# Cloudette

# **RIF EXTENSION ACTIVITIES FOR EDUCATORS**

STEAM-THEMED: SCIENCE, TECHNOLOGY, ENGINEERING, ART, MATH



## **SCIENCE**

## A CLOUDY DEMO

Materials (per child): cotton ball, small clear cup, water

Fill each cup with an inch of water. Ask students to hold their "cloud" (cotton ball) and describe how it feels. Next, have students gently place clouds on top of the water. Explain that clouds are actually made up of tiny water droplets. When



evaporated water travels upward and hits cold air, it turns into the water droplets that make up the cloud. Ask students to pick up clouds. Have them describe how the cloud feels. Is it light or heavy? Warm or cold? What happens as the cloud becomes more saturated? Why is water falling from the cotton ball cloud? How is that similar to what happens with real clouds? Explain.

## **TECHNOLOGY**

#### **ID BRACELETS**

Visit https://web.extension.illinois.edu/treehouse/clouds.cfm?Slide=5 for a description of 3 main cloud types and other cloud-related topics. Provide students with strip of paper divided into 3 sections. Have students draw one cloud type per section

and label. Attach as a bracelet before going outside for recess. Can students identify any clouds in the sky using

their ID

bracelets?



# **ENGINEERING**

# CUMULUS CONSTRUCTIONS

Materials: cotton balls, white glue, Q-tips, bowl

Allow students to construct their own cumulus clouds. Have each student draw out a design plan for their cumulus cloud. Place glue in a bowl. Have students use the Q-tip to place a small amount of glue on a cotton ball. Attach another cotton ball to begin structure. Continue until design has been achieved. When finished, discuss challenges faced during construction.

#### **ART**

# **3-D CLOUD CREATIONS**

Materials: glue, shaving cream, blue paper

Mix 1/2 cup glue with 2 cups of shaving cream. Encourage students to create a 3 dimensional cloud shape. Have students create a scene at the bottom of the blue paper. Above the

scene, have them make their 3 dimensional cloud from the mixture. As their cloud is drying, have students personify their cloud and write a narrative about its travels.



#### **MATH**

# **CLOUD COUNTERS**

Use cotton balls as a math manipulative! Have students practice counting, basic addition or subtraction, even fractions, using the light and fluffy miniature "clouds" as counters.

