

Struggle to find ways to keep students engaged on Valentine's Day?

Don't spend any more time planning, searching, or brainstorming.

Everything you need is in this easy to use download!

Disappearing Hearts
Materials: Candy Hearts, Types of Liquids, Water, 4 Cups, Measuring Cup, Sticky Notes/Marker
Procedure:
1. Pour 1/4 c into diff
2. Put one time.
Record

Dissolving Hearts
Name: _____
Materials:
• Candy Hearts
• Cold Water
• Room Temperature Water
• Hot Water
Measuring Cup
Procedure:
1. Pour 1/4 cup of each water into different cups. Label them with sticky notes.
2. Put one candy heart into each cup at the

Sparkly Explosion!
Name: _____
Materials: _____ (use graduated cylinder, 2 liter bottle, etc.)
Procedure:
1. In a small bowl, mix 3 teaspoons of baking soda with 2 teaspoons of water.
2. Using the mixture, paint your secret message onto white paper and let it dry. You may want to brush off any extra baking soda after it has dried.
3. Spray your fruit juice onto the paper to reveal the secret message.

Secret Messages
Materials:
• White Paper
• Baking Soda
• Water
• Paint Brush
• Small Spray Bottle
• Bowl
• Fruit Juice (Lemon, Grape, Blended, etc.)
Procedure:
1. In a small bowl, mix 3 teaspoons of baking soda with 2 teaspoons of water.
2. Using the mixture, paint your secret message onto white paper and let it dry. You may want to brush off any extra baking soda after it has dried.
3. Spray your fruit juice onto the paper to reveal the secret message.

Observations

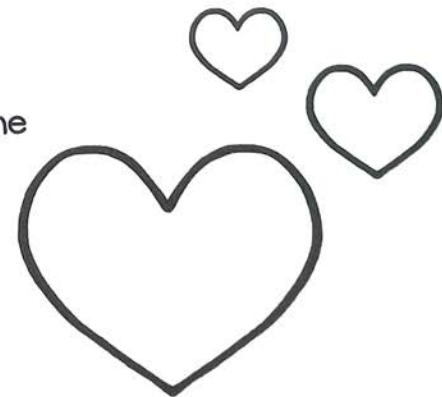
What happened to the baking soda and water mixture once it dried?	
What happened once you sprayed the fruit juice on the paper?	

5

Engaging Activities to use on Valentine's Day

VALENTINE'S DAY SCIENCE

- 1 Disappearing Hearts
- 2 Dissolving Hearts
- 3 Sparkly Explosion
- 4 Secret Messages
- 5 Heart Catapults
- 6 Building a Tower
- 7 Valentine's Day Slime
- 8 Crystal hearts



DISAPPEARING HEARTS

Name: _____

Disappearing Hearts

Materials:

- Candy Hearts
- 3 Types of Liquids
- Water
- 4 Cups
- ½ Cup Measuring Cup
- Sticky Notes/Marker

Procedure:

1. Pour ¼ cup of each type of liquid (including water) into different cups. Label them with sticky notes.
2. Put one candy heart into each cup at the same time.
3. Record your observations in the table below.

	Water	Liquid #2	Liquid #3	Liquid #4
Time Check #1: Minutes				
Time Check #2: Minutes				
Time Check #3: Minutes				
Time Check #4: Minutes				

What liquid made the candy heart disappear the fastest? Why do you think that happened? _____

What liquid allowed the candy heart to last the longest? Why do you think that happened? _____


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Name: _____

Sparkly Explosion!

Materials

- Tall Container (vase, graduated cylinder, 2 liter bottle, etc.)
- 3 Tablespoons of Baking Soda
- ½ Cup of Vinegar
- Red Food Coloring
- Glitter
- Pan or Box to Contain the Mess
- Extra Items (Salt, Sand, Juice, etc.)
- ½ Cup Measuring Cup
- Tablespoon



Procedure

1. Put the baking soda in the bottom of the tall container.
2. Add 6-7 drops of red Food coloring and 1-2 teaspoons of glitter.
3. Quickly pour in the vinegar and observe.
4. Try the same steps but add in different materials.

	Observations
Baking Soda, Vinegar, Food Coloring, Glitter	
Baking Soda, Vinegar,	
Baking Soda, Vinegar,	

Did adding any other items change the reaction that occurred?

