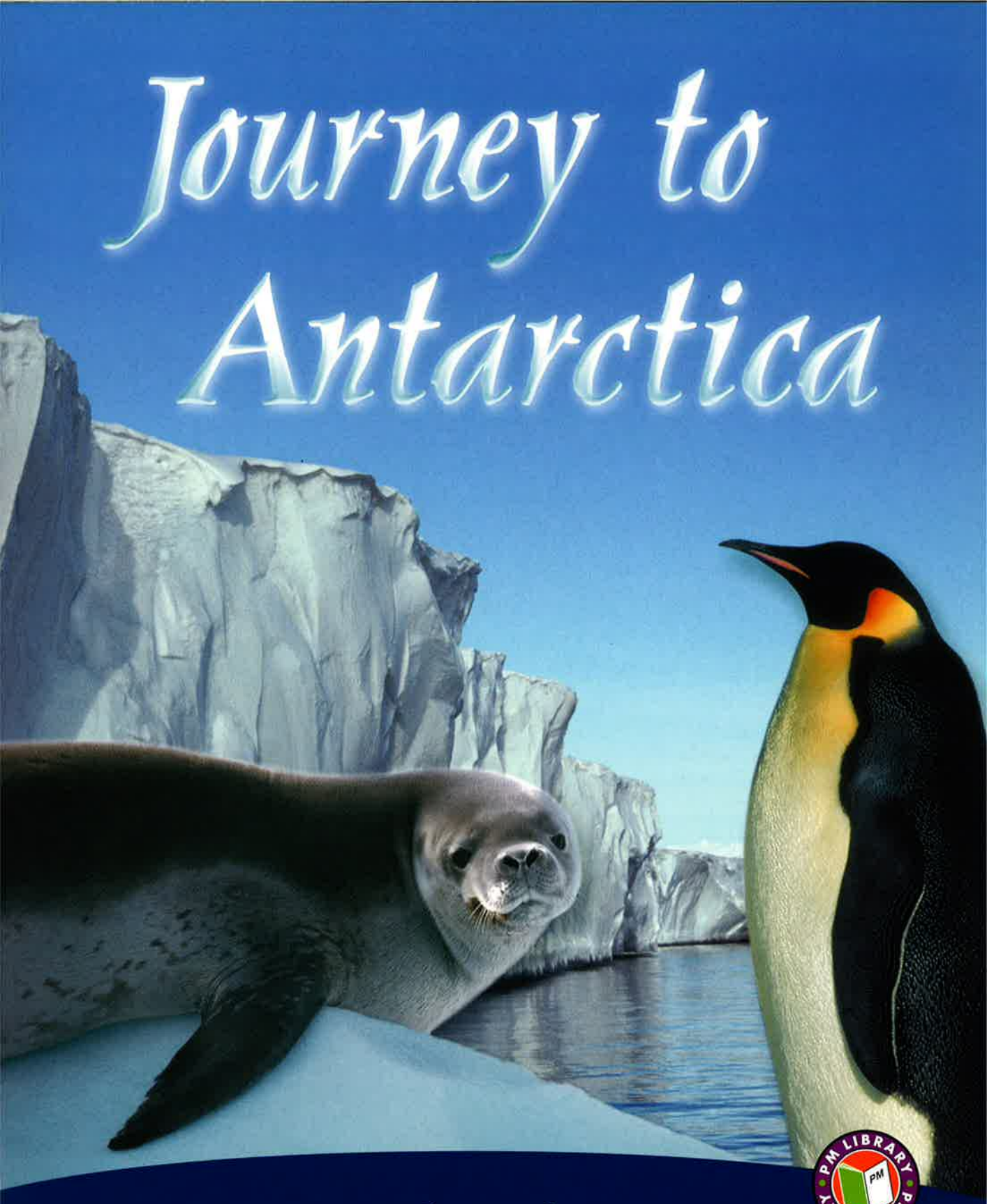
Journey to Antarctica



Julie Haydon

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CHAPTER 1

Off to Antarctica!

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Subject: I'm off to Antarctica!

Date: 2 October 10.25

Send

Dear Luke

I am so excited I can barely type. Your big sister is going to Antarctica! It's the coldest, windiest, highest *continent* on earth. It's also the driest. In fact, as so little rain and snow falls in Antarctica, it is officially a desert!

I'm going to be living on a research station during the Antarctic summer and working as a botanist on this barren continent.

And barren is definitely the word! This ice-covered landmass may be the fifth largest continent on earth, but it has no trees or *arable* land, no land mammals, no reptiles, no amphibians and no permanent human population.

Despite Antarctica being the most inhospitable place on earth, scientists from all over the world go there to work – and best of all, they share their knowledge with each other.

I leave in two months!

From Bridget



Although penguins are the best known of the Antarctic birds, other bird species, like this giant petrel, make the ice-covered continent and its waters home.

Subject: Preparations

Date: 29 November 09.16

Send

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Dear Luke

Thanks for the bon voyage e-card! I leave in four days, so I've been incredibly busy preparing for the trip. Here are some of the things I've had to do:

1) Learn basic survival skills and how to operate special tools, equipment and vehicles. (The training will continue in Antarctica.)

2) Have a medical examination. (If I was a doctor going to Antarctica, I'd have to have my appendix removed – can you guess why?)

3) Study the land and history of Antarctica.

4) Plan the work I will be doing in Antarctica.

5) Get kitted out in special polar clothing that will keep me warm and dry.

From Bridget



Typical expeditioner clothing includes thermal underwear, woollen shirts, windproof overalls and parkas, caps, boots, gloves and goggles. Layers of clothing *insulate* the body by keeping body heat in.

P.S. Did you work it out?

If I was a doctor going to Antarctica, I'd have to have my appendix removed beforehand because I couldn't operate on myself if my appendix became infected – and there is only one doctor on the station!

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CHAPTER 2

Geography and Natural History

Subject: Map of Antarctica

Date: 30 November 15.14

Send

Dear Luke

Here is the map of Antarctica you asked for.

From Bridget



How Big Is Antarctica?

The continent of Antarctica covers an area of more than 13 million square kilometres. Imagine a continent nearly twice the size of Australia, or one and a half times the size of the United States. In winter, Antarctica's ice spreads northwards over the Southern Ocean covering an additional 20 million square kilometres.

The Southern Ocean

The southern parts of the Atlantic, Indian and Pacific Oceans form the Southern Ocean, which surrounds Antarctica. It is the world's wildest and most dangerous ocean to cross. In summer, when the sea ice melts, the Southern Ocean is a rich source of food for Antarctica's wildlife.

