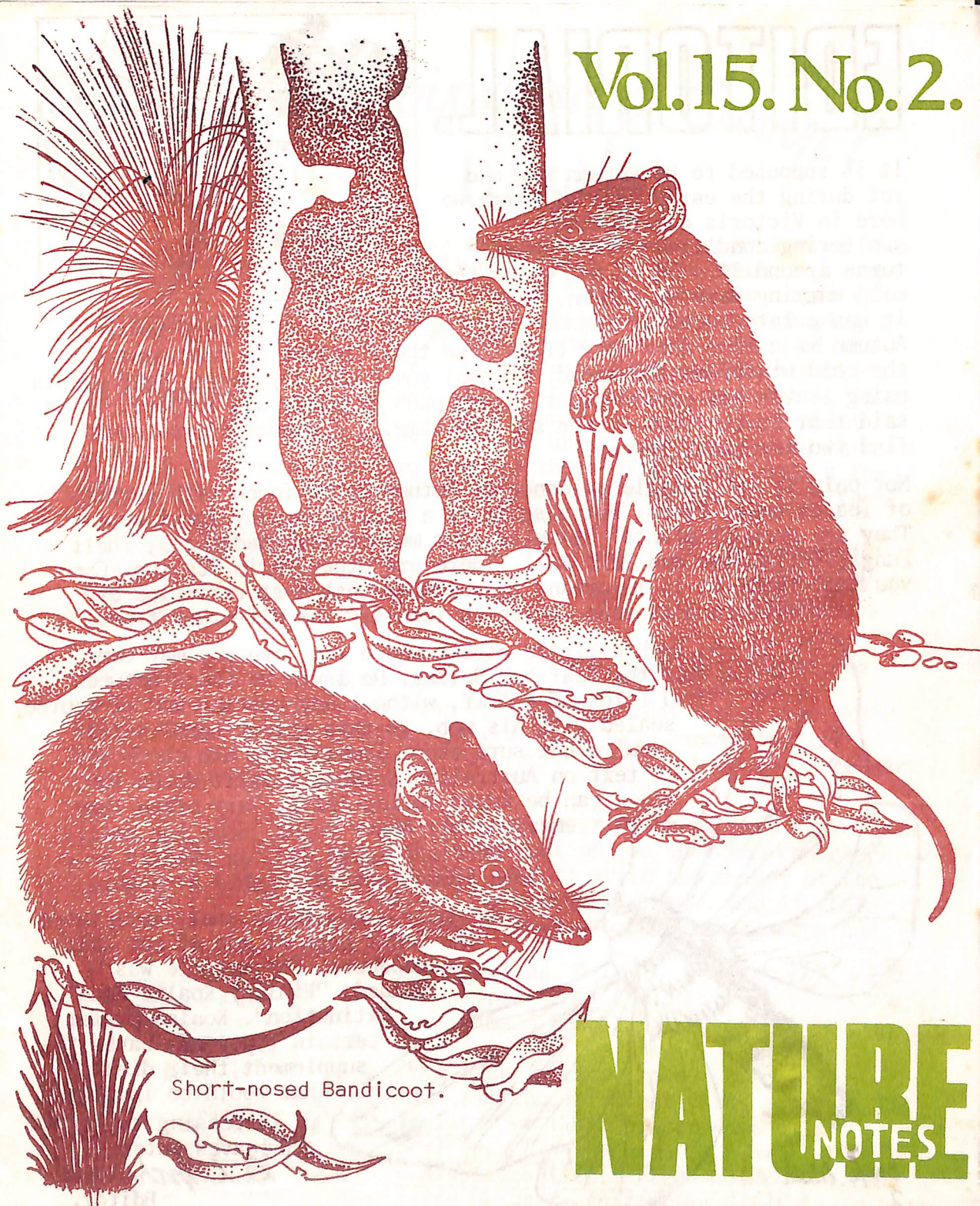


Vol.15. No.2.



Short-nosed Bandicoot.

