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POTION STATION

The meeting of two personalities is like the contact of two chemical substances: if there is any reaction, both are transformed.

—Carl G. Jung, Swiss psychologist

Most kids are mesmerized by the process of pouring vinegar onto baking soda, watching it fizzle, and then sprinkling more baking soda on top to start all over again. When my two-year-old and I first tried this out and she plowed through all of our cider vinegar, I felt generous and handed over bottles of wine and balsamic vinegar so we could compare the results. The next week I made a point of adding a gallon of vinegar and a few boxes of baking soda to my shopping list, because it was obvious that this would be a staple of our creative diet for a while. Since that first introduction to vinegar and baking soda, known to many as the Volcano Experiment, we've re-created this and other similar mad scientist experiences more times than I can remember. There are a lot of ways to make potions, and this experiment includes a few of our favorite ingredient combinations.

Supplies

- White vinegar (although any kind will work)
- · Baking soda

- Bowls or small jars
- · See individual invitations for specific items

INVITATIONS

Cups and Bowls. Place a few bowls in a sensory tub and scoop a teaspoon of baking soda into each bowl. Fill a cup or small pitcher halfway with vinegar. Invite your child to pour the vinegar into the bowls and see what happens. Once the fizzing settles down you can simply add more baking soda to each bowl and more vinegar to the pitcher, then start all over again.

Colorful Fizzing Tray. Fill a baking dish with baking soda. Fill small bowls with vinegar that's tinted with food coloring. Offer your child an eyedropper to use in adding colorful vinegar to the tray.

Spray Bottle. Sprinkle baking soda across the bottom of a sensory tub. Pour vinegar tinted with food coloring into a small spray bottle that your child can control easily. Invite her to spray the vinegar all over the baking soda. For another twist, add droplets of food coloring to the baking soda before spraying.

EXPERIMENTS

- Stir dish soap and food coloring into the vinegar before adding it to the baking soda for some extra bubbly action.
- Add glitter too. Why not?
- Replace the baking soda with baking powder. How are the results different? Or are they the same?
- · Replace the vinegar with another acid like lemon or lime juice. How is the reaction different?
- Drop a piece of hard candy into the potion. What happens to it?