

Teacher Resource

Episode 26 8th September 2020

Threatened Flora

Q Focus Questions

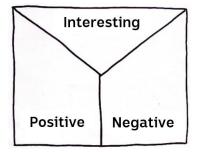
- 1. Discuss the BTN *Threatened Flora* story in pairs. Record the main points of the discussion.
- 2. Where in Australia can you find the Woods Well Spyridium? Find using Google Maps.
- 3. What factors are threatening the survival of some Australian flora?
- 4. How many different species of plants are there in Australia?
- 5. What percent of plants are listed as threatened in Australia?
- 6. What things depend on plant species? Give one example.
- 7. How do botanic gardens help protect plants?
- 8. What is a seed bank?
- 9. How are the kids in the BTN story helping protect Australia's plants?
- 10. If we lose a plant species it is lost forever. True or false?

Activity

Note taking

Students will practise their note-taking skills while watching the BTN *Threatened Flora* story. After watching the story, ask students to reflect on and organise the information into three categories. What information in the story was...?

- Positive
- Negative or
- Interesting



Key Learning

Students will learn more about the importance of preserving native plants and research a threatened native plant in detail.

(2) Curriculum

Science - Year 4

Living things have life cycles.

Living things, including plants and animals, depend on each other and the environment to survive.

Science - Year 5

Living things have structural features and adaptations that help them to survive in their environment.

Scientific knowledge is used to inform personal and community decisions.

Science - Year 6

The growth and survival of living things are affected by the physical conditions of their environment.

☆ Activity

Class Discussion

Discuss the BTN *Threatened Flora* story as a class, using the following questions to guide the discussion. Record responses on a mind map. Clarify students' understanding of the following terms: *Flora, introduced species, native, conservation and biodiversity.*

- Why do we need plants?
- What native plants do you know? Make a list.
- What things are threatening our native plants?
- Name an animal or insect that relies on native plants.
- Why is it important that we protect and conserve living things?





Match these terms to their definitions

Term	Definition
Threatened species	This species is facing a high risk of extinction in the wild in the medium-term
Extinct	There is no immediate threat to the survival of this species
Least concern	This species is facing a very high risk of extinction in the wild in the near future
Vulnerable species	This species may be considered threatened in the near future
Endangered	This species is no longer in existence

☆ Activity

Get to know the plants in your area

Students choose a plant in their school grounds, backyard or local park. Then respond to the following:

- Describe the plant they have chosen using words and an illustration. Include the different parts of the plant and any interesting features.
- *Identify* what type of plant it is. Find its botanical name. Is it a native or introduced species?
- Describe any insects or wildlife on or near the plant.
- Find out the conservation status of the plant.



Further investigation

Does your local botanic garden have a program similar to the one in the BTN story? Students can investigate working with their local botanic garden to collect and propagate seeds from endangered plants.



Improve the biodiversity in your school yard

Students will work together to plant and care for native plants in their school yard. Ask them to consider the following:

- What kind of native plants will you plant and where will you plant them? Which plants are native to your area?
- Where will the plants get the sun or shade they need?
- Where will it be most appreciated?
- What materials and tools are needed?
- Predict and record the growth rate, for the first days/weeks/months, and see whose predictions are most accurate.
- Include an information label next to the plant for other students to learn more about it and the biodiversity of your school yard. Include the botanical name, when it was planted and some basic information.
- Make a map of your school yard which highlights important plants in your school yard.





Students will choose a threatened Australian plant to learn more about (they may want to choose one that is local to their area). The <u>Threatened Australian Plants fact sheet</u> may help students select a plant to investigate. Use the template below to help guide their research.

Research project – Threatened Australian Plant	
Scientific and common name	
Describe its appearance What does it look like (shape, size, colour, special features)?	
Locate where this species can be found using Google Maps	
Conservation Status	
Threats	
Recovery Action (what is being done to protect the species)	
 Interesting facts What is your favourite thing about this species? What surprised you about your research? 	
Photograph or Illustration	



BTN stories

These BTN stories explore different ways in which threatened plants are being protected.

Endangered Seeds

- 1. How many plant species in WA are threatened with extinction?
- 2. What is a seed bank?
- 3. Where is the biggest seed bank in the world located? Find using Google Maps.
- 4. How many different types of seeds does it hold?
- 5. What type of plants does the seed bank in WA focus on?
- 6. What are the kids in the BTN story doing?
- 7. What is the name of the plant they are looking after?
- 8. How do the kids know when to harvest the seeds from the plant?
- 9. Why is it important to collect seeds?

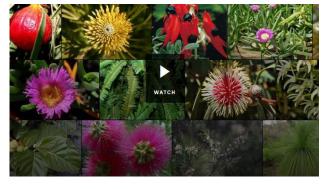


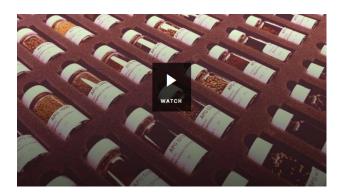
Plant Bank

- 1. What is another word for plants?
- 2. How many species of plants can be found in Australia?
- 3. Since European settlers arrived in Australia how many different types of plants have disappeared?
- 4. Someone that studies plants is called a...
- 5. The idea of seed banks is a completely new idea. True or false?
- 6. List a reason why scientists store seeds?
- 7. Where in the world is the 'doomsday vault'? Locate using Google Maps.
- 8. Why is it important that we look after our plants?
- 9. How are seeds prepared for the seed bank? Illustrate using a flow chart.

Doomsday vault

- 1. Describe what the seed bank and its surroundings looks like.
- 2. Why was the seed bank created?
- 3. Why is the seed bank also called the Doomsday Seed Vault?
- 4. How many different types of seeds are stored in the bank?
- 5. List some of the types of seeds that are stored in the seed bank.
- 6. Australia is about to make its biggest deposit to the seed bank. True or false?
- 7. How old is the Doomsday Seed Vault?
- 8. What did you learn while watching the BTN story?







Useful Websites

Threatened Australian plants – Department of Environment and Heritage https://www.environment.gov.au/system/files/resources/d947f8ec-dd8b-4e7f-bd3b-8246e0702547/files/plants.pdf

Plant Bank - BTN

https://www.abc.net.au/btn/classroom/plant-bank/10529572

Endangered Seeds - BTN

https://www.abc.net.au/btn/classroom/endangered-seeds/11229492

National Herbarium of New South Wales – The Royal Botanic Garden Sydney https://www.rbgsyd.nsw.gov.au/Science/National-Herbarium-of-New-South-Wales

