

Family education and activity pack

Introduction to Bob the Railway Dog

Year 1 ACHASSI018 Pose questions about past and present objects, people, places and events

Year 2 ACHASSI034 Pose questions about past and present objects, people, places and events

What was so special about Bob the railway dog?

Bob lived from c1878 – 1895. He was famous in Australia and news of his death was reported as far away as the UK. He discovered the magic of traveling by trains. His favourite place was on a Yankee engine; the big whistle and belching smokestack seem to have an irresistible attraction for him. It was a joke among railway employees that Bob was the only individual who was permitted at all times to travel on the government railways free of charge and without a pass.

Old days:

Before you come to the Museum we encourage you to ask your grandparents or an elderly friend for a picture of them while using transportation.

Ask them the following questions:

Did they use the railways as transportation when they were younger? How has it changed?

What other kinds of the transportation did they use when they were younger?

Are they still using the same means of transport today? Why and why not?

Did they have a pet? Did the pet travel with them?

Draw a picture of you or your family riding on a train, where are you travelling to?:

Your dog:

The railway dog breed was reportedly a cross between a Smithfield and a Collie

Tell us about your dog? What breed is it? If you do not have dog tell us what kind of dog you would like to have one day?

What kind of activities you like to do with your dog?

Go and see the railway dog picture in the Fitch Pavilion. In your opinion which one of the following photos looks more like Bob the railway dog?



Left: Smithfield Right: Bearded Collie

Photo courtesy, Wikimedia, UniqueAndreas, Portrait of our Bearded Collie.

Please also see our school education packs for more activities and supplementary information relating to Bob the Railway Dog.

Onsite Education Pack 2

Ages: Year 4 & 5

Curriculum: ACHASSI075 Record, sort and represent data and the location of places and their characteristics in different formats, including simple graphs, tables and maps, using discipline-appropriate conventions

ACHASSI081 Reflect on learning to propose actions in response to an issue or challenge and consider possible effects of proposed actions

ACHASSI097 Sequence information about people's lives, events, developments and phenomena using a variety of methods including timelines

Bob the Railway Dog and Mining in South Australia

Bob the railway dog was alive from c1878 – 1895, he travelled far and wide, but his home was Terowie, Peterborough and the towns along the northern railway lines. Mining was a crucial trade in Bob's home area and the railway was critical to the mining industry.

Mining in South Australia:

Mining was dangerous work, some of the dangers that threatened the miners and their families were flood, diseases and copper poisoning. It was hard and difficult work that was full of problems; transporting everything to the mine like food, water, tools and tents was challenging. They depended on bullock wagons to transport everything, but the wheels on the wagons broke regularly due to the extreme weight of the ore, there was very little water for the animals and the working hours were long.

Following the success of the narrow gauge railway lines in Queensland, several narrow gauge lines were started in South Australia. The narrow gauge railway lines made life easier for the miners and also made it possible to process the ore within South Australia, rather than being processed in England.

Word Finder Puzzle: Important centres for the mining trade in South Australia in the late 1800s

C E T W W W D V T X Y H A W K
W P P N W U P Y R G G D Q V F
J I B C E K R Z M U E S H L K
N P U P N I Y M O L G M A Y B
U N O T E I R R A C F F W R X
E R W L K B O I T C F F E P P
T M L N O B D J P G K H K U Y
E I W O R E T I Q I Y X I C I
H V O E B O Z H D G C L N V L
K A T S U G U A R O F P X P Y
E E I D C J V Q T D X Q C E Z
P A P T Y F Z D W Q F D Y I M
J G S Y M R L X Q L R C O H N
N K M U F F V V I L S V R T W
E H F B H G M Y N Y N R G K H

ADELAIDE
AUGUSTA
BROKEN
CARRIETON
HILL
PETERBOROUGH
PIRIE
PORT
QUORN
TEROWIE

Supplementary Pack: Mining and Minerals (relates to Bob the Railway Dog Onsite Education Packs)

What is a mineral?

