

## Grade: 3 & 4

### From the catchment to the tap

#### Students will be able to:

- understand where our drinking water comes from
- consider the impacts of land use on water quality
- identify simple behaviours we can practice to protect water quality

#### Lesson Details:

##### 1. Most of us take water for granted.

We turn on a tap and we expect water to flow. If it doesn't, its only then we start to worry about how we will cope. We don't stop to think about the water journey from the river to our tap and the many pipes, pumps and reservoirs involved.

Brainstorm these questions with your students:

1. What has happened to that water on the way to your house?
2. Where does that water come from that flows through your taps?

##### 2. What happens in our water catchment?

It's important to understand what a water catchment is and how easily water can become polluted if people who live in the catchment do not take care.

As the name suggests, a water catchment is a location where water is 'caught' and contained within rivers prior to entering the sea.

Usually there is a high point like a mountain and a low point where the water collects. Have your students think about some land uses in your local water catchment, here are some examples:

- gardens with deciduous trees
- people boating in rivers or picnicking beside them
- exercising dogs or horses
- livestock grazing adjacent to rivers
- large factories
- clearing vegetation on the river banks
- use of fertilizers (cont.)

#### Curriculum Links

##### Grade 3

###### Science

- ACSHE051
- ACSIS060

###### Literacy

- ACELY1676
- ACELY1792

###### Geography

- ACHGK018
- ACHGK019
- ACHGS020

##### Grade 4

###### Science

- ACSSU073
- ACSSU075
- ACSHE062
- ACSIS071

###### Literacy

- ACELY1687
- ACELY1688

###### Geography

- ACHGK021
- ACHGK022
- ACHGK024
- ACHGK025
- ACHGS027
- ACHGS032

###### Organising Ideas (Cross Curr.)

- OI.2, OI.3,
- OI.4, OI.5,
- OI.7.

## Lesson Details continued:

### 2. What happens in our water catchment cont.

This list of activities that happen often near or on our waterways may impact water quality. This can in turn impact the vegetation around the river and the creatures that live in the river. Poor water quality poses a health risk for swimmers, kayakers etc. It is also more difficult to clean, which means that water treatment plants must use more chemicals (in a controlled way) to clean the water so it is safe to drink, looks appealing and has a pleasant taste.

### 3. What can you do to protect your catchment?

Obtain a map of your water catchment (your local Natural Resource Management Group may be able to assist) and have students think about the types of practical things we can do to protect water from pollution. For example:

If the river is near a park and you are walking your dog, take a plastic bag with you to collect the dog poo and dispose of it.

Develop ways to manage the following situations:

1. You are having a picnic and your rubbish blows away.
2. Your family goes boating and the engine is leaking oil.
3. You are fishing and your line breaks, what do you do with it?
4. Your stock are grazing in the river, how do you keep them out?
5. You need to wash the car, where should you do that?
6. Your neighbour is clearing land near the river, what should you suggest?
7. Your parents are applying pesticide on plants in the garden and its forecast to rain.
8. There is erosion on the local river bank, what can you do to fix it?

Share your ideas and develop them into posters to place around the school to help educate other students.

## Lesson Reflection:

1. What is a water catchment?
2. What are the threats to water quality in your catchment?
3. What can you do to help keep your local river clean?
4. What happens to the plants and animals in the catchment if the water quality is poor?



## Did you know?

Your tap water has travelled a long way to get to you. From the river, to a treatment plant, through pumps and pipes to reservoirs and finally to your home. What a journey!

## More Information

Contact our Education Officers who can visit your classroom and share some engaging water activities with your students. Alternatively visit our website, complete an online request form and our Education Officers will contact you.

Email: [education@taswater.com.au](mailto:education@taswater.com.au)

Website: [www.taswater.com.au](http://www.taswater.com.au)

## Additional Activities

Find out where your water catchment and your water treatment plant is. Invite TasWater to talk to your students about how we make tap water safe. Encourage students to draw their own water journey from the treatment plant to their home, including reservoirs. We can tell you how many kilometres the water has travelled to your school.