

Registration sheet

Experimental activity: Reversible transformations



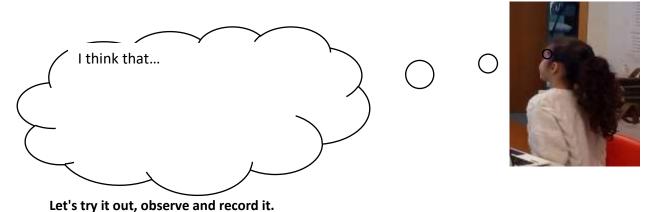


You already know that the water cycle shows that some materials, such as water, change their physical state.

The same happens with materials like glycerine (candles).

We're going to carry out experiments with the following materials: water, paraffin and salt.

Can these materials return to their original state after changing their physical state?



fusion/solidification



| 1 st | 2 nd | 3 rd | | | |
|-------------------------|---------------------------------|--|--|--|--|
| Paraffin (unlit candle) | The candle was lit. | The paraffin has fallen into the cold dish and It passed into the state | | | |
| state | Paraffin, passed into the state | | | | |
| | | · | | | |

solidification / fusion





| 1 st Water at room temperature. | Znd The water bottle was placed in the | We took the bottle of water out of the freezer and the ice (frozen water) | | | |
|--|--|--|--|--|--|
| State | The water, is now | The water is now | | | |
| evaporation | / condensation | | | | |
| 1 st | 2 nd | 3 rd | | | |
| Water in the bag. | The bag was placed in the sun. Some of the water | Water droplets formed inside the bag, because the bag was colder than the air inside it. It is | | | |
| State | The water, is now | The water is now | | | |

> What can we conclude? Circle the correct option..





The paraffin and water **have changed/not changed** their physical state.

The paraffin and water **have returned/not returned** to their original state.

> Complete with the words from the box:

temperature/ reversible/ transformations

What contributes to (causes) these changes of state is the

Dissolution

| 1 st | 2 nd | | | 3 rd | |
|-----------------------|---|---|---|-----------------|----------|
| Salt crystals. State | The salt crystals were mixed with the liquid water. Stir very well and the salt | | The water in which the salt was dissolved and the small pieces of salt remained at the bottom of the container. | | |
| | The salt passed into the s | | | | |
| | | · | The sa | alt has ret | urned to |
| | | | | | _· |

Learn more...

> Dissolution is also a reversible transformation that happens when we add a solute (salt, sugar, ...) to a solvent (water ...), forming a





solution. When the water in the solution evaporates, the salt remains at the bottom of the container, returning to its initial state.



