

# Alternative Fuels Data Center

**FUELS & VEHICLES**

CONSERVE FUEL

LOCATE STATIONS

LAWS & INCENTIVES

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Electricity Basics

Benefits & Considerations

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## Electricity

Electricity can be used to power electric vehicles (EVs), including [all-electric vehicles](#), also called battery-electric vehicles (BEVs), and [plug-in hybrid electric vehicles](#) (PHEVs). These vehicles can charge their batteries by drawing electricity directly from the grid and other off-board electrical power sources. In contrast, [hybrid electric vehicles](#) (HEVs) are fueled with liquid fuels, like gasoline, but use small batteries to recapture energy otherwise lost during braking (ultimately boosting fuel economy). PHEVs can use off-board electricity for power, which classifies them as EVs, but can also use liquid fuels and operate similar to HEVs if necessary. Using electricity to power vehicles can have significant energy security and emissions benefits.

### Local Fuel Savings Calculator ▶

Compare the cost of driving an EV or a PHEV to a conventional vehicle where you live.



### Basics ▶

Find information about using electricity to power vehicles, including production and distribution, and research and development.



### Benefits and Considerations ▶

Explore the benefits and considerations of using electricity to power vehicles.



### Stations ▶

Locate electric charging stations in your area and learn about charging infrastructure for EVs.



### Vehicles ▶

Learn about electric and hybrid vehicles and how they work, and find information about vehicle availability, conversions, emissions, batteries, deployment, maintenance, and safety.



### Laws and Incentives ▶

Find laws and incentives related to electric and hybrid vehicles and charging infrastructure in your area.

#### Fuels & Vehicles

- Biodiesel
- Electricity
- Ethanol
- Hydrogen
- Natural Gas
- Propane
- Renewable Diesel

#### Conserve Fuel

- Idle Reduction
- Parts & Equipment
- Driving Behavior
- Fleet Rightsizing
- System Efficiency

#### Locate Stations

- Search by Location
- Map a Route

#### Laws & Incentives

- Search
- Federal
- State
- Key Legislation
- Utility Incentives

#### Data & Tools

- Widgets
- Data Downloads
- APIs

#### About

- Newsletters
- Project Assistance
- Contacts

Sustainable

Aviation Fuel

Emerging Fuels

Fuel Prices



**Need project assistance?**

Email the [Technical Response Service](#) or  
call [800-254-6735](tel:800-254-6735)

The AFDC is a resource of the U.S. Department of Energy's [Vehicle Technologies Office](#).

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