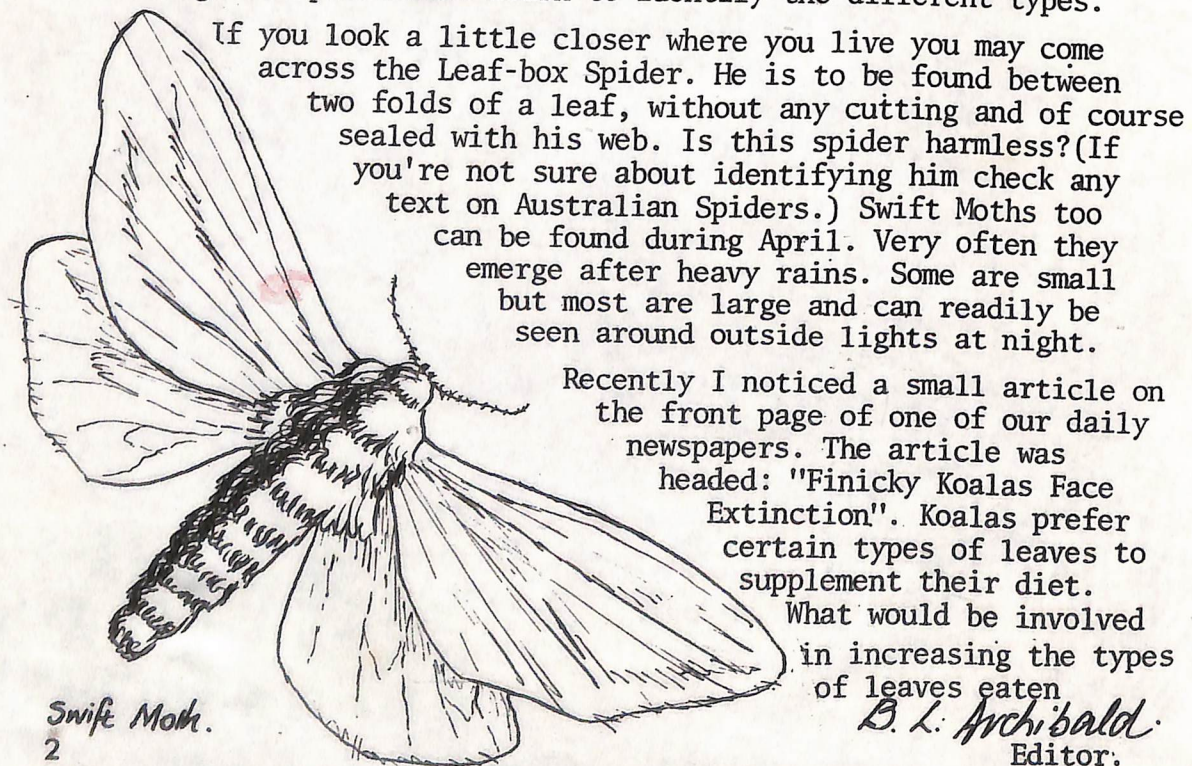
NATURE
NOTES

EDITORIAL.

It is supposed to be Autumn now and yet during the early days of March we here in Victoria experienced sweltering conditions with temperatures around 34 - 38 C, not quite the mild warming days of Autumn. Perhaps it was a late burst of summer! Despite the heat of the new season, Autumn is a time when many trees lose their leaves in readiness for the cold winter months ahead. Perhaps you could try making leaf prints using leaves and carbon paper, stamp pads or paint and rollers. It is said that no two snow flakes are the same... I wonder if you could find two identical leaves?



Not only is the visible evidence of Autumn to be found with carpets of leaves under trees, but also it is a time when many fungi appear. They are unusual plants. Examples are: mushrooms, toadstools, Shelf Fungi, Earth Star and Puff Ball. There are other varieties too. Can you name them? It is important to remember that most varieties of fungi are poisonous. Learn to identify the different types.



If you look a little closer where you live you may come across the Leaf-box Spider. He is to be found between two folds of a leaf, without any cutting and of course sealed with his web. Is this spider harmless?(If you're not sure about identifying him check any text on Australian Spiders.) Swift Moths too can be found during April. Very often they emerge after heavy rains. Some are small but most are large and can readily be seen around outside lights at night.

Recently I noticed a small article on the front page of one of our daily newspapers. The article was headed: "Finicky Koalas Face Extinction". Koalas prefer certain types of leaves to supplement their diet. What would be involved in increasing the types of leaves eaten

B. L. Archibald.
Editor.

Swift Moth.
2

So you're going on a Camp? Wow!



