Making Waves in a Plastic Bottle

You will need:

• Plastic bottle or jar (with lid)
• Water
• Blue food colouring
• Vegetable/Baby Oil (any oil will do so long as it’s clear)
• Under the sea creatures (optional)

Creating the ‘Making Waves Bottle’

• Fill 1/3 of the bottle with oil.
• Fill the remaining 2/3’s with water (you may not want to fill it to the top)
• Add blue food colouring (you only need a few drops)
• Drop in your plastic sea creatures if using.
• Screw the lid on tightly!
Exploring

• Start by laying the bottle on its side, watch what happens to the oil and water.

• Slowly tilt the bottle back and forth while holding it with two hands. The children may notice that the oil and water do not mix, they may also notice that one of the liquids form waves and the other doesn’t.

• Talk about how water moves. Explain to your child what happens as wind blows across the water, and how this creates waves. When you have finished with the bottle, you could always put the water in a bigger container and ask your child to blow the water and watch what happens, or drop pebbles in to investigate.

You can leave the creation and exploration areas of this activity more open ended if you like. It will open the way for this to be more of a STEM activity.