

Remember
to annotate
as you read.

Opinions About Green Transportation

Notes

In "Green Transportation Solutions," Brooke Harris presents several solutions to pollution from automobiles. Which solution is the "best"? Four writers express their opinions and give their reasons. All of the writers support their positions with facts and details from Harris's article.

Opinion 1: Solar Power for a Bright Future

1 The best green transportation solution is the use of solar cars that people can afford. Solar-powered vehicles use no fossil fuels. They completely eliminate our need to burn fossil fuels for transportation. Not everyone can rely on buses and subways. Solar cars offer a completely clean solution for drivers.

2 As "Green Transportation Solutions" makes clear, hybrid and electric cars are not perfect solutions. Battery-powered plug-in cars require that people charge their cars' batteries. Although battery-powered cars do not burn fossil fuels, "Power plants that make electricity to charge the car's battery" do. Hybrid cars reduce people's use of fossil fuel, but they don't eliminate it. And cars that run on renewable fuels such as biodiesel and ethanol still emit carbon dioxide (CO₂). Solar-powered vehicles emit no carbon dioxide.

- 3 Brooke Harris makes a case for public transportation, too, but this is another incomplete solution. Subways and buses in cities like New York City and Arlington, Virginia, mean fewer cars on city streets, but they don't meet the needs of everyone. Not only that, but buses and trains still rely on some fossil fuel.
- 4 The best long-term "green" solution is the use of solar vehicles. Solar power eliminates the need for fossil fuels. Solar cars provide pollution-free transportation to people who can't rely on public transportation.



Solar cars may not be the most practical solution now, but they are the right choice for the future.



Notes

Opinion 2: Catch a Seat on the Bus

- 5 Public transportation is the “green” solution that makes the most sense today. Solar cars are still experimental. Hybrid and biodiesel cars are very expensive, so most people cannot afford them. On the other hand, public transportation is affordable. It meets the needs of many people.
- 6 As Brooke Harris explains in “Green Transportation Solutions,” today’s cars burn fossil fuels. They release harmful carbon dioxide gas. Unfortunately, tomorrow’s cars are not yet practical or affordable. A battery-powered plug-in car costs about \$40,000. It can go only 160 kilometers (100 miles) before needing a charge. Even if people could afford that price tag, it wouldn’t make sense. Where would the cars recharge? As Harris points out, “Charging stations are not available in many places.” Battery-powered cars are tomorrow’s solution. They don’t help us today.



- 7 The average hybrid car is a little more affordable (about \$30,000), but it still burns fossil fuels. If everyone switched to a hybrid car, we would only lower carbon dioxide emissions. We would not eliminate them. Replacing one set of fossil-fuel burning cars with another is not a long-term solution.

- 8 On the other hand, public transportation takes cars off the roads. Harris cites New York City’s Green Dividend report. It states, “Residents save



An estimated 400,000 people use San Francisco’s Bay Area Rapid Transit (BART) system to commute to work each day.

\$19 billion per year because they own fewer cars and drive less than average Americans.” This shows that public transportation can work. While green subways and buses still emit some carbon dioxide, they more than compensate for this. By eliminating the need for millions of cars on the city’s roads, public transportation substantially reduces harmful emissions.

- 9 Solar cars are still experimental. And replacing fossil-fuel-burning cars with “green” cars is not yet practical. They are too expensive, and they are only partial solutions to the problem. When people and cities work together for green public transportation, cars come off the roads. The environment wins.

Opinion 3: Fight Pollution and Get Fit

10 In “Green Transportation Solutions,” Brooke Harris explores many expensive, high-tech “green” solutions. But the solution that makes the most sense is the low-tech one. People who can walk or ride a bike should stop using forms of transportation that burn fossil fuels. If everyone who could do this made that choice, the planet would benefit and so would they.

11 Most people’s lives revolve around their home. Unless they live in a rural area or have a long ride to school or work, they can walk or bike to a lot of places. The example of Heatherwood Elementary School proves that people would do this, if they could do it safely. By adding sidewalks, crosswalks, and crossing guards, Heatherwood Elementary School more than tripled the number of students who walked and biked to school—from 12 to 43 percent.

These kids are taking a “walking bus” to school.



12 Going green with fewer car or bus trips helps the environment. It helps people, too. Walking and biking are good exercise. As Harris notes in “Boulder, Colorado: Biped Power,” walking a half hour a day burns up 100 calories for a person who weighs 45 kilograms (100 pounds). Riding a bike for just fifteen minutes will give the same results.

13 A green car is not the only solution to greenhouse gas emissions. Many people can contribute to a cleaner planet simply by leaving their cars in the garage. By walking or biking, people help the planet and improve their health.

Opinion 4: No Single Solution Can Solve a Big Problem

- 14 There is no “best” solution to reduce carbon dioxide emissions. That is because no single solution meets the transportation needs of every person. We need multiple solutions. People who must drive need green cars. People in cities should use public transportation as often as possible. And people who are able to walk or ride bikes should have safe ways to do this. Only with green solutions that meet different needs will we significantly reduce carbon dioxide emissions.
- 15 As Brooke Harris points out, Americans now own approximately 250 million cars. While many people in cities could choose public transportation, some people cannot. For those who can't, green cars are the answer. A car that runs on ethanol emits from 30 to 50 percent less carbon dioxide than a fossil-fuel burning car. A biodiesel car releases 80 percent less CO₂. This technology must be developed. Practical and affordable green cars will help the planet.



There are many “green” transportation solutions to choose from.



- 16 In addition, we can reduce emissions by keeping cars off the road. Many Americans can use public transportation. In New York City, five million people ride the subway every day. Because they are on the subway, they are not in a car. “Tens of thousands of people” use Washington, D.C.’s Orange Line each day. This subway line has turned many car drivers into public transportation commuters.
- 17 People who commute short distances between home and work or school do not need subways and buses to stay out of cars. As Harris states, “Walking and bicycling eliminate the need for cars and public transportation. These low-tech solutions need little more than the support of governments to put into place.” One school in Colorado increased the number of students walking or biking to school by 31 percent! That is a huge increase. It shows that if people can walk and bike safely, they will.
- 18 No single form of transportation meets everyone’s needs. Green cars, public transportation, and “biped power” are each a partial solution to a big problem. Together, however, these three solutions can make a big impact on people and our planet.