Even at this early stage of the year some of your teachers will have begun to plan tours and camps for 1978. Camping is always great fun. Over the years thousands of children have gone camping to all sorts of places and in every season of the year. Groups of children have camped in National Parks, near rivers, by the sea, near lakes, in forests, in snow country...in fact just about everywhere. In just about every camp area this is one thing in common: wherever you are there will be at least a few birds. (P.S. Birds that fly that is!) Do you know how to find them?



At camp, decide on a set path that you will walk each day at the same time. (Before breakfast is best, and again at sundown.) Casually walk the path wearing dull clothes that don't flap. KEEP QUIET. move in small groups, carry a small pad, pencil and if possible a pair of binoculars. Make sure that you have the necessary permission for your walk.

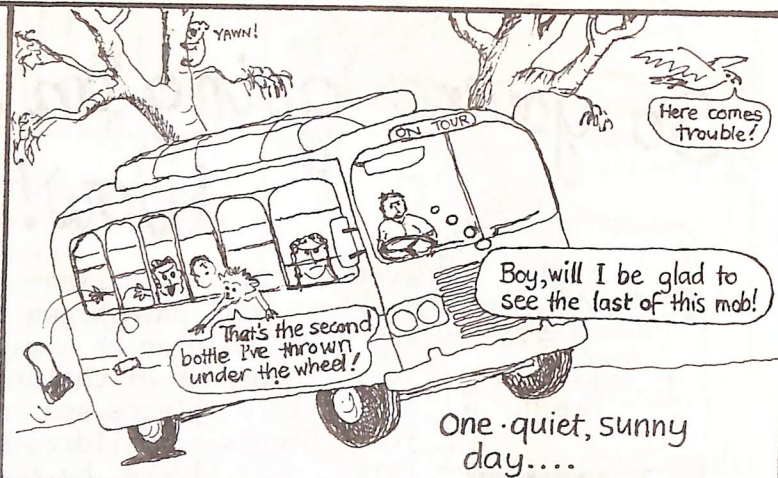
Keep a list of birds you see. Write a description of them. Give each bird a name (even if you have to make it up) so that you can check it later. Count the birds in this manner: write the number of the same kind of bird you see each time beside its name, and if there are 10 or more, circle that number. When you get back to camp add them up.



Eg. Starling	3	2	1	8	16	4	12	= 46.
Magpie	1	2	3	1	4	5		= 14.
Crimson Rosella	1	2	1					= 4.

Once back in camp, make a bird list. List all the different birds you saw. Try to find out their proper names. Some good bird books:
 Gould League (Vic.) Field Guides: Nos. 1-6.
 Field Guide to Australian Birds by

LOUDMOUTH PRIMARY SCHOOL VISITS Mountain Holiday Camp



... a bus-load of lucky children arrived at the Mountain Holiday Camp for a few days to investigate the bush.



They soon made themselves feel quite at home....



... much to the discomfort of the local inhabitants!



In fact, the animals were so upset that they held a big Conference around the Fallen Log:



They spent many hours trying to work out how to help the children want to understand wildlife - but eventually decided that children that thoughtless and rowdy didn't even deserve to see any. So they gave up....

*Old Ned could not say anything because he had a hoarse voice!

...and eventually a course of action was decided on for that night....



... which had the desired effect the following morning.



This 'n' That.

L. Delacca.

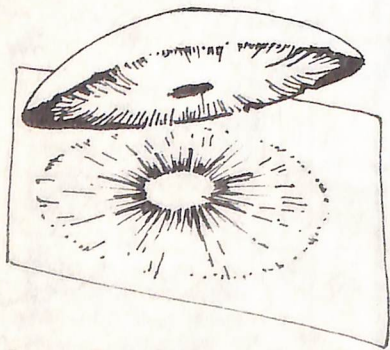
By the time you read this I hope we will have had the first real autumn rains. With these rains will return a rather special groups of plants most of them edible. By now you will have guessed that I am talking about fungi. Why is it special?

For a start they are plants but have no leaves, no roots and no seeds. Instead of seeds they have spores for reproduction....spores are like seeds but have no food store. When the spores are ripe they fall to the ground and grow into new plants.

What about producing your own fungus (plural: 'fungi')! Place a piece of fresh moist bread or half an orange on a plate, cover with a glass dish and leave in a warm dark place for a few days. What can you notice when you take it out? How did it happen? Study it closely. If you have a microscope see what that will show.

