KOHL CHILDREN'S MUSEUM

THE PLACE WHERE AWESOME LIVES

STEAM Explorers

Drying it Out

Investigate and compare the rate of drying in different conditions.

Big Idea

Wind can impact the speed of water evaporation.

Illinois Early Learning Standards

10.A.ECa Gather data about themselves and their surroundings to answer meaningful questions.	Children will collect data every 5-10 minutes on the speed of drying in different conditions, and use that information to glean which environments make the rags dry the quickest.
11.A.ECd Collect, describe, compare and record information from observations and investigations.	Children will analyze the drying speed of the different rags, making inferences and describing what they are noticing as the time progresses.
11.C.ECg Generate explanations and communicate ideas and/or conclusions about their investigations.	Children will draw conclusions about drying speeds and factors and communicate what they have observed or inferred.

Materials

- **Fan**
- **Four dish cloths (all of the same size and material)**
- **Drying rack**
- **Water**
- **Chart paper, markers**
- **Timer**

Setup

Provide children with a journal for recordings and predictions, as well as the spray bottle. Have all testing objects arranged so children can test each and record what is absorbent and what is repellent.

Directions

1. To start this experiment, have children wet the dishcloths and wring out as much water as they can.
2. Have the children place the wet dishcloths in four different places to test for drying speed. Some examples of places to find are in front of a fan, on a flat

surface, in a box with a lid, outside on the grass, in the sun, on a drying rack, or anywhere else children feel inclined to test.

3. Have the children make predictions about which towel will dry the fastest and which will dry the slowest, and allow them to record their predictions on a chart.
4. Every ten minutes, children should check in on the dish towels in their different placements and observe on their chart if they are dry, almost dry, or still wet.
5. After 30 minutes, invite children to discuss their findings and determine which placement was the most effective at drying the rags out.

Investigation Questions:

- What made some dishcloths dry faster than others?
- How could we change the results?
- What can we learn from the data?
- What would happen if we did this experiment with different fabric?
- What other environments could we test this experiment in?
- Which factors impacted the drying speed the most?