



Glow Germ Go

Activity Overview: In this activity, students will observe the numerous amounts of germs carried on their hands and the importance of proper handwashing in removing these germs. This activity should take approximately 10 minutes.

Objectives:

The students should learn:

- That germs can be on their hands even though they cannot be seen
- That proper handwashing can remove germs from hands

Materials:

- Glo Germ Ultraviolet (UV) light (available from Peel Public Health)
- Glo Germ Potion & a material safety data sheet for the potion (available from Peel Public Health)
- Hand wash station
- Hand washing procedure posters
- Tape
- Extension cord

BE SURE TO CONSERVE THE GLOW GERM POTION

Set-up: Make sure the UV is plugged in and that a supply of potion is available

Takedown: Unplug the Glo Germ UV light and place the light and the Potion in a locked location

Safety: Electrical Safety - Keep water away from the electrical outlet; ensure to unplug UV light at the end of the day.

Vocabulary:

Germs – microorganisms that cause disease. Such as:

- **Bacteria** – microscopic single-celled organisms
- **Viruses** – microscopic single-celled organisms that must have a living host to survive (like our bodies)

Reminders

Before you start your presentation, check with the teacher or chaperone that the entire group is present and ready to start.

*Remember that **doing** an experiment and **discovering** the answer is more powerful than watching and listening to someone, so try to involve as many children as possible.*

Introduction

Say: "Welcome to Glow Germ Go! This activity will teach you about the germs on our hands and what the right way to wash our hands is. Water helps us stay healthy by allowing us to wash our hands in order to prevent the spreading of germs, which can make us sick."

Engage the students in a discussion about germs:

Ask: "What are germs?"

Answer: Microorganisms such as bacteria and viruses.

Ask: "Can we see germs?"

Answer: No! Germs are so small that we can only see them by using a microscope.

Ask: "Where can germs be?"

Answer: Germs can be anywhere; they can be on your desk, on the floor, outside, and especially on our hands. Germs are part of our daily lives; billions of germs grow and live on and in our bodies every day and some are even necessary for good health. Germs like to live in people's mouths, noses and on their hands. They can cling to hair and hide under fingernails and in the small folds of our skin.

Ask: "What can happen if germs get inside us?"

Answer: They can make us sick!

Ask: "Has anyone been sick this year? Is it fun to be sick?"

Ask: "How can germs get inside our bodies?"

Answer: If we rub our eyes or touch our nose or mouth with our hands, then germs can get inside us.

Ask: "How can we prevent this?"

Answer: If we wash our hands before we eat or before touching our eyes or mouth, then we can stop them from getting inside our body.

Ask: "What is the proper way to wash your hands?"

Answer: First you should wet your hands with warm running water then add soap. Rub your hands together front and back, in between fingers and under nails for 15 seconds. Then rinse your hands and dry hands with a clean paper towel and use the paper towel to turn off the water tap.

Activity: Glo Germ Potion

Say: "Now we are going to show you that handwashing really works to get rid of germs."

Say: "I am going to place a small amount of Glo Germ Potion in each of your hands." *A pea sized drop should be enough for small hands.*

Say: “Now rub the potion all over your hands. Like the potion, germs are on our hands although we cannot see them. Now place your hands under the UV light here.” *Allow all students to use the light to see the potion on their hands.*

Say: “The white glow shows where ‘pretend’ germs are on your hands. Now I want you all to wash your hands in the hand washing station using the proper technique that you see posted beside the station. Then I want you to look at your hands under the UV light again. What do you notice about the amount of glowing white you see now?”

Ask: “Which parts of your hands still continued to glow white under the light?” *Have students discuss areas on their hands that are sometimes missed during hand washing.*

Say: “When we wash our hands, areas that are sometimes missed include the thumbs, between the fingers and around the fingernails. This means it is important to pay extra attention to these areas whenever you wash your hands, and just like the germs, the potion can be washed off through proper hand washing.”

Conclusion:

Say: “Thank you for visiting Glow Germ Go! We hope you have learned how to properly wash your hands so you can make sure you’re staying safe and healthy! Remember:

- Germs are everywhere and we cannot see them. These germs can sometimes make us sick.
- You should always wash your hands before eating, after touching pets, after playing in the playground or playing with dirt/sand and after going to the washroom.
- Water helps us stay healthy by allowing us to wash our hands in order to prevent the spreading of germs, which can make us sick.”