Hands up those whose mums make their own bread. Did you know she uses a fungus to make it rise. What is it called? Another fungus or mould is used in the production of a well-known drug - a real life saver.

No doubt the best known of all fungi are the toadstools and mushrooms and these are the ones we should see arriving after the rains while the ground is still warm. Why not start a collection on your own nature table at school! A word of warning though...while we can eat most mushrooms and toadstools there are some which are very poisonous. One has an eye-catching fiery red cap and is an introduced species. The Fly Agaric as it is called can readily be found around Pine trees.



Make a spore print from a toadstool or mushroom by placing the 'cap' flat down on a sheet of white paper and leave a few days. What do you notice when you remove the cap?

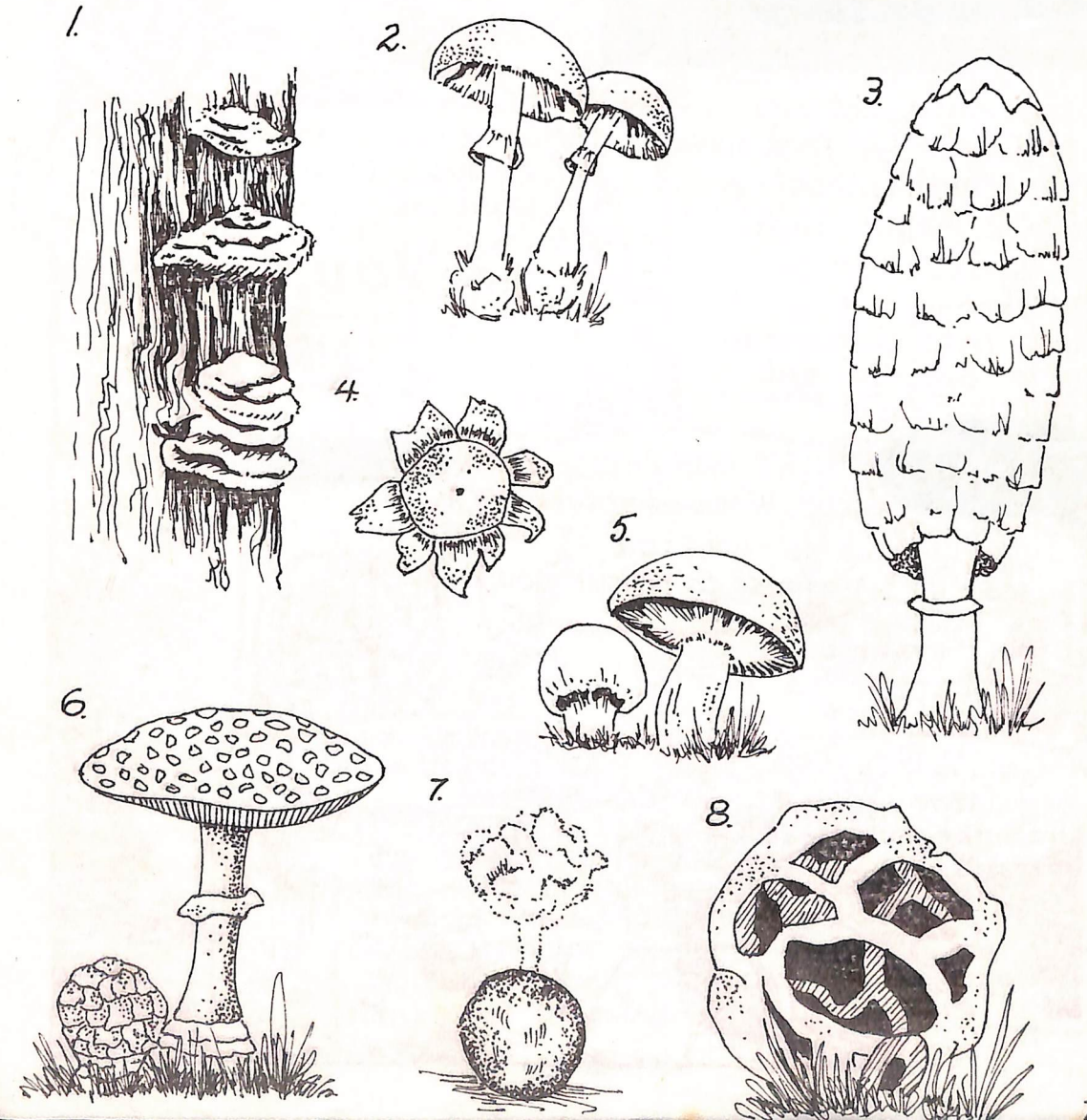
Not all fungi grows in the ground - you may find some brightly colored shelf fungi growing on trees or on fallen branches usually in damp moist spots. Why is this?

