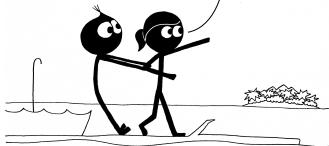


LOOK AN
ISLAND! LET'S
GO EXPLORE!**SCIENCE MOM**

— JENNYBALLIF.COM —

YouTube Channel:
www.youtube.com/ScienceMom

Email: jenballif@gmail.com

**3. Eggshell Geodes****Materials:**

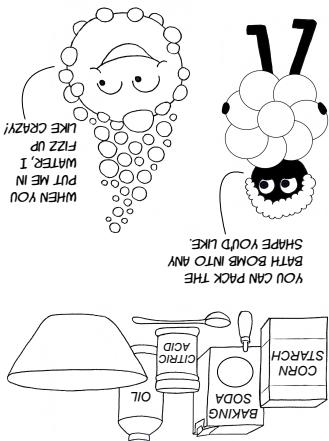
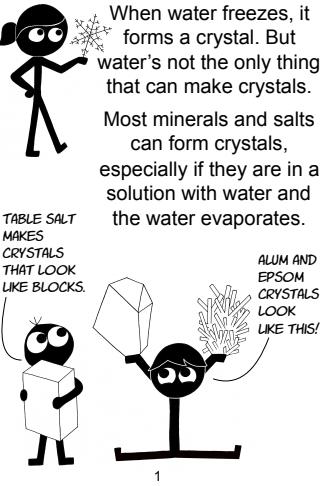
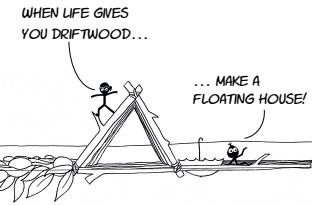
- Water
- Jars or cups
- Alum
- Food coloring
- Eggshell
- White glue

Method:

- Heat 2 2/3 cups of water and add 1/2 tsp food coloring and 1 1/3 cup of alum powder.
- Stir until dissolved, and then carefully transfer the solution to two heat proof jars. Hotter water makes larger the crystals. Cooler water makes smaller sized crystals.
- Optional:** Seed the inside of the eggshell with glue and sprinkle alum powder over surface.
- Place eggshell in alum solution and let sit for 12-24 hours.

7

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**SCIENCE MOM'S
Guide to WATER, Part 6**

1

- HALOCLINE:** Layers of water having different amounts of salt.
- Method:**
- Prepare salt water and plain water. Make sure the salt water and plain water don't pour directly into the salt water—side of the cup just above the salt water—pour the water onto a spoon held by the side of the water.
 - Fill 3 jars or cups. One with plain water, one with salt water, and then lay them out to dry.
 - Place the eggs in the jars and lay them out to dry.
 - Observe if they sink or float.
- Materials:**
- Tap water
 - Jars or cups
 - Salt water
 - Eggs or hard-boiled eggs

2. Halocline plus Eggs

13

- Method:**
- Mix the dry ingredients together in a bowl. In a separate bowl slowly combine the wet mixture into the dry mixture using a fork or whisk.
 - Pack the mixture into clear molds or ceramic balls or other molds.
 - Carefully remove egg or ball.

- Materials:**
- 1/2 C baking soda
 - 1 Tbsp cornstarch
 - 1/4 C citric acid
 - Water
 - 1/4 Tbsp oil
 - 1/3 C cornstarch
 - Food coloring
 - 1 Tbsp oil
 - Plastic mold
 - 1/4 Tbsp essential oil
 - Plastic mold

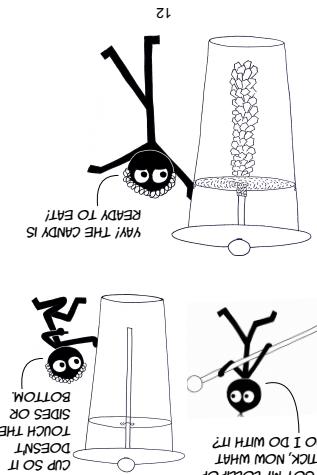
6. Bath Bombs**4. Borax Snowflakes****Materials:**

- Water
- Pipe cleaner
- String
- Borax powder
- Jars or cups
- Food coloring
- Pencil or piece of cardboard

Method:

- Heat 4 cups of water and add 1 cup Borax. Stir well.
- Take three pipe cleaners and fold into a snowflake shape.
- Suspend the snowflake in the borax solution using the string and cardboard or pencil.
- Wait 12 to 24 hours and then remove from solution. To preserve the crystal, coat it with clear nail polish.

6



11

WHAT IS THIS CRYSTAL MADE OF?

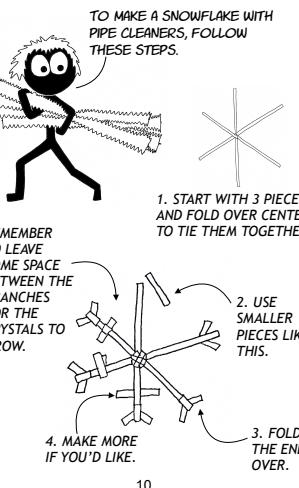
Name Chemical Formula

Table	Chemical Formula
Salt	Sodium Chloride (NaCl)
Alum	Hydrated potassium aluminum sulfate ($KAl(SO_4)_2 \cdot 12H_2O$)
Borax	Sodium tetraborate ($Na_2B_4O_7 \cdot 10H_2O$)
Sugar	Sucrose ($C_{12}H_{22}O_{11}$)
Epsom Salt	Magnesium sulfate ($MgSO_4$)
Quartz	Silicon dioxide (SiO_2)
Diamond	Carbon (C)

2

- 1. Reapperearing Salt**
- Materials:**
- Water
 - Jar or cup
 - Salt (non-iodized works best)
 - Stir until dissolved.
 - 3 Tablespoons of salt.
 - Heat 1 cups water and stir in
 - Wait several days. Observe.
 - Water can dissolve most salts and minerals because they have charged polar particles.
 - Growing larger salt crystals for jar makes excellent seed crystals.
 - But this is quite quickly, so a lot of salt is required.
 - The salt forms on the bottom of the jar makes excellent seed crystals for jar.

3



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- 5. Rock Candy**
- Materials:**
- Water
 - Sugar
 - Cornstarch
 - Wood popsicle or cake pop stick.
 - Cardboard
 - and mix in 3 1/2 cups of white sugar. Bring it to a boil.
 - Dip the sticks into the syrup and then roll them in sugar. Let dry.
 - When the syrup has cooled, pour it into cups and suspend the sticks inside.
 - Remove the sticks when your candy has dried.
 - Extracts when your candy is the desired size.

11

B

A

A

X

B

C

C

D

F

E

E

D

E

G

G

X