Sweet Diffusion

Background

Students use coloured sweets to demonstrate diffusion.

You will need...

- ✓ 1 × Petri dish
- ✓ 1 × 250 ml beaker of water
- ✓ 2 × plastic spatulas
- ✓ 1 × sheet of white paper
- ✓ 1 × packet of small coloured sweets, e.g. Skittles©

Follow these steps

- 1. Pour some water into a Petri dish until it is almost full.
- 2. Arrange four different coloured sweets in the 12, 3, 6 and 9 o'clock positions.
- 3. Observe what happens.

So what happened?

The coloured dye from each of the sweets begins to dissolve in the water and diffuse through it. The colours meet at boundaries, forming an 'X' shape across the dish.

What next?

Experiment with sweets and different solvents and at different temperatures.