Some fungi are parasites and some saprophytes - similar but different. Find out which fungi belongs to each group. Here are some to look for apart from the common old mushroom - Shaggy Cap, Puffballs, Stone Fungus, Milk Cap, Earth Star, Blackfellows Bread and a really interesting one called Basket Fungi.

You may try cutting your mushroom/toadstool in half through the cap and down the stalk. What do you notice? Can you discover the main purpose of (a) the cap part and gills and (b) the stem? But again remember some are poisonous so play safe and keep them away from your mouth. I feel sure your editor would like to receive letters about your discoveries with fungi!

Quick Quiz.

CAN YOU CORRECTLY IDENTIFY THE FUNGI SHOWN ON THIS PAGE?
CHECK YOUR ANSWERS WITH YOUR
TEACHER OR A GOOD TEXT BOOK.



SUPER SNAIL

MIGHTY MOLLUSC
of
THE UNDERWORLD

One of Super Snail's most dangerous assignments begins when he is asked to investigate the strange disappearances of Worker Ants ...

WELCOME TO
ANTHILL
TION 12,074

The Ant Queen tells him that Ants sent out to forage for food have vanished without a trace. Super Snail suggests that a Worker ant is sent out into the danger-area and he will follow ...

YES, YOU!

Don't worry, little chap. When whatever-it-is gets you, I promise to rescue you.

tremble
tremble

Get moving, then, my brave lad. Out into the wilderness.

If you get back, I'll give you a nice medal.

Boo

Good idea, Mighty Mollusc. Now, I want one volunteer

YOU!

ME! Who me? Not me?

Super Snail slinks from rock to rock, following the hapless worker...

SUDDENLY

A
A
A
A
A

The Mighty Mollusc zooms to where the unfortunate Ant has disappeared...

He sees a dreadful sight

GOTCHA!

It is an Ant-Lion, a larva which hides in a pit it has made and when an ant falls in, grabs it and eats it. (See note on page 5...Ed)

RRRR

SUPER SNAIL
LEAPS DOWN TO THE
RESCUE!

LATER..

Here is the culprit, your majesty

Many thanks Super Snail. And here is your medal, my lad!

and Super Snail keeps the Ant Lion as an unusual pet!

He watches it become a little ball-like pupa, its case made of silk and grains of sand, then one day it emerges as an adult Ant-Lion, a handsome insect

So he opens the cage and lets it go.

'The Good Oil.' ~ D. Dobson.

Eucalyptus Oil - How do we get it? This was a question that was asked of me last week. As I explained, I wondered how many of you know how we obtain this oil.

All eucalypts have a combination of oils that give us the characteristic gum odour. The eucalypts formed for oil in Victoria are Mallees. Mallees are short scrubby trees with a number of stems arising from the one root stock. Cutting them down doesn't kill them but encourages dense new growth. This means they may be cut down every couple of years. The leaves and stems are harvested and taken to the still where the oil is extracted.

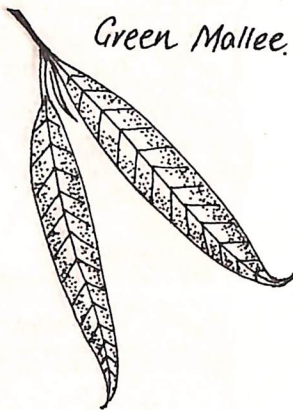
The leaves are put in a large brick lined pit in the ground. The pit is covered with a steel lid and the edges are sealed with clay. Steam generated by a large boiler is then piped into the pit to heat the leaves. At about 80°C the oil from the leaves evaporates and passes with the steam through an outlet pipe. The oil laden steam is cooled and condenses as the outlet pipe runs through a large dam. The water mixed with oil that runs from the end of the pipe is separated by allowing it to settle... the oil floating where it can be skimmed off.

And so we have Eucalyptus Oil... to be rubbed on your chest when you have a cold or used in other ways around your home. The eucalyptus farm I know of is near Bendigo on the edge of the Whipstick Forest out past the Epsom Pottery. Next time you are in Bendigo ask Mum and Dad to take you out to the farm.

