

Resource 17 – Saving water by using recycled water

In this activity you will explore the potential of using recycled water in your home.

Background

Water reclaimed from sewage is called **recycled water**. In Melbourne, recycled water can come from the Eastern Treatment plant at Bangholme and the Western Treatment Plant at Werribee. In Melbourne, recycled water is already being used in a wide range of irrigation water for agriculture, parklands and golf courses. Using recycled water is becoming more common. Water is a far too valuable resource to be used only once.

If treated to a high standard, recycled water is safe to use in a wide range of applications around the house and garden, in parks and industry, and agriculture. It has been used in homes in many parts of the world for more than 30 years without health or safety problems.

A typical household will use around 270,000 litres of water a year. This usage can be broken down into five main areas in the table above.

The table below shows the amount of water that is used in a typical household. But what is a typical household? The amounts below are only an approximation of how much water your house hold uses.

Area	Amount of Water used
Bathroom	54,000 litres
Toilet	54,000 litres
Laundry	40,500 litres
Kitchen	27,000 litres
Garden beds and lawn	94,5000 litres

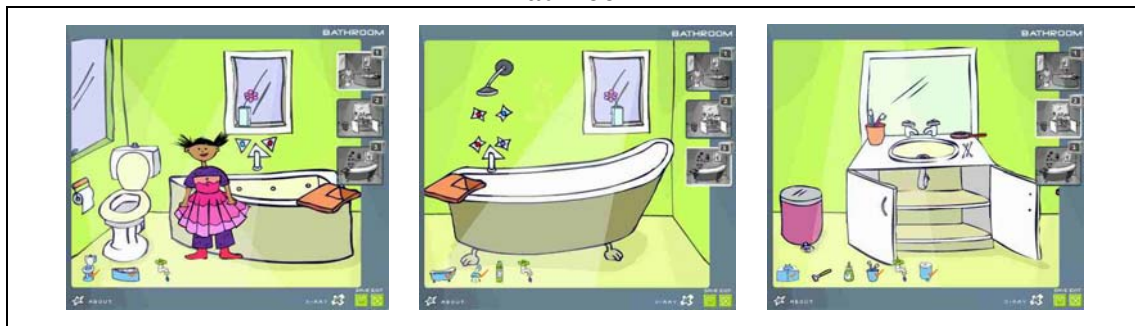
The Challenge

To work out how much water your household uses, and then estimate how much you could recycle and where you could use that recycled water around the home.

What to do

1. Use the table “Water usage of a typical home” (you can use a photocopy or create it in Word or Excel or an equivalent application, or rule it up.)
2. Now using the *Home Water Investigator* fill in the fill in the second and third columns of the table: “Ways water is used”, “Amount of water used”

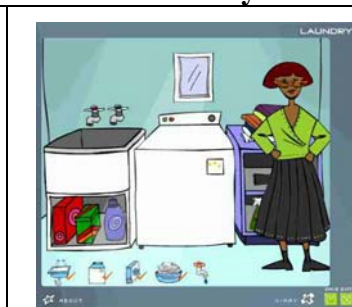
Bathroom



Kitchen



Laundry



Outside



(All images taken from ‘The Home Water Investigator’ © available from Melbourne Water)

Questions

1. From your list, decide which of the activities could use recycled water instead of drinking water
2. Now decide , how much (as percentage) of the time they could use recycled water.

hint: if all of the time then 100%. If only some of the time for instance some of the water you may decide you could water the lawn with recycled water, but not the veggie garden).

3. Using your answers in the table 'Water usage of a typical home' for each of the five areas (for more detail you can do this for each activity) use the percentage you've estimated to calculate the amount of recycled water that could be used.
4. Finally, calculate the percentage of a typical home's water usage that could be recycled water.

Extension activities

1. Would you like to see recycled water used in your home? Discuss with your classmates the issues involved in introducing recycled water into your suburb. Make a list of these issues, devise a plan, and design where and how you could use recycled water in your school.
2. Investigate the issues of using greywater and rainwater.
3. You can find out about both these on Melbourne Water's 'Water Sensitive Urban Design' website at: www.melbournewater.com.au/wsud, and then go to 'Integrated Water Cycle Tools'.

Water usage of a typical home

Area	Ways water is used	Amount of Water used	Percentage that could use recycled water	Amount of Recycled water (litres) this area could generate
Bathroom		Total=		
Toilet		Total=		
Laundry		Total=		
Kitchen		Total=		
Outside including garden beds and lawn		Total=		