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SPARKLY EXPLOSION

BUILD A HEART CATAPULT



Name: _____

Heart Catapult



Task:
Using the materials on the table, you will create a heart catapult. Plan with your team how you will use the materials, build the catapult, test it, discuss strengths and weaknesses, then revise the catapult.

	Brainstorm	Final Catapult
Sketch		

What are the strengths of the catapult you created?

What are the weaknesses of the catapult you created?

How can you revise your catapult to make it stronger?

If you were given a chance to do this again with your team, what would you do differently?

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Name: _____



Secret Messages

Materials

- White Paper
- Baking Soda
- Water
- Paint Brush
- Small Spray Bottle
- Small Bowl
- Fruit Juice (Lemon, Grape, Blended, etc.)
- Teaspoon

Procedure

1. In a small bowl, mix 3 teaspoons of baking soda with 2 teaspoons of water.
2. Using the mixture, paint your secret message onto white paper and let it dry. You may want to brush off any extra baking soda after it has dried.
3. Spray your fruit juice onto the paper to reveal the secret message.

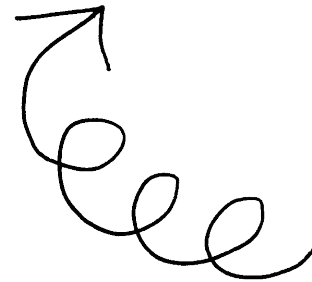
Observations

What happened to the baking soda and water mixture once it dried?

What happened once you sprayed the fruit juice on the paper?



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WRITE SECRET MESSAGES

CREATE A CRYSTAL HEART



Name: _____

Crystal Hearts



Materials

- 1 Pipe Cleaner
- 1 Popsicle Stick
- Small Piece of String
- Large Jug or Jar
- 2 Cups of Boiling Water
- 6 Tablespoons of Borax
- Measuring Cups & Tablespoon

Procedure

1. Shape the pipe cleaner into a heart.
2. In the jar, stir 6 tablespoons of Borax into 2 cups of boiling water.
3. Tie a small length of string to the heart and attach it to the popsicle stick. Leave the popsicle stick on top of the jar, so that the heart is still in the water.
4. After an hour or so, you should start to see crystals form. Leave it overnight, then answer the questions below.


Draw Your Crystal Hearts in the Jar	Record Your Observations

Why is hot water important for this investigation?
.....

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Name: _____

Valentine's Day Slime



Materials

- ½ Cup of Water
- ½ Cup of White Glue
- ½ Cup of Liquid Starch
- Red Food Coloring
- Mixing Bowl
- Spoon
- ½ Cup Measuring Cup
- Baggies

Procedure

1. Pour all of the glue and water into the mixing bowl.
2. Stir the glue and water together.
3. Add 6 drops of food coloring to the mixture.
4. Stir as you pour the liquid starch into the mixture.
5. Play with the slime. As you play, it will become more stretchy and easier to hold.
6. Separate the slime so each person in your group has an equal amount.
7. Put the slime into separate baggies.
8. Take the slime home to play more.

Observations:

.....

What would happen if you put more white glue in the slime?
.....
.....

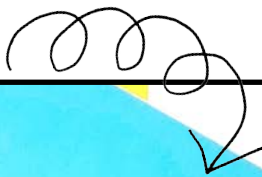
What would happen if you didn't store the slime in a baggie?
.....
.....

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VALENTINE'S DAY SLIME




BUILD A HEART TOWER



Name: _____

Build a Heart Tower



Task:
Use the materials on the table to create a heart tower. Plan with your team how you are going to use the materials, build the tower, discuss strengths and weaknesses, then revise the tower.

	Brainstorm	Final Tower
Sketch		

What are the strengths of the tower you created?

What are the weaknesses of the tower you created?

How can you revise your tower to make it stronger?


If you were given a chance to do this again with your team, what would you do differently?

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Name: _____

Dissolving Hearts



Materials:

- Candy Hearts
- Cold Water
- Room Temperature Water
- Hot Water
- ¼ Cup Measuring Cup
- Clear Cups

Procedure:

1. Pour ¼ cup of each water into different cups. Label them with sticky notes.
2. Put one candy heart into each cup at the same time.
3. Record your observations in the table below.

	Cold Water	Room Temperature Water	Hot Water
Time Check #1: Minutes			
Time Check #2: Minutes			
Time Check #3: Minutes			

What temperature of water made the candy heart dissolve the fastest? Why do you think that happened? _____

What temperature of water allowed the candy heart to last the longest? Why do you think that happened? _____

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DISSOLVING HEARTS

