



Sensory play is any activity that stimulates the senses. It is crucial for the cognitive, emotional and physical development of children (and adults!) of all ages. Sensory activities are open-ended and encourage exploration of materials and processes, rather than the end product.

Recognizing and interpreting sensory information provides many benefits, including:

- Builds nerve connections in a child’s brain that help them engage in more complex and sophisticated learning tasks.
- Supports language development as the child learns to use adjectives to describe items and experiences (hot, cold, wet, sticky, etc.).
- Encourages the child to use scientific processes as they play, create, investigate and explore using their senses.

Engaging children with extra needs in sensory activities is especially beneficial. Encouraging a child to engage in sensory play may help with social and communication abilities, while also helping them self-regulate overwhelming experiences. Along with the cognitive and physical benefits, sensory play is an effective coping strategy to help children (and adults) reduce levels of stress and anxiety.

New York Hall of Science

47-01 111th Street
 Queens, NY 11368-2950
 718 699 0005
 Fax: 718 699 1341
www.nysci.org



Sensory Fizzy Dough

Bring on the fizz! This baking soda dough not only provides a playful sensory experience, but it's also a fun science experiment with a fizzy ending.

1. In a bowl, mix 1 cup of flour, 1 cup of baking soda and $\frac{1}{4}$ cup of oil to create the dough. If it's too dry, try adding more oil, if it's too runny mix in more flour.
2. Keep squishing and mixing the dough with your hands until it takes on a crumbly dough consistency.
3. Create colorful fizzy bubbles by adding food coloring or liquid water colors to the amount of vinegar you wish you use. Encourage your child to use their fine motor skills by using eye droppers, spray bottles or squirt bottles to pour the vinegar into the dough.
4. Next, set out the dough in a deep tray or container and invite your child to explore it. Use cookie cutters to mold the dough and try making little castles with plastic cups.
5. When your child is tired of playing with the dough, bring in the vinegar.

What happens when the vinegar hits the baking soda dough? Use your senses to explore the chemical reaction by touching the bubbles, listening to the fizzle sounds and describing what you observe. Provide a magnifying glass for close up observations, too.

Why did that happen? When you mix baking soda and vinegar it creates a chemical reaction. During a chemical reaction two different ingredients are mixed together and then break apart to form a new substance. In this case, the chemical reaction produced carbon dioxide, which made the bubbling and fizzing that you observed.

These activities are made possible thanks to funding from the Jesse and Joan Kupferberg Foundation and The FAR Fund.

New York Hall of Science

47-01 111th Street
Queens, NY 11368-2950
718 699 0005
Fax: 718 699 1341
www.nysci.org