To meet the definition of "mineral" used by most geologists, a substance must meet five requirements:

- **Naturally occurring:** means that people did not make it. Steel is not a mineral because it is an alloy produced by people. "
- **Chemical composition:** means that all occurrences of that mineral have a chemical composition that varies within a specific limited range. Each one is made of a particular mix of chemical elements
- **Inorganic:** They have never been alive and are not made up from plants or animals (organism). Wood and pearls are made by organisms and thus are not minerals.
- **Solids:** They are not liquids (like water), or gases at standard temperature and pressure (Like the air around you).
- **Ordered internal structure:** Minerals have an ordered atomic arrangement in a systematic and repeating pattern. The chemical elements that make up each mineral are arranged in a particular way. This is why minerals 'grow' as crystals.

Minerals, food and our bodies:

Food Sources of Mineral Nutrients: Here is a list of good food sources for a number of important minerals that are an essential part of good nutrition.

Calcium: Almonds, figs, beans, carrots, pecans, raisins, brown rice, apricots, garlic, dates, spinach, sesame seeds, brazil nuts, cashews, papaya, avocados, celery.

Chromium: Brewer's yeast, clams, cheese, corn oil, whole grains.

Copper: Soy beans, Brazil nuts, bone meal, raisins, legumes, seafood, and black strap molasses.

Iodine: Kelp, dulse, beets, celery, lettuce, Irish moss, grapes, mushrooms, oranges.

Iron *Kelp, raisins, figs, beets, soy beans, bananas, asparagus, carrots, cucumbers, sunflower seeds, parsley, grapes, watercress.

Magnesium: Honey, almonds, tuna, kelp, pineapple, pecans, green vegetables.

Manganese: Celery, bananas, beets, egg yolks, bran, walnuts, pineapples, asparagus, whole grains, leafy green vegetables.

Phosphorus: Mushrooms, cashews, oats, beans, squash, pecans, carrots, almonds.

Potassium: Spinach, apples, tomatoes, strawberries, bananas, lemons, figs, celery, mushrooms, oranges, papaya, pecans, raisins, pineapple, rice, cucumbers, Brussels sprouts.

Sodium: Turnips, raw milk, cheese, wheat germ, cucumbers, beets, string beans, seafood, lima beans, okra, pumpkins.

Sulphur: Bran, cheese, eggs, cauliflower, nuts, onions, broccoli, fish, wheat germ, cucumbers, turnips, corn.

Zinc: Mushrooms, liver, seafood, soy beans, sunflower seeds, brewer's yeast.

<http://www.naturodoc.com/library/nutrition/food.htm>

Write more than one mineral in the following list of food:

Mushrooms

Almonds

Sunflower seeds

Interesting Facts About Minerals:

Blood and iron:

Red blood cells have the important job of carrying oxygen around the body. They also contain a protein called haemoglobin. Haemoglobin contains the mineral **iron** which combines with oxygen to give haemoglobin and our blood, a red colour.

Crab blood is blue because it contains copper.

Minerals in Australia:

Australia produced 299 t of gold in 2000, making it the World's third largest producer after South Africa.



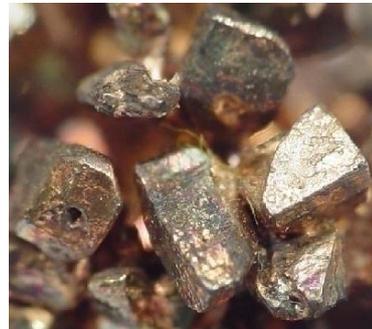
Copper was first discovered in South Australia near Montacute in the Mount Lofty Ranges in 1842.



The first mineral discovered and mined in the Flinders Ranges was the famous ochre from the Parachilna area. Aboriginal people also use it in their art



The electrical conductivity of silver is the greatest of all metals, greater even than copper but it is not widely used for this property because of the higher cost.



In Australia, iron ore ranks as the second largest mineral industry after coal



The mining of coal at Leigh Creek goes back as far as 1888 when coal bearing shale was discovered there by John Henry Reid.



Onsite Education Pack 3 I'll put images of rolling stock etc in S:\Education Officer 2016 - \Photographs and images for BTRD ed packs

Ages: Year 3&4

Curriculum: ACHASSI056 Examine information to identify different points of view and distinguish facts from opinions

ACHASSI077 Examine information to identify different points of view and distinguish facts from opinions

Bob the Railway Dog and Objects in the Museum Collection

This pack will guide you around the Museum and will introduce you to objects and rolling stock (railway vehicles) around the Museum which relate to Bob's life and story.

