

# **Twisted! The Science behind Pretzels**

## **OUTREACH PRE-VISIT PAGE (Pre-K Ages 3-5) 1 hour**

The Arizona Science Center will be arriving no later than 15 minutes before the start of your program(s). **Twisted!** is intended to be a hands-on introductory program that covers:

- Precise measurement of liquid and solid materials using mathematics
- Exploration of the properties of solids and liquids along with vocabulary building
- The Understanding that heat has an effect upon dough

### **PROGRAM NEEDS**

- Two adult helpers
- **The Arizona Science Center's instructor is a guest in your classroom. Instructors/helpers MUST remain in room for the duration of program for liability reasons. We cannot be responsible for your students.**
- Limited to 30 participants
- One preparation table at the front of the room
- Table/desk workspace for students
- Access to water source and an oven
- Floor space for literacy engagement activity
- If multiple programs are scheduled at your location, it is ideal that the instructor set up in one room and participants be brought in; otherwise allow 15 minutes between programs

### **Before the Program Day (In Preparation)**

- Offer the children play dough and encourage them to mold it in shapes and describe their actions
- Present pretzels as a snack throughout the week and ask students to describe the texture
- Add enhancements like dough rollers, chef hats, or a cardboard oven in the dramatic play center

Extended Learning Opportunity ideas will be provided at the end of the program.

### **Arizona Early Learning Standards**

Science S1C1-C2: Learns about the process of making pretzels

Language and Literacy S1C1: Engages in literacy activities

Mathematics S4C2: Measures, mixes, combines solids and liquids

Physical Development S1C1-C2: Fine and gross motor development

