

Electric School Buses in Utah:

Leveraging Federal Funds for Clean Air and Taxpayer Savings

Issue Overview

Poor air quality is one of the top challenges facing many communities in Utah, but increasing the use of electric school buses can support cleaner air, save money for school districts, and improve health outcomes for students. For years, state policymakers have worked to improve air quality—particularly along the Wasatch Front where nearly 40 percent of air pollution comes from vehicles. Today, the legislature can enhance those efforts by leveraging federal dollars.

Authorized by Congress in 2021, EPA's *Clean School Bus program* has roughly \$3.5 billion through 2026 for grants and rebates to help school districts adopt zero- and low-emission school buses and install charging infrastructure. With federal funding available, **Utah school districts could improve their odds of receiving grant awards for clean school buses with match funding provided by the Legislature**.

Utah's Competitive Advantage for Federal Funds

Since 2022, the EPA has awarded nearly \$1 billion in rebates, which will put more than 2,300 electric school buses on the road. This includes 12 in Utah, with another 47 requested buses waitlisted.²

Based on previous funding guidelines, future competitive application rounds are likely to prioritize applicants in high-need and rural areas and those in regions with poor air quality, potentially giving certain Utah school districts an advantage should they apply (see map of Utah school districts).³

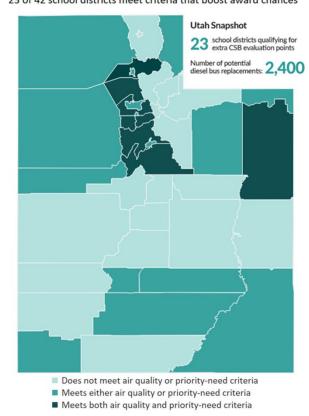
In addition, school districts that bring or demonstrate a credible plan to leverage non-federal funds could receive a scoring advantage. **State funding can help school districts boost their chances to receive an award.**

State Precedents

Some states have encouraged adoption of cleaner school buses by dedicating resources to act as match funds or for direct purchase of vehicles.

For example, the Colorado Legislature dedicated \$65 million for this effort; the first round of awards saw 13

Utah School Districts and the Potential for Clean School Bus Grants 23 of 42 school districts meet criteria that boost award chances



school districts receive funding for 67 electric buses. Similarly, the Michigan Legislature passed a bipartisan budget that dedicated \$125 million for clean school buses and their accompanying charging equipment.

¹ https://documents.deq.utah.gov/air-quality/planning/air-quality-policy/DAQ-2022-000342.pdf

² https://awsedap.epa.gov/public/extensions/Clean School Bus/Clean School Bus.html

³ Simplified map showing public school districts that meet or are likely to meet the EPA's high-need criteria, those that lie within air quality nonattainment or maintenance areas (designated areas that do not meet federal air quality standards), or a combination of both.

Comparing Clean and Conventional Buses

Cost Savings and Reliability

Across the country, electric school buses have demonstrated cost-savings and improved performance for school districts:

- Fueling and Maintenance: Electric buses generally have much lower fueling and maintenance costs compared to diesel buses over a 20-year anticipated lifetime. One Michigan school district found its two electric buses resulted in savings of \$44,000 in fuel and \$45,000 in operating costs since the beginning of 2021.⁴ In addition, some school districts have reported as much as a 60 percent decrease in maintenance expenses for electric school buses.⁵
- *Safety:* Across rural and mountainous communities, electric buses have frequently exhibited strong safety performance, including in inclement weather. Bus operators have reported that increased torque helps the buses better handle steep mountain passes⁶ and, due to their weight distribution, the buses are less likely to fishtail in snowy conditions.⁷
- Range: Many on-market electric school buses have ranges of 100 miles or more on a single charge, enough for most routes. Even in colder climates, electric school buses have been able to complete daily routes without range concerns, particularly when using best practices to manage charging and warm cabins. And the regular bus schedules and routes helps transportation managers find optimal times to charge mid-day and overnight.

Improved Air Quality and Healthier Students

Nationwide, roughly 90 percent of the school bus fleet relies on diesel fuel, exposing bus drivers and an estimated 20 million children to harmful exhaust⁹ – that is potentially 675,000 students in Utah.¹⁰ Numerous studies have linked these diesel-related pollutants to negative health and

academic performance outcomes such as higher absentee rates and lowered test scores, a higher incidence of asthma attacks, and worsened problems with respiratory illnesses. Electric school buses, on the other hand, emit zero tailpipe pollution.

"We know that schools are one place kids basically go every single day. Reducing a sort of constant or well-known pollution exposure is going to be a large step in the right direction."

-Dr. Daniel Mendoza, Univ. of Utah, Professor of Atmospheric Sciences

By committing state resources to leverage dollars from EPA's *Clean School Bus program*, Utah can join a handful of leading states to safeguard the health of students, improve air quality, and save school districts money.

CONTACT US

Yaron Miller | <u>ymiller@pewtrusts.org</u> | Energy Modernization Project **Jim Bradley** | <u>jbradley@pewtrusts.org</u> | Government Relations

⁴ https://electricschoolbusinitiative.org/electric-school-bus-series-successfully-operating-cold-weather-three-rivers-michigan-0

⁵ https://blogs.edf.org/energyexchange/wp-content/blogs.dir/38/files/2021/02/ElectricSchoolBusFactSheet.pdf

⁶ https://www.eesi.org/articles/view/new-electric-school-buses-in-colorado-provide-safer-cleaner-cheaper-rides

⁷ https://electricschoolbusinitiative.org/electric-school-bus-series-successfully-operating-cold-weather-three-rivers-michigan-0

⁸ https://electricschoolbusinitiative.org/all-about-range-and-reliability

⁹ https://www.wri.org/insights/where-electric-school-buses-us

 $^{^{10}\,}https://gardner.utah.edu/blog-back-to-school-getting-to-know-utahs-student-population/$