Bob the Railway Dog; Display Case at the Museum:

The case housing Bob's collar is located down Aisle 1 in the Fitch Pavilion. Find the case and answer these questions:

1. There is a couplet (a type of poem) written on Bob's collar. Fill in the blanks:

Stop me not but let me ____, for I am ____ the drivers ____

2. Can you see Bob in the black and white photograph? Is he sitting on a:
 - a. Tender (a railway vehicle located behind the locomotive that stores the fuel and water)
 - b. Locomotive (a railway vehicle that provides motive power i.e. movement powered by fuel)
 - c. Carriage (a railway vehicle designed to carry people or items e.g. passengers or baggage)
3. Look at the photographs of Bob in the display case. In your opinion which one of the following photos looks more like Bob the railway dog?



Left: Smithfield Right: Bearded Collie

Photo courtesy, Wikimedia, Unique Andreas, Portrait of our Bearded Collie.

Bob the Railway Dog; Locomotives and carriages at the Museum:

It was said that Bob's favourite type of locomotive to travel on was the Yankee (X class) engine and that he liked to ride in the cab of the locomotive and on top of the firebox. We do not have a Yankee X class engine at the Museum, but we do have other rolling stock Bob may have rode on. How do we know this? Well while Bob travelled far and wide, his home area was Terowie, Peterborough and the northern railway line. We have some engines and carriages that ran in this area during Bob's lifetime, Bob spent a great deal of time travelling on the railway so it is possible he rode on these.

Bob may have travelled on locomotives Y97 and Y12 and the carriages Car 3 and Car 144. He may also have rode of three of the sister carriages of Baroota. Can you find these locos and carriages on your Museum map?

1. Car 3 and Baroota:

Bob the railway dog may have travelled on Car 3 as it operated in his lifetime and ran on the northern line as a second class passenger carriage.

Bob may have travelled on one of the 3 sister carriages of Baroota that ran as 1st class overnight passenger carriages between Terowie and Broken Hill while Bob was alive. It is said that Bob would make himself welcome in any class of carriage.

Questions:

1. Baroota was a 1st class carriage and Car 3 was a second class carriage. What differences can you see?
 - Differences in decoration and design:
 - Differences in seating and comfort:
 - Differences in privacy:
2. Which carriage is the oldest and why is it such a special item in the Museum's collection?

Locomotive Y97

Locomotive Y97 was built by Beyer Peacock and was placed into service in February 1890. It ran on the northern lines in Bob's lifetime and was used as a shunter at Peterborough.

Questions:

It was said Bob's favourite places to ride on steam locomotives was on the firebox, the tender or next to the driver's feet. A tender is where the fuel (e.g. coal) and the water to run the locomotive is housed. The firebox is where the fuel is burned. The driver would stand by the controls in the cab.

Questions:

Can you see the tender and the firebox in Y97?

Can you see where the driver would have stood?

Which spot looks more comfortable to you?

3. Car 144:

Car 144 ran on the northern line during the final 2 years of Bob's life. It is possible he may have rode on it.

Questions:

Car 144 and Car 3 were both second class vehicles that Bob may have rode on. What differences can you see between Car 144 and Car 3:

- Differences in seating:
- Differences of decoration and lighting on the ceiling:
- Which is longer and can carry more passengers?

4. Van 1990:

At the time Bob was alive rabbits were causing extreme environmental and financial issues throughout rural Australia, and so the rabbiting industry was very important. In his youth Bob was sent north to become a rabbit hunting dog, but on the way was adopted by a member of the South Australian Railways.

Van 1990 was used to transport rabbit carcasses and skins during Bob's lifetime.