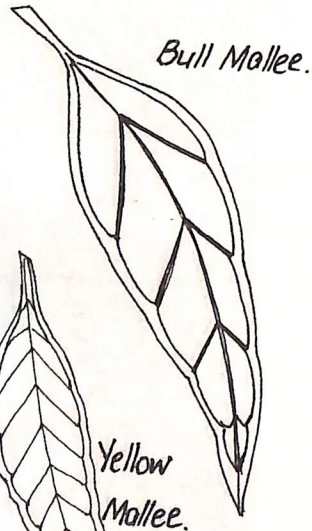
P.S. Did you know that Eucalyptus Oil was one of the first natural raw products to be exported to England? In 1790 a doctor had published in London an article on its use in removing "all cholicky complaints".

(THE ILLUSTRATIONS FEATURED ON THIS PAGE ARE OF THE LEAVES PREFERRED IN THE MAKING OF THE OIL.)

NATURE NOTES... April, 1978.



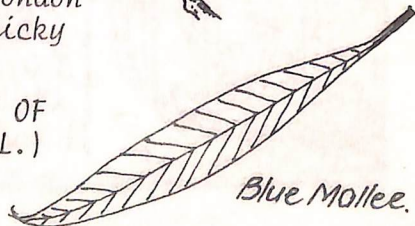
Green Mallee.



Bull Mallee.



Yellow Mallee.



Blue Mallee.

Notes On The Whipstick.

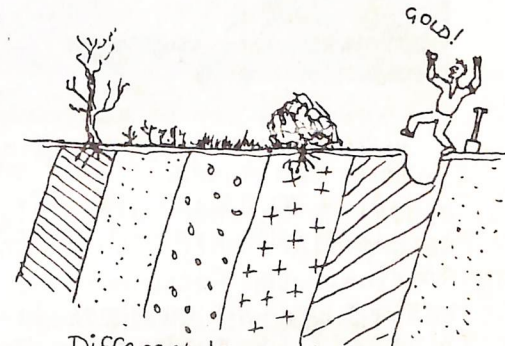
* THE WHIPSTICK.
BENDIGO • Hurly



and many large nuggets were found.

Geologically, the Whipstick is an area of ancient broken down sand-stones, unique because they are laid out flat. So in passing through you cross successive rock strata, each of which has over the ages evolved its own flora. No wonder then that there are over 340 known species of wildflowers within its boundary.

Apart from the oil industry in the area, the production of honey also is a feature of this area of Victoria. The flowering mallees are sought after by apiarists who transfer their bees to the parts of the Whipstick corresponding to the flowering periods of the various species. The Black Mallee and the Ironbark are their favourites. From what other plants do bees collect nectar?



Different layers (strata) of sandstone.

Among the myriads of wild flowers, from August on, the ridges come ablaze with dazzling gold of the hakea wattle. The Whipstick even boasts a Mystery Wattle - an acacia that has baffled botanists for years, because never has a seed pod been found, hence its method of reproduction remains a mystery. Another beautiful spring flower is the Boronia... not the scented brown we grow in our gardens but the delicate pink.

Animals abound in the area. These include the long-tailed black wallaby, kangaroos, echidnas, possums and bandicoots. Watch out when you walk through that you do not step on a Blue Tongue Lizard or the unwary Stumpy Tail. In fact local farmers sometimes refer to the Whipstick unkindly as 'lizard country' which is just as well. If it had contained rich soil it would have been lost long ago.

The 'Happy' Wanderer. ~C.Bull.



Female 'wanderer' emerging from its cocoon.

The wanderer or monarch butterfly migrated here just like our fore-fathers. Though no records have been kept, the most accurate first sighting was at Rockingham Bay, Queensland in 1870. (Find this spot on a map.)

WHERE DID IT COME FROM? The Monarch Butterfly is a native of North America. It is distributed across this continent but every year it makes an annual migration from all parts to one region in Northern Mexico. Millions congregate to spend a quiet winter.

