# Exploration Learning Guide AirPlay Gallery



Experience the **properties of moving air**. Explore ways of **observing and feeling** the effects of air, even if you cannot directly see the air around you.

TRY THIS

**Exhibit: Airflow** 

Using just one clear tube and one PVC connector piece, try getting a ping pong ball to float. Experiment with different lengths of tube or different connector pieces. Does this change how the ball floats?

Try connecting the pieces to move a ping pong ball through the pipes. Can you create more than one "maze" for the ping pong balls?

TRY THIS

## **Exhibit: A-Mazing Airways**

What does it feel like when you place a scarf or yarn ball through the plastic flap and into the Airways? What does this tell you about how the scarves and balls are able to move through the tubes?

Investigate how to **direct air flow**. Test ways of changing the direction of air flow to move an object to a specific location.

TRY THIS

# Exhibits: A-Mazing Airways, Bernoulli Blowers

Can you adjust flaps in the Airways and direct a scarf or yarn ball to come out in a specific place? Make predictions about where you think the soft object will come out if you put it into the same, or a different, opening.

How long can you balance a ping pong ball above the hair dryer? Can you direct the ball into the hoop? How many times can you "score" a basket?

# Dig Deeper

#### Reflect and communicate

What was your favorite exhibit to explore? What did you like about it?

### Make connections

Extend your air play in the da Vinci Workshop at the Wind Table. Using supplies from the Workshop, explore how different materials behave in a column of air. Does the speed of the air effect how a material behaves? Challenge yourself to build something that can float, fly, hover, or spin.

## Explore more at home

Investigate together beyond the Discovery Museum. Continue asking questions, making observations, designing experiments, and predicting outcomes: What happens to a pile of leaves on a windy day? How can you tell if there is a breeze coming through your bedroom window? Do you have any tools around your home that use air? How do these tools control or direct air for a purpose?

As you and your child engaged with the exhibits in the AirPlay Gallery you may have explored concepts that are connected to the Massachusetts Science and Technology/Engineering Curriculum Frameworks and specifically taught in Pre-Kindergarten, Kindergarten, and Grades 2 through 4.