INSERT PICTURE OF RABBITING

NSW HERE WITH BLURB: All images will be

in: S:\Education Officer 2016 -

\Photographs and images for BTRD ed

packs



Onsite Education Pack 4

Ages: Year 5

Curriculum: ACMNA291 Use efficient mental and written strategies and apply appropriate digital technologies to solve problems

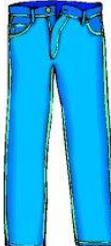
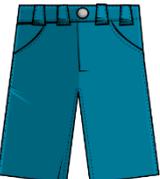
Travelling in the days of Bob the Railway Dog

Weight bills: "big children"

When Bob was alive the weight of a passenger's luggage was recorded on weight bills, so they could pay for the delivery. **Question: Which luggage did this apply to? All including carry on, excess only, only luggage that went on baggage cars? Malcolm might know the answer.**

Today you can still travel to Bob's hometown of Peterborough by train, though trips no longer run as frequently as Bob's time.

Imagine you are travelling to Peterborough for 3 days and you can only take 5kgs or under of travel items with you:

 20g	 30g	 500 g	 400g	
 300g	 2 kilo	 150g	 100g	 100g

Write down which items and how many you would take with you.

For example: two pairs of sunglasses $2 \times 20g = 20g$

Hints: $1,000g = 1kg$

Onsite Education Pack 5

Ages: Year 1

Curriculum: ACHASSI021 Sequence familiar objects and events

Bob the Railway Dog, People in Bob's Life

The following game is about some of the main characters in Bob's story. Put the correct number under each photo to match with the description:

- 1) **Bob the railway dog** was described as 'a homeless, dirty and shaggy dog with eyes that you will find it hard to turn away from. He likes his freedom and has no master. He follows his passion and never gives up. He is a friend to all drivers.'
- 2) **Mr. William Ferry** was a guard and porter when he first met Bob. Mr. Ferry saw Bob at Terowie where the train from Adelaide to Carrieton stopped, the train was carrying about 50 other stray dogs that were destined to become rabbit hunters.
- 3) **Mr. Evans** was the owner of Evan's Butcher Shop in Hindley Street and was Bob's friend. Bob went to Mr. Evans when he was hungry.
- 4) **Mr. George Hiscock** was the photographer and South Australian Railway employee who took the famous photos of Bob.
- 5) **Harry Caire** was reportedly the sales man who purchased the collar for Bob.

Insert pic of porter
from collection here



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Onsite Education Pack 6

Ages: Year 2

Curriculum: ACHASSI042 Reflect on learning to propose how to care for places and sites that are important or significant

Bob the Railway Dog and Mining and Minerals in South Australia

Bob the railway dog was alive from c1878 – 1895, he travelled far and wide, but his home was Terowie, Peterborough and the towns along the northern railway lines. Mining for minerals was a crucial trade in Bob's home area and the railway was critical to the mineral mining industry.

Find words related to minerals and mining sites:

Mining has been the backbone of the economy and provided South Australians with a high standard of living, stimulated secondary industries and rescued it several times from severe economic depression. Railways played a big role to transfer minerals find the names of cities in South Australia and minerals.

What is a mineral?

Minerals make up Earth's rocks, sands, and soils. They are found on Earth's surface as well as deep underground. **They are:**

- **Inorganic.** Not made by a living organism, e.g. pearls and wood are not minerals.
- **A solid.** There is one unusual exception. Native mercury is a mineral and is the only metal that is a liquid at normal temperatures.
- Have a **regular crystal structure.**
- **Made by nature.** Minerals are not made, directly or indirectly, from human activity. E.g. steel is not a mineral as it is a manmade alloy.
- Has a **predictable chemical formula.**

Young Children: Words Puzzle only minerals

O C Y H C V E U L T W P S Z K
M O R E V L I S P X X J D G P
N P F Y P W W W O I Q K V H A
Y P P G S K C C L A Q E B P P
I E S U C T G O L D A K R V X
U R Q U T C A A J X U G J R E
J Q L S M N P L H P Y N A H M
J H B I M O D E D U O V N L K
F V K F A R X K V A N B U I K
G B E X T I N C R H H Z D L H
P L I I S I Z I L F P T E A K
A M G K Z X J N E E O A P C J
W L N L D L K K N V A K B R I
K N C V R R D S O A J A K Y I
N C O Q G G N V R D M E D T F

COAL
COPPER
CRYSTAL
GOLD
IRON
NICKEL
OPAL