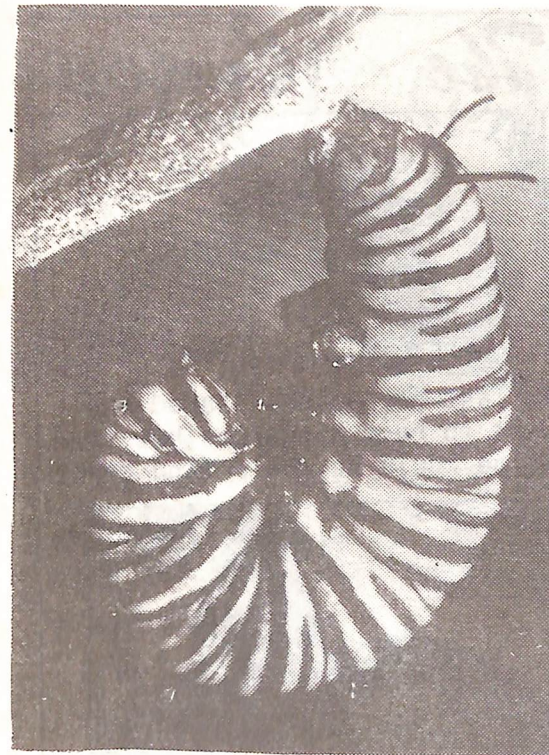
How it came to migrate to Australia is a strange tale. Scientists believe that for hundreds of years, the butterflies had "accidentally" migrated across the Pacific to land on remote islands. However, these butterflies soon died. Why? Although the butterflies had mated and laid

eggs, the hatched caterpillars had also died. The reason! The caterpillars only live on one type of plant, a native plant of North America...the Cottonweed, or what we call the 'milkweed'. Cottonweed was not present on these islands or in Australia until _____. Can you find out? The tail of the Wanderer Butterfly migration pattern has been directly related to European colonization of the Pacific region.

As the 'whites' migrated they brought many plants and animals with them. As they settled, they planted their gardens in much the same way as their original home countries. Among the plants was Cottonweed which is a rather attractive house plant. It was not until the Cottonweed was introduced that the butterflies were able to survive and flourish, then allow the migration chain to continue and so eventually reach Australia from their homeland 11,300 km. away.

Dry Cottonweed seed pods were also used to fill mattresses and this also aided the dispersal of this plant across the Pacific and eventually around the world.

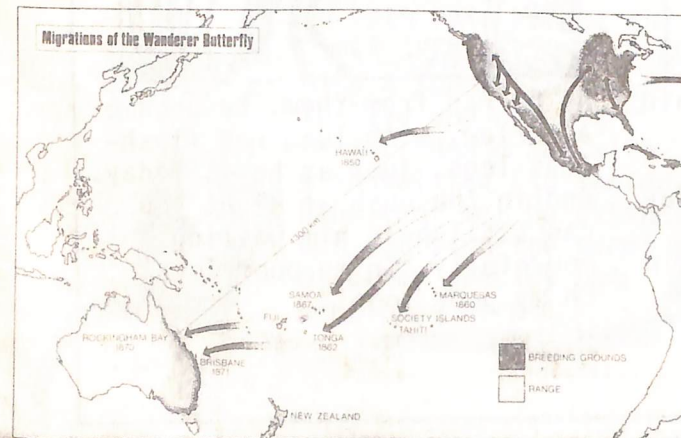
NATURE NOTES... April, 1978.



The large 'wanderer' caterpillar. The pupal case of the wanderer.

From the information, could you estimate the time of the first sighting of a Wanderer Butterfly in New Zealand? (SEE THE PUZZLE ON P.16.) Why do you think the Wanderer Butterfly is called by this name and not its true name...the Monarch Butterfly?

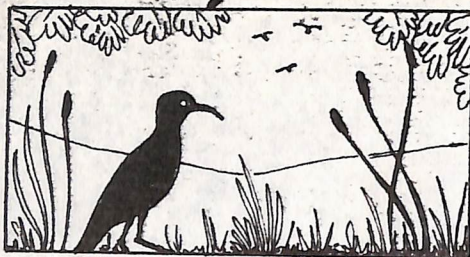
Have you ever stopped to consider how many common plants and animals are not true Australians? Let's name a few: Sparrow, Blackbird, Starling, Indian Myna, Canary are just some of the birds. The rabbit and the fox are just two examples of animals. Can you name some more



introduced animals? Prickly Pear, Blackberry, Boneseed, Scotch Thistle, Pine Trees and milkweed are some of the plants. Cactoblastis is one of many introduced insects.

