

All Aboard the Solar Power Express!!

By Rashida Registe

What is **solar power**? Let's go outside the boundaries of our world and cruise around the sun. Solar power is actually energy from the sun that hits us here on Earth.

Did you know that the sun's lifetime, or amount of time that it will give off energy, is about 10 billion years? The sun has already been burning for 4.5 billion years, so that means it will continue to give us energy for another 5.5 billion years. Stars sure live a lot longer than humans! In fact, humans have only been around for a little over 50,000 years.

Did you know that the first recorded use of solar power was during the 4th century BC in the Middle East? People have been using solar power for thousands of years. Ancient Greeks used the sun to heat their homes. Since they knew that the position of the sun changed with the seasons, they were able to construct their buildings so that the sun directly hit them in the winter, but not in the summer. Some homes are still heated this way. This technique is called **passive solar heating**. Another example of passive solar heating is when sunlight shines on your pool and warms the water up.

How else did ancient civilizations use solar power? They used energy from the sun to dry their clothes and to dry meat in order to preserve it. In fact, many European households today take advantage of the sun's rays and do not have dryers in their homes to dry their clothes!

How else do we collect solar power? There are many ways. Have you ever wondered what makes a calculator without batteries run? It uses solar cells, which provide energy to make the calculator work.

Photovoltaic cells, or solar cells, convert energy from the sun's rays into electricity. Groups of photovoltaic cells are called **modules**. We can also use **solar panels** to convert energy from the sun into electricity. Solar panels use several modules together so that they can produce more energy.



I hope you've learned a lot about how we use energy from the sun. Now that we have cruised around the atmosphere how about we power down and go sail back home!