

September 19, 2022

CLEAN TRANSPORTATION

ACT School Bus: *Electric School Bus Funding & Technical Assistance*



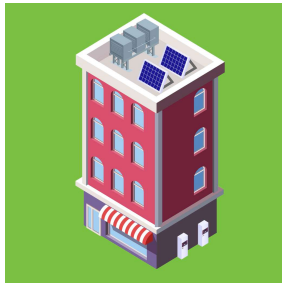
 MASSACHUSETTS
CLEAN ENERGY
CENTER®

Agenda

- 1. Introduction**
- 2. ACT School Bus Program Overview**
 - Deployment Funding & Technical Assistance
 - Advisory Services
- 3. Eligibility and Prioritization**
- 4. Application Materials & Requirements**
- 5. Selection Criteria**
- 6. Timeline & Logistics**
- 7. Open Q&A**

MassCEC Four Focus Areas

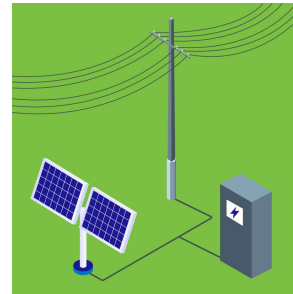
**High
Performance
Buildings**



**Clean
Transportation**



**Net Zero
Grid**



**Offshore
Wind**



**State economic and development agency that seeks to
accelerate Massachusetts' clean energy and climate goals**

ACT School Bus Mission



To further promote electric school bus adoption in Massachusetts and amplify EPA's Clean School Bus Program by providing necessary technical assistance and electrification planning as well as additional deployment funding to school districts and school bus fleets.



Increase access to clean transportation technologies and decrease health impacts and related burdens from the existing transportation system



Demonstrate replicable deployment and road-mapping projects



Demonstrate effective program delivery, community partnership, and implementation models



Represent school districts across Massachusetts and at various stages in the electrification process

ACT School Bus Will Offer...

1. Deployment Assistance – Up to \$2M in flexible funding available for 3 school bus fleets. Technical assistant will guide the EV bus deployment process

- ESB charging station planning, infrastructure deployment, and data collection

Closes October 17, 2022

2. Advisory Services – Free electrification planning for up to 30 school bus fleets. Includes preparing districts to access additional funding opportunities

- Feasibility designs, financial models, procurement plans

Ongoing Enrollment - Fall 2022



ACT School Bus Deployment Funding and Technical Assistance

Ready to deploy electric school buses (ESBs)?

Deployment Funding will serve to:

- Provide a team of experts for technical assistance
- Support additional costs for ESB projects such as depot upgrades
- Select, purchase and install the best chargers for your fleet
- Assist with the ESB procurement process
- Electrify at least a portion of your fleet by the end of ACT School Bus programming!
- Prepare you for future electrification

See the [Request for Proposal](#) to start your application!

Deployment - Eligibility and Prioritization

- Lead Applicant must be public school districts (including charter and vocational schools, with an NCES District ID)
- Project teams may include 3rd party school bus fleets and other organizations
- EPA Priority Districts given preference
- Goal of geographic and ownership model diversity

Each of the three selected school districts may receive up to \$2M in funding and technical assistance with a team of experts

Eligible applicants are welcome to apply for Deployment and fill out an interest form for Advisory Services but will not be selected for both.

ACT School Bus Advisory Services

Looking for an actionable plan to electrify your fleet?

Advisory Services can help answer questions like:

- What other funding opportunities are out there?
- Which routes are best fit for early electrification?
- What are key areas for costs and savings?
- What are the best charging options for your fleet?
- What infrastructure changes should be made to your bus depot?

Fill out our [Interest Form](#) to receive more information about Advisory Services!



Advisory Services - Eligibility and Prioritization

- School districts OR 3rd party school bus fleets (in partnership with school districts) may directly apply to receive free electrification advisory services
- EPA Priority Districts and 3rd party school bus fleets partnered with Priority Districts will be given preference in enrollment
- Goal of geographic and ownership model diversity

Each of the 20-30 school district fleets will receive a customized fleet electrification plan and hands-on assistance from a team of experts

Eligible applicants are welcome to apply for Deployment and fill out an interest form for Advisory Services but will not be selected for both.

Deployment Application Materials

Attachment A: List of EPA Clean School Bus Priority Applicants – informational

Attachment B: Authorized Applicant's Signature and Acceptance Form

Attachment C: Application Form - help available from the Consultant Team

Attachment D: Proposed Budget - help available from the Consultant Team

Attachment E: Proposed Site Plan - help available from the Consultant Team

Attachment F: Sample Agreement

Looking for Deployment Application support? Email
cleantransportation@masscec.com!

MassCEC expects to have technical support available for the application.

