



## AUTOMOTIVE ENGINEERING

# FACT SHEET



## Consumer Attitudes—Electric Vehicles

### BACKGROUND

Despite gas prices that are about 40 percent lower than five years ago, a new AAA survey found that consumer appetite for electric vehicles has not waned since 2012. In fact, the number of Americans interested in an electric vehicle approaches the number planning to purchase a pickup truck, with 15 percent saying that they are likely to buy electric vehicle for their next car. Millennials are even more accepting of electric vehicles, with nearly one-in-five interested in going electric for their next car.

With their overall efficiency and compatibility with emerging autonomous technologies, electric vehicles are poised to be a key vehicles of the future. This paired with consumer desire, rising sales, extended ranges and lower long-term costs leads AAA to predict a strong future for electric vehicles.

To understand consumer attitudes towards electric vehicles, AAA pursued four lines of inquiry:

1. How many Americans are interested in buying an electric or hybrid vehicle?
2. What is motivating Americans to select an electric vehicle?
3. Are Americans concerned about fuel economy when selecting a vehicle?
4. How long is the average American commute?

### KEY FINDINGS

#### *Electric Vehicle Appetite:*

**One-in-six (15%) Americans are likely to buy an *electric vehicle* the next time they're in the market for a new or used vehicle.**

- This level of interest is unchanged from 2012, despite gas prices that are about 40 percent lower.
- Millennials (18%) are more likely to consider an electric vehicle than Baby Boomers (10%).

**Americans who are likely to buy an electric vehicle would do so out of *concern for the environment* (87%), *lower long-term costs* (62%), wanting *cutting-edge technology* (52%), *car pool lane access* (29%) and 12 percent cite *other reasons*.**

**One-third (32%) of Americans are likely to buy a hybrid vehicle the next time they're in the market for a new or used vehicle.**

- This level of interest is unchanged from 2012, despite gas prices that are about 40 percent lower.
- Millennials (40%) and Generation X (32%) are more likely to consider a hybrid vehicle than Baby Boomers (22%).

## KEY FINDINGS, cont.

### Range Anxiety:

Americans who are unlikely (or undecided) to buy an electric vehicle, cite concerns related to *not enough charging stations* (69%), *running out of charge* (68%), *higher purchase prices* (57%), *battery repair/replacement costs* (55%). The remaining 17 percent cite *other reasons*.

- Baby Boomers (72%) are more likely than Millennials (62%) to be concerned with running out of charge.

U.S. drivers report average daily work commutes of 46 miles round trip, driving an average of 31 minutes.

- The average reported commute time and distance is within range of most electric vehicles sold.
- The majority (78%) of U.S. drivers report commutes of an hour or less, round trip. One-in-five (22%) report commutes of greater than one hour round trip.
- The majority (66%) of U.S. drivers report commutes of under 30 miles round trip, while 17 percent report commutes of between 31 and 60 miles. Only 17 percent of U.S. drivers report commutes of more than 60 miles round trip daily.

### Fuel Economy:

Four out of 10 (43%) U.S. drivers are planning to buy or lease a *car* for their next vehicle, while others are planning to select a *SUV* (26%) *pickup truck* (16%), *minivan* (5%) or *motorcycle* (1%). The remainder are either undecided (7%) or plan to select another type of vehicle (2%).

- Millennial drivers (51%) are more likely to buy or lease a car for their next vehicle than Generation X (38%) or Baby Boomers (34%).
- Women are more likely than men to select a SUV (32% vs. 20%) and men are more likely than women to choose a pickup truck (23% vs. 10%).

Nine out of 10 (93%) U.S. drivers consider *reliability* important when selecting their next vehicle, followed by *cost* (71%), *crash rating* (70%), *fuel economy* (70%) and *performance* (69%).

- Half (50%) of U.S. drivers consider *advanced safety technology* important, while fewer feel the *brand* (48%), *style, color or design of the vehicle* (46%) and *ability to connect a smartphone* to the vehicle (34%) are important.

## AAA Green Car Guide

With a focus on the future, the Automobile Club of Southern California's **Automotive Research Center** rates and ranks electric vehicles, hybrids, compressed natural gas-powered (CNG), diesels and high fuel economy gasoline-powered vehicles for the annual AAA Green Car Guide. Vehicles are rated on the criteria that matter most to car buyers, including ride quality, safety and performance. Visit [AAA.com/greencar](http://AAA.com/greencar) for more.



In 2017, the following vehicles earned AAA's Top Green Vehicle award:

Category	Winner
Overall	Tesla Model X 75D
Subcompact Car	Chevy Bolt EV Premier
Compact Car	Volkswagen e-Golf SE
Midsize Car	Lexus GS 450h F Sport
Large Car	Tesla Model S 60
Pickup	Ford F150 XLT Super Crew
SUV	Tesla Model X 75D

## METHODOLOGY

The consumer survey was conducted February 16-19, 2017 using two probability samples: randomly selected landline telephone numbers and randomly selected mobile (cell) telephone numbers. The combined sample consists of 1,004 adults (18 years old and older) living in the continental United States. The margin of error for the sample of 1,004 is +/- 3% at the 95% confidence level. Smaller subgroups will have larger error margins.

Final data is adjusted to consider the two sample frames and then weighted by age, gender, region, race/ethnicity and education to be proportionally representative of the US adult population.

Generation groups defined as: Millennials (18–36 years old), Generation X (37–52 years old), and Baby Boomers (53–71 years old)

