

Making Water Safe to Drink  
Solar Cookers International, Nyacach, Kenya  
Filmscript

**Commentary:** In schools across Kenya, pupils are learning new ways to improve the health of themselves and their families.

**Teacher:**

We're going to learn about water pasteurisation. That is in simple terms: boiling water. Say it – "boiling water"...

**Commentary:** Water-borne disease is one of the biggest threats to people's health in Africa.

**Teacher:**

...full of diseases like typhoid...

**Commentary:** The most effective way of making water safe is pasteurisation – which is boiling water to kill germs.

**Dinah:**

Even now, the majority don't pasteurise their water. You have to educate them because some of them don't know that water can cause diseases if its not properly treated.

**Teacher:**

So for us to get clean water we must boil it to a certain degree.

**Commentary:** One of the easiest and cheapest ways to pasteurise water is through solar cooking. This is where you use the sun to heat up the water.

**Teacher:**

How many of you have seen this? Very good.

**Dinah:**

When we are using the Cookit to pasteurise water, it is very convenient. Now this is because you are not using any money to buy firewood so you save money that you could've used for fuel and you don't have to keep checking the fire and that the water will boil, you just leave it there.

**Teacher:**

Now, already there is water in this sufria, in this one here.

**Commentary:**

These pupils are experiencing first-hand how solar energy can be used to pasteurise the water. Over several hours, the sun heats up the water to a temperature safe for drinking.

**Teacher:**

Thank you very much young girls. Let's pretend that our water is now boiled and ready. We'll check. What will show us that now the water is ready for drinking? What do you check? You check WAPI.

**Commentary:**

Inside the pan is a WAPI. This specially designed thermometer contains wax which melts once the water has reached a temperature high enough to kill germs.

**Teacher:**

What will have happened to the wax in the wapi?

Good girl. It will melt. Class, say 'it will melt'. It will melt.

**Commentary:** For these pupils, the value of pasteurisation is clear.

**Pupil 1:**

This can help prevent us from getting diseases like typhoid and cholera.

**Pupil 2:**

It can boil water and the germs can die very quickly.

**Pupil 3:**

The sun is for free!

**Commentary:**

Using a naturally available resource – the sun – solar cooking is a simple technology that can save lives.

**Dinah:**

More people are beginning to use the solar cooker to pasteurise their water. The water-borne diseases have gone down and the families are much healthier.