



Density Rainbow

What Do I Need

1. 5 glasses or clear plastic cups
2. Sugar
3. Water
4. Tablespoon for measuring
5. Various food colouring

What Do I Do

1. Line up 5 glasses - to the first add 1 tablespoon of sugar, to the second add 2 tablespoons of sugar, to the third add 3 tablespoons of sugar, to the fourth add 4 tablespoons of sugar. Leave the 5th glass empty.
2. Add 3 tablespoons of water to each of the first 4 glasses. Stir. If the sugar doesn't completely dissolve in any of the glasses add an additional tablespoon of water to each glass.
3. Add 2-3 drops of red food colouring to the first glass, yellow to the second glass, green to the third glass and blue to the fourth glass. Stir
4. Gently pour the blue sugar solution approximately 1/4 way up into the empty glass.
5. Very carefully now add the green sugar solution - do this by pouring over the back of a spoon and try not to disrupt the blue sugar solution too much (it might be worth practising this technique). Add until the glass is about 1/2 full.
6. Repeat this with the yellow sugar solution until the glass is 3/4 full.
7. Finally add the red sugar option until the glass is full.

What do you see? What has happened?

If you leave it for a few hours - what happens?