Many of these introduced species were brought here by Europeans wanting Australia to be like their homeland. Some have been accidental. Where does the 'wanderer' fit in?

The Legend Of The Curlew



There once lived a youth who was too lazy to hunt for food and people said he was useless.



And because he did not like to return without any food he cut some flesh from his own leg.



Day after day he hunted in vain for food, and every night he secretly cut flesh from his legs for the women. But one day they found what he was doing and chased him from the camp in horror.



At last he became ashamed and went to hunt kangaroos, but try as he would he could find none.



After wrapping his leg in skins he returned to camp and gave the flesh to the women to eat.



As he ran from them, he became a curlew, with long red fleshless legs, just as he is today. And in the bush at night you can still hear him wailing mournfully, "Oh my poor legs! Oh my poor legs!"

Bandicoots. —



A bandicoot is a mammal which means that it has a furry coat, its young are fed on milk and it is warm-blooded and breathes air. It is also a marsupial because the female has a skin pouch underneath its body to carry and shelter the young.

SHORT-NOSED BANDICOOTS, such as the one on our

cover this month are the most common species found in Victoria. As you can see it has a short pointed nose and small rounded ears. The Short-nosed Bandicoot is a ground dweller which will make a nest under grass tussocks or piles of debris. It feeds at night on insect larvae which they dig from the ground with their long snouts and



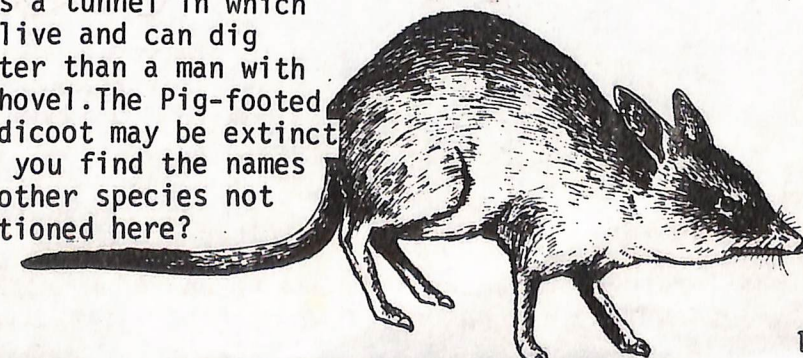
powerful foreclaws. This little fellow averages 40 cm. in length and can be found in open forest or woodland areas scattered about the Australian mainland, on off-shore islands and in Tasmania.

LONG-NOSED BANDICOOT: This species is the second largest bandicoot on the mainland. It grows to about 50cm. in length. According to

Keith Davey in his book, Australian Marsupials this fellow is "very numerous about Sydney" and is "accused of causing damage to suburban gardens and lawns." Why? As with the Short-nosed Bandicoot, this species is also a 'loner', ground-dwelling and nocturnal. He can be found down the coastal strip and eastern highlands of Australia..

in both rain forest and dry, forest areas.

OTHER SPECIES: The Rabbit-eared Bandicoot or Bilby digs a tunnel in which to live and can dig faster than a man with a shovel. The Pig-footed Bandicoot may be extinct. Can you find the names of other species not mentioned here?



PUZZLE PAGE



THE ANSWER TO THIS TELE-WORDS PUZZLE IS THE ANSWER TO THE QUESTION MR. BULL ASKED ON PAGE 13. HAVE FUN!

INTRODUCED SPECIES...

Plants: Scotch Thistle,
Boneseed, South African
Broom, Blackberry, Prickly
Pear, Cottonweed, Wheat,
Orange, Apple, Sugar Cane,
Pine.

Animals: Pig, Goat, Sheep,
Cactoblastis, Cattle, Deer,
Housemouse, Cane Toad, Cat,
Dog, Horse, Fox, Carp.

Birds: Blackbird, Canary,
Robin Red Breast, Indian
Myna, Pigeon, Starling,
Sparrow.

P.S. Your answer should
contain FIVE words.



riddles

What happened to the hen that
swallowed a yo-yo?

It laid the same egg three times;

What side of an alligator is
greenest?

The outside!

Why are rats and mice unhappy in bad weather?

What's green and hairy and goes up and down?
A gooseberry, in a lift!; Because it might rain cats and dogs!

NATURE NOTES..P.O.BOX 28 RINGWOOD EAST. 3135 . PHONE: 879 1263.