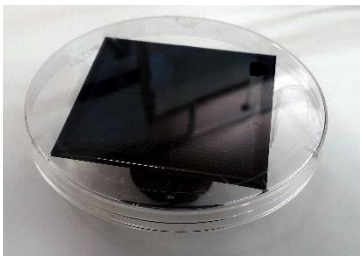
CLEAN ENERGY INSTITUTE
UNIVERSITY of WASHINGTON

SOLARSPINNER KIT



BRINGING SOLAR TO THE CLASSROOM

www.cei.washington.edu

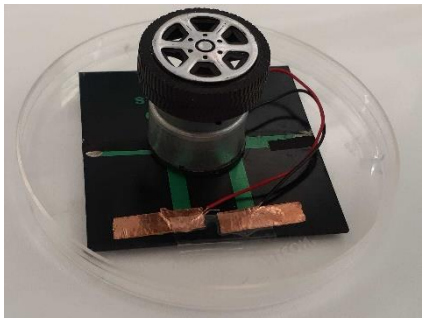
Background

The Clean Energy Institute at University of Washington is working to accelerate a scalable clean energy future through scientific and technological advances in solar, energy storage and smart grids. Part of our education mission is to introduce these topics into the science classroom through workshops and downloadable lessons. Our **Clean Energy Ambassadors** have used solarspinners to generate children's interest and give them a hands-on experience with the power of the sun.

Take the **Solarspinner Kit** to your science teacher and ask them to sign up for a Clean Energy Ambassador classroom visit: **www.cei.washington.edu/cleamb**

Assembly

1) Attach the motor to the back of the solar panel with the adhesive foam disc or foam tape. Make sure it centered.
2) Strip the insulation from the motor wire until you a clean ½ inch of exposed wire. Attach the bare ends of the motor wire to the bare copper contacts on the solar cell with copper tape. Press the wire firmly so it is forced against the copper contact. Do not let the two copper strips or wires touch.



3) Press the plastic wheel on to the motor shaft to form a base. You could also use a stick or block or wood with a 2mm hole.
4) Tape the solar spinner into the inside of the petri dish to provide extra protection. If you like, decorate with the edge with streamers.

Explore and Explain

What kind of light source makes the solarspinner go the fastest?

What happens as you move the solarspinner closer or farther from the light source?

What happens if you move the solarspinner closer to the sun?

What happens when you tilt the solarspinner so light is not hitting it straight on?

What happens if you reverse the wires connecting the motor to the solar cell?

Can you list three forms of energy that are involved in the solarspinner?