7th July Memory Verse:

If God be for us, who can be against us? He that spared not his own Son, but delivered him up for us all, how shall he not with him also freely give us all things? Romans 8:31b-32

An explorer's discovery¹

You will not see the road sign on the right in Britain. In fact, the first record of a sighting of such an animal by a British person was made on 7th July 1770. Here is how it happened:



On July 7th, 1770, Captain Cook, the explorer, organised a search in Australia for a curious animal, first seen by some of his men a few days before. It was described by a sailor as: "an animal something less than a greyhound, it was of mouse colour, very slender made, and swift of foot." When Cook saw the animal himself in the distance on the following day he described it as having, "a long tail which it carried like a greyhound, in short I should have taken it for a wild dog, but for its walking or running in which it jumped like a hare or a deer."

So the search was organised and and Joseph Banks, one of Cook's companions and a naturalist on the expedition, wrote: "We walked many miles over the flats and saw four of the animals, two of which my greyhound fairly chased: but they beat him owing to the length and thickness of the grass which prevented him from running while they at every bound leaped over the tops of it. We observed much to our surprise that instead of going upon all fours this animal went upon two legs, making vast bounds."

A few days later the party shot one of these mysterious creatures and Captain Cook was able to write a full description.

On 25th June we learned about Captain Cook's last voyage when he sailed right round the world looking for the North West Passage. The discovery of the kangaroo dates from his first voyage about which we read in the lesson for 11th June. He and his crew had left Plymouth in August 1768 in the *Endeavour* and sailed across the Atlantic and round the tip of South America past Tierra del Fuego. They were heading for Tahiti because the expedition had two special objectives: to observe an astronomical event, the transit of Venus, on 3-4th June 1769 and then to investigate *Terra Australis Incognita*, the unknown Great Southern Continent.

After observing the transit at Tahiti the Endeavour sailed through the Society Islands and on to

New Zealand, charting the entire coastline accurately for the first time. Leaving New Zealand, they sailed to the East Coast of Australia, then known as New Holland, and again began making charts of the coast. After landing in Botany Bay they carried on but, as we saw in June,² the *Endeavour* got stuck on the Great Barrier Reef and needed repair. It was while the ship was being repaired that the incident with the kangaroo happened.

Something to draw

If you want to make your own picture of a kangaroo you can copy the one on the right at any size you like, using the squares to help you.

2 See lesson for 11th June.

¹ Adapted from Owen, Evan, *What Happened Today* Volume 2, available on the *Mothers' Companion* Flashdrive. <u>https://motherscompanion.weebly.com</u>.

A game to play

In the passage with the green background above, the word "kangaroo" does not occur. Yet even without the road sign picture you would have known exactly which animal was being described. How well can you describe an animal? Think of an animal and describe it to your friend. Can they guess what animal you have in mind? Then swap over and be the guesser. If there are three players available, one can think of the animal and whisper it to the describer. The third player is then the guesser. Another way to play the game would be to write down your description for your friend who would than have to draw the animal.

<mark>Map Work</mark>

This requires a bit of outdoor space but it is fun to do. You need to draw a HUGE map of Australia with chalk on a car park, or similar area. The map does not have to be completely accurate; Australia is the easiest continent to draw and the outline is very distinctive. I've played this game indoors with a Home Ed group and we used about a quarter of the floor of a village hall. You have a caller who gives instructions. To begin with the caller can just say "on the land" or "in the sea" and the players have to get on the right side of the coast line. Then you can mark on some geographical features, Tasmania, The Great Australian Bight, The Great Barrier Reef, Ayers Rock/Uluru and perhaps a couple of cities. Mark them on the map and mix them in with with the "on the land" and "in the sea" calls. You can also add the command, "circumnavigate" meaning run all round the outside of the map.

Whatever you do, make sure you wash off your map when you've finished.

Something to think about

Kangaroos are marsupial mammals. That means they carry their young in a pouch. Most marsupials are found only in Australia. Have you ever wondered how the kangaroos (and other types of animals that now live only in Australia) got on the ark? And not only that, what happened afterwards when they got off again? Did they have to hop all the way to Australia?

In the Bible we read that the animals came to Noah; he did not have to go and find them. (Gen. 6:20). But how did Kangaroos come all that way? We have to remember that before the flood, the map of world was not anything like it is now. Nor do we know where different animals lived on the globe before the flood. It may well be that there was only one huge continent and that animals were not spaced out as they are now with one kind in this place and one kind in another. It is quite possible that there were kangaroos, along with the other animals, near where Noah was building the ark.

And after the flood? Well the kangaroos did not have to get all the way from Ararat to Australia in one go. The population of kangaroos had centuries to migrate slowly over the globe. Recently an Indian archaeologist has found some cave painting that he thinks look like Kangaroos.³ Kangaroos do not live in India now but perhaps they did when the paintings were made; travelling from Ararat to Australia via India would certainly be a good route. Today observers sometimes encounter large floating mats of vegetation in the sea with lizards and snakes living on them. Some animals could have crossed to Australia in that way. The lower sea levels during the ice age that occurred after the flood also caused land bridges where now there are none. This would be another way for kangaroos to travel.

Astronomy

The most recent transit of Venus was in June 2012. The next will be in 2117 - if the Lord Jesus has not returned before then!⁴

³ https://creation.com/kangaroos-in-india

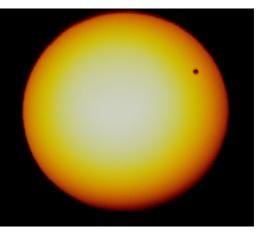
⁴ You can find out what a transit is here: <u>https://answersingenesis.org/blogs/danny-faulkner/2016/03/21/view-</u> mercury-transit-creation-museum/ The photo shows the transit of Venus (using filters on the camera) Venus shows

Why was the transit so important that Captain Cook set off to Tahiti to observe it?

Transits of Venus are very rare and they occur in a pattern. The transit pattern is a 'pair of pairs' that repeats every 243 years. Two transits take place in December eight years apart. Then, after 121.5 years, two June transits occur also eight years apart. Then after 105.5 years the whole pattern repeats.

It was Isaac Newton's⁵ friend, astronomer Edmund Halley, who realised that observations of

Transits of Venus could be used to measure the distance between the Earth and the Sun by triangulation. He worked out that if a transit was timed from widely different latitudes it would show small differences in Venus's track across the Sun. Halley died before he could test his theory, twenty years before the first of the pair of transits in 1761 and 1769. It was the 1769 transit that Captain Cook went to Tahiti to observe. At the same time measurements of the transit were being made back in England. With the aid of both sets of measurements, triangulation could be used to calculate the distance of the sun from the earth. Sadly, the results were not very accurate because of the many technical difficulties which beset the observations.



Spot the flower

These Australian flowers are Banksias. Can you guess how they got their name? Re read the paragraph in green!



up as a small dark dot moving over the surface of the sun.

⁵ See 5th July's lesson.