

## Solar Power

Did you know that you can make solar energy from sunlight to heat your home and warm your water? This is called solar power or sun power. Use the energy of the sun in the experiment below.

- **Question:** What are you to find out?  
Can the sun heat water?
- **Hypothesis:** What do you think will happen?

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- **Materials:** What items do you need?  
 2 aluminum pie pans      2 cups of cold tap water      pencil  
 flat black spray paint      outdoor thermometer  
 flat white spray paint      one-cup measuring cup



- **Procedure:** What steps do you follow?
  1. Spray paint the inside of one pie pan black. Spray paint the inside of the other pie pan white.
  2. Fill each pie pan with 1 cup of cold tap water.
  3. Use the thermometer to record the temperature of the water. Write the amount in the chart below.
  4. Set the pans outside in the bright sunlight. Record the temperature of each pan every hour from 10 a.m. to 2 p.m.

Time	Temperature of the water in the black pan	Temperature of the water in the white pan

- **Observations:** What changes did you observe?
  - A. What happened to the water in the black pan? \_\_\_\_\_
  - \_\_\_\_\_
  - B. What happened to the water in the white pan? \_\_\_\_\_
  - \_\_\_\_\_

- **Conclusions:** What did you learn?  
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