

The background features a teal-to-pink gradient. In the top left, there's a cluster of white dots. A large sphere with an orange-to-blue gradient is surrounded by several white elliptical orbits, with two smaller white spheres on these orbits. In the top right, a white crescent moon is visible. The bottom of the image has abstract, overlapping shapes in shades of blue, purple, and orange, with a small red sphere and a white circle. A vertical grid of white dots is also present on the right side.

Lesson 6

Changes in Matter Through Application of Heat





Heating food causes chemical change

You learned from the previous lesson that simply exposing some objects to oxygen produces various effects. Aside from oxygen ; another thing that produces changes in matter is heat.

Heat, as discussed in your previous grade, is a form of energy . it is described as low high th e temperature is. We measure heat using a thermometer

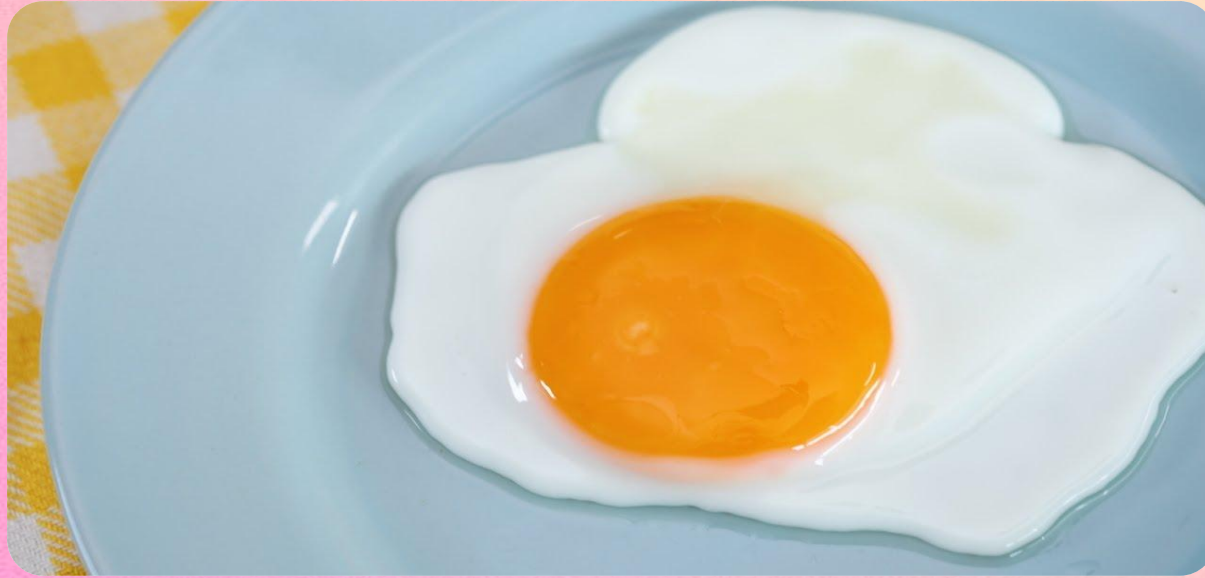


Drying clothes under the sun

Heat can bring about physical changes in matter. Some solid materials melt when enough heat is applied to them. A common example of melting ice when it is placed out of the refrigerator the ice absorbs heat from the surroundings, which will then melt after a few minutes.

On the other hand, if water subjected to heat, it evaporates. Just like when your mother hangs your wet laundry under the sun. After several minutes to hours, the clothes become dry, this means that the water in your clothes evaporated.

In the next activity, an example of physical change caused by heat will be demonstrated.



Fried egg have undergone chemical change through heat

Heat does not only produce physical change in a material, sometimes heating a material causes it undergo chemical changes. The chemical changes caused by heat are irreversible.

One common example of this is cooked food.

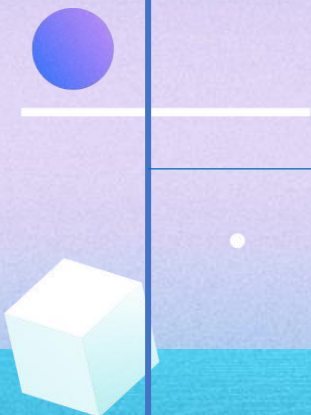
The egg that your mother cooked for your breakfast has undergone chemical change by cooking. Now, can you bring back the egg into its liquid form before it was cooked? Did chemical change happen to the egg that your mother cooked?

Let's Recall

Changes in Matter Through Application of Heat

Physical Changes

Chemical Changes



Let's Check



Answer the following Questions.

1. What is Heat?
2. What are the sources of Heat?
3. Why Heat important?



Let's Apply it



1. Glass blowing



2. pasteurization




3. Metalworking
(making jewelry)

Briefly explain how heat is related to the following activities. You can use other books or the internet as the reference.



Thanks !





Source images:

