



Dr Jo Science Lockdown Weekly Science Challenge Frost, freezing, snow and ice



Make frosty snow



- Put some ice inside a clean, dry food can (decorate it if you like)
- Place the can in a warm room
- Watch as frost appears on the outside of the can!
- The water vapour in the warm air condenses when it comes into contact with the cold can
- It's so cold with the ice inside that the water vapour actually freezes!
- This is how frost forms

Freezing and Melting



- Freeze water in ice cube trays or pots and then watch what happens as it melts.
- Can you speed up or slow down how fast it melts?
- You could try freezing small toys, leaves or flowers in the ice and see how you can set them free
- What happens when you add salt? Or sugar?

Investigate freezing points



- Fill an ice cube tray with different liquids (try water, juice, oil, tomato sauce etc)
- Time how long each one takes to freeze
- Why do some freeze more slowly than others?

Freeze a bubble!

- Find an early morning frosty surface and blow some bubbles
- See if you can watch them freeze!
- What patterns can you see?



No snow? Make your own indoor fizzy bathbomb



- You will need:
- Sodium bicarbonate
 - Cream of tartar
 - Cornflour (optional)
 - Cooking oil
 - Essential oil water
 - Mould

- Mix 2 tsp sodium bicarbonate and 1 tsp cream of tartar
- Add 1 tsp cooking oil and a few drops of essential oil
- Mix well
- Work quickly to combine then press into a mould with the back of a spoon
- Leave to dry for a few hours before turning out
- Add a few drops of water or pop in the bath (it will fizz!)

Adult supervision required. Please take care. You are responsible for your own safety.
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