The sun is a big ball of energy that constantly sends heat and visible light toward Earth. This keeps our planet warm and comfortable for living things. But the sun also sends energy toward Earth in the form of invisible ultraviolet light. This experiment will help you see the effects of ultraviolet light.

WHAT YOU NEED:
- Construction paper (red or green works best)
- Sunscreen (a brand that is at least SPF 30 and doesn’t contain metal oxides works best)
- Rocks or other small, heavy objects
- A sunny spot outside

WHAT’S HAPPENING?
Ultraviolet light from the sun fades the color of your paper. Sunscreen contains chemicals that can reflect or absorb ultraviolet light. This keeps the ultraviolet light from reaching and damaging the color in the paper. Ultraviolet light can also cause sunburn. If too much ultraviolet light hits your skin, it can damage your skin cells. So, don’t forget the sunscreen!

HOW TO:
1. Squirt a pea-sized amount of sunscreen onto your hand. Rub the sunscreen all over the palms of your hands and the surfaces of your fingers, making sure to leave a very thin layer of sunscreen on your hands.
2. Place your hands firmly on the construction paper. Press down all your fingers and the palms of your hands.
3. Place the piece of construction paper outside in a sunny spot and place a small rock on each corner so it doesn’t blow away.
4. Leave the paper out in a constantly sunlit spot for three to four hours.
5. Go outside and look at your paper. You should notice that the sun’s UV rays have faded the color of the paper. However, the areas that were protected from UV rays by the sunscreen still have the original bold color.

Related Books:
The Sun: The Center of Our Solar System by Mari C. Schuh
The Sun by Cody Crane
Sun! One in a Billion by Stacy McAnulty

FUN FACT
The sun is a big ball of energy that constantly sends heat and visible light toward Earth. This keeps our planet warm and comfortable for living things. But the sun also sends energy toward Earth in the form of invisible ultraviolet light. This experiment will help you see the effects of ultraviolet light.