,” said CoPIRG Foundation State Director Danny Katz in a tweet.
BEYOND PLASTIC

Not one, not two, but five more states ban single-use plastic bags

The number of statewide plastic bag bans in the U.S. has tripled this year, with Maine, Vermont, Connecticut, Delaware and Oregon adding themselves to the list.

The states joined California and New York, requiring retailers and grocers to replace single-use plastic bags them with reusable or paper ones. Americans currently throw away 100 billion plastic bags every year, or 300 bags per person. We use these bags for just a few minutes, but they persist in the environment and impact public health for centuries to come.

“These states are leading the country in addressing plastic pollution,” says the director of our Beyond Plastic campaign, Alex Truelove. “Clearly, momentum is building on this issue. But these states cannot tackle our plastic pollution crisis alone.”

Together with our national network, CoPIRG is running campaigns to ban single-use plastic bags and other harmful plastics in Colorado and across the country.

Dear CoPIRG member,

The problems we work on impact all of us—from plastic pollution, to toxic Roundup in our communities, to the possibility that our life-saving medicines will no longer be effective. Your support enables us to keep being your advocate for the public interest, working to find common ground around commonsense ideas.

Thank you,

Danny Katz, State Director
info@copirg.org