

SKITTLES EXPERIMENT

PROVIDED BY LITTLE BINS



MATERIALS NEEDED:

This skittles experiment is so simple and it goes fast, so don't turn your back on it! Great for kids to set up and do themselves too.

All you need are three things:

- Skittles
- Water
- Plates

SKITTLES EXPERIMENT SET UP:

Setting up this skittles experiment is a cinch. We decided to get a little creative and add an artistic element to our skittles science experiment.

- STEP 1: You want to empty out your skittles and check out the colors.
- STEP 2: Next, lay out your plates in an area where they won't be disturbed.
- STEP 3: Now's the fun part, make patterns! It is up to you on how you want to place your colors. Make a rainbow or any sort of pattern that interests you. You can experiment with placing different colors next to each other.
- STEP 4: Once you have your patterns placed, gently begin pouring water in the middle of the plate until it reaches all the candies and just barely covers them.

OBSERVATIONS:

Wait and watch to see what happens!

Give your kids a chance to ask questions, make observations, and explore. Why not test the 5 senses and encourage them to look, listen, feel, taste, and maybe hear what is happening.

Ask open-ended questions to get kids thinking! What changes could they make to this experiment?

- Could this skittles science experiment work with another type of candy?
- What would happen if you tried a different liquid and compared the results?

Learning how to be a scientist is all about asking questions, testing ideas, and finding solutions!

THE SCIENCE BEHIND THE SKITTLES EXPERIMENT

FACTS ABOUT SKITTLES

Skittles are made of ingredients that can dissolve in water. They also do it quickly, so you have neat science right away. <u>Dissolving candy</u> is fun to test out with a variety of liquids and candies. Find out how different candies dissolve at different rates. <u>Dissolving gumdrops</u> also makes a colorful science experiment.

WHY DON'T THE SKITTLES COLORS MIX?

While digging around for information, I learned about a term called **stratification**. The immediate definition of stratification is the arrangement of something into different groups which is a lot like we see with the skittle colors, but why?

Water stratification is all about how water has different masses with different properties, and this may create the barriers that you see among the colors from the skittles.

Still, other sources talk about how each skittle has the same amount of food coloring being dissolved and as the concentration of this color spreads out similarly they don't mix when they meet up with each other. You can read about this concentration gradient <u>here</u>.

TEST MORE IDEAS!

Test out Warm Water vs. Cold Water Try a variety of liquids to add to your skittles.