Corrosion

You know that brown layer on top of old iron windows? That's called corrosion. It is the process of conversion of a metal into a stabler state to form its oxide or hydroxide or sulphide state that causes deterioration of the metal. It's the same thing that happens to huge ships. That make them unfit to sail.

Let us learn how this happens.

AIM
To learn how corrosion happens in an iron nail.

THINGS YOU WILL NEED

Few iron nails
Water
3 jars.

PROCEDURE

1. Take the three jars and fill one of them with water till the brim.
2. Fill another jar half with water
3. Leave one jar empty.
4. Now place the iron nails in each of these jars and leave them for observation.
5. Take another nail and leave it open in the atmosphere.
6. You will have to leave them aside for 4-6 days.

OBSERVATIONS

Are all the nails corroded?
Which nail gets corroded faster?

When metal reacts with oxygen and water it forms a hydroxide or an oxide form of the metal. This process makes the metal more stable. Over a period of time this metal gets corroded till it's core and becomes brittle.

Did you know that the Statue of Liberty was originally brown in colour and the green appearance today is nothing but the oxidation of the metal?

QUESTIONS TO RESEARCH ON:

What metal was used to make the Statue of Liberty?
Do all metals get corroded?