CLEAR WORKPLAN FOR DEPLOYMENT APPLICANTS

Budget: Template (Attachment D)
Project milestones which will track and demonstrate project progress and operational performance



Attachment E: Proposed Budget ACT School Bus

Proposed Project Funding Sources

Source	Amount
EPA Clean School Bus	\$375,000.00
MassCEC ACT School Bus	\$1,000,000.00
School District or Applicant Contribution	\$50,000.00
Total Project Funding	

Costs - Direct Labor

Name and Title	Hourly Rate	Number of Hours	Funding Source(s)	MassCEC Grant Amount	Cost Share Amount	Total Cost
Director			MassCEC, school contribution	\$7,000.00	\$5,000.00	\$12,000.00
School Business Administrator			school contribution		\$10,000.00	\$10,000.00
Total Direct Labor						

Costs - Subcontractors

Name and Title	Hourly Rate	Number of Hours	Funding Source(s)	MassCEC Grant Amount	Cost Share Amount	Total Cost
ABC Contractor: trenching			MassCEC	\$10,000.00		\$10,000.00
Y Contractor: depot upgrade			MassCEC	\$20,000.00		\$20,000.00
Total Subcontractors						

Costs - Direct Materials & Other Costs

Material or Other Cost	Funding Sources	MassCEC Grant Amount	Cost Share Amount	Total Cost
Transformer Pads	MassCEC	\$200,000.00		\$200,000.00
(2) Level 2 chargers	EPA		\$40,000.00	\$40,000.00

Total Cost Summary

Total Project Costs	
Total MassCEC Grant Request	
MassCEC Percentage of Total Cost	#DIV/0!

Instructions

Please fill in cells in tables to the left and above, as applicable

This template provides an overview of the project budget, external funding sources, and allocation of funds among staff time, subcontractors, and direct costs. Applicants must ensure that the budget they provide is compliant with program requirements prior to submission. In the left blue table, please fill out all sources of funding (one per line), and how much funding each source is providing.

Please fill out all costs associated with direct labor, subcontractors, and direct materials & costs in green tables to the left. Include one item per line, and include how much MassCEC funding will be allocated to that specific line item as well as how much cost share. Please note that external funding (such as EPA funding) and internal contributions are included in cost-share. Please see the RFP for additional guidelines on cost share.

Be sure that total project cost listed in the summary table above

Advisory Services Application

ACT School Bus Advisory Services Interest Form

- MassCEC in process of onboarding technical experts
- Formal enrollment expected to begin Fall 2022

TIMELINE AND LOGISTICS



Application available at:

<https://www.masscec.com/program/request-proposals-act-school-bus-fleet-deployment>



Questions due on: September 23rd, 2022
to CleanTransportation@masscec.com



**Deployment Applications due by: Monday,
October 17th, 2022 at 4:00pm EST**



**Deployment Grant Award notifications by:
November 2022**

MassCEC Is Here to Support You!

Please submit questions to: CleanTransportation@masscec.com by September 23, 2022.

Funding Opportunity Materials:

[ACT School Bus Notice of Intent](#)

[ACT School Bus Advisory Services Interest Form](#)

[ACT School Bus Fleet Deployment RFP](#)

Contact us directly: jlu@masscec.com and ostrobel@masscec.com

Sign up for our [office hours](#)

Don't hesitate to reach out!



Questions?

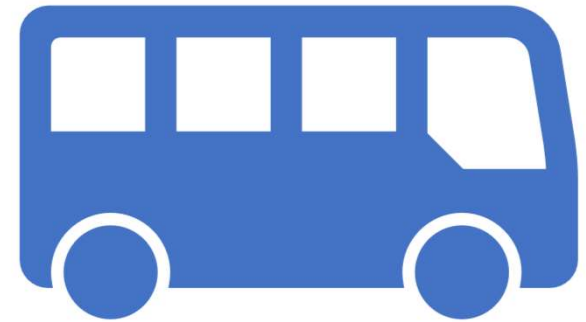
WHY GO ELECTRIC?

Electrification is the future:

- **Over 20+ models available from all major manufacturers**
- **Quieter, better for the environment and the health of students & drivers**
- **Cheaper to maintain and fuel than a diesel bus**

Why now?

- **Federal and state funding opportunities**
- **Technology improvement in recent years**
- **Over 600+ electric school buses in operation across the country**



But what about...

Cost – electric school buses save money over time

- **Upfront:** electric school buses are 2 – 4x the cost of a diesel bus
In addition to the EPA rebate which ~66% to ~100% off the sticker price, MassCEC is providing supplemental flexible funding
- **Operational:** fueling and maintenance savings can range from 30%-60%
Fuel prices currently high and unpredictable while electricity is predictable

Complexity - electrification can be complex but help is available

- **Technical assistance** – vendors and manufacturers, the World Resources Institute, MassCEC
- **Turnkey and electrification-as-a-service options available**
- **Start now!** Talk with your utility. Fleet electrification will happen over time

COMMONLY ASKED QUESTIONS



Range and Cold Weather



Operational Savings



Safety and Driver Experience



Where to Start

Range and Cold Weather

- Deployments in Canada (80-mile routes on a single charge), Alaska, Massachusetts, and Vermont (75-mile routes on a single charge)

Operational Savings

- MA deployment achieves 60% in maintenance savings and 50% fuel savings with charging management

Safety and Driver Experience

- Consistent positive feedback from drivers - smoother and quieter drive
- Batteries go through rigorous testing for fire safety

Where to Start?

- Connect with MassCEC!

