

# Stop Motion Microorganisms

7<sup>th</sup> Grade

**Project Description:** Students will create stop-motion videos about microorganisms that they have been studying in science class.

## **Rationale:**

Many living organisms such as plants, animals, and human are large enough to be seen with the naked eye. However, other living organisms are so small that we need a powerful microscope to see them these are. These are called Microorganisms. Microorganisms consist of bacteria, viruses, fungi, algae, and protozoa. Although all of these fit under the category of Microorganisms, they are completely different and do very different things on our planet. It's important for students to learn about microorganisms and what they do in order to work towards a more full understanding of our planet and the way it works. In this lesson, students will pick one microorganism to study and become familiar with the characteristics important for its survival. The students will then make a poster displaying the important information about their chosen microorganism. Then for extra credit, students have the opportunity to create stop motion videos representing their microorganism.

Stop motion is an animation technique that physically manipulates an object that appears to move on its own. The object is moved in small increments between individually photographed frames, creating the illusion of movement when the series of frames is played as a continuous sequence. Stop motion animation is a fun, creative, and simple method of presenting information. Using Google Chrome's program Stop Motion Animator, students will create videos displaying their research. Using stop motion animation in conjunction with the study of microorganisms will allow students to demonstrate their knowledge and research in a fun and creative way.

**Enduring Understanding:** Art can be used to display and/or demonstrate a variety of concepts.

## **Essential Questions:**

- How do microorganisms live, move, and eat?
- What do microorganisms do for our planet?
- How can we use stop animation to represent microorganisms?

## **Goals:** *Students will:*

- Work towards an understanding of microorganisms and their purpose
- Work towards an understanding of the stop motion media as a way to express knowledge of another subject

## **Objectives:** *Students will:*

- Create stop animation videos showing their microorganism's habitat, how it moves and how it eats in order to demonstrate knowledge of microorganism
- Create stop animation videos in order to demonstrate understanding of the stop motion animation medium

**Procedure:**

1. Students will pick one microorganism and research its habitat, how it moves, and how it eats.
2. Students will watch and listen to demonstration on stop motion animation.
3. Student will create their own stop animation videos that show its habitat, how it moves and how it eats.
4. Students will post stop animation videos on Google drive in order to be graded.

**Motivations:**

- Stop motion animation demonstration
- Stop motion video example

**Vocabulary:** Stop motion animation, microorganism,

**Materials:** Google Chrome's Stop Motion Animator software, video cameras, materials to make representations of microorganisms (paper, scissors, whiteboard, dry erase marker, etc)

**Assessment:**

**Formative:** *Observing and Interviewing:* Students will be observed and interviewed throughout their artistic processes in order to check for learning.

**Summative:** *Checklist:* Students will be assessed on how they used the stop motion medium to portray their microorganism's habitat, how it moves, and how it eats.

*Optional critique:* Students will have the choice of showing their videos with the class in order to provide and receive feedback from peers.

**National Core Arts Standards:**

Creating: Organize and develop artistic ideas and work by applying visual organization strategies to design and produce a work of art, design, or media that clearly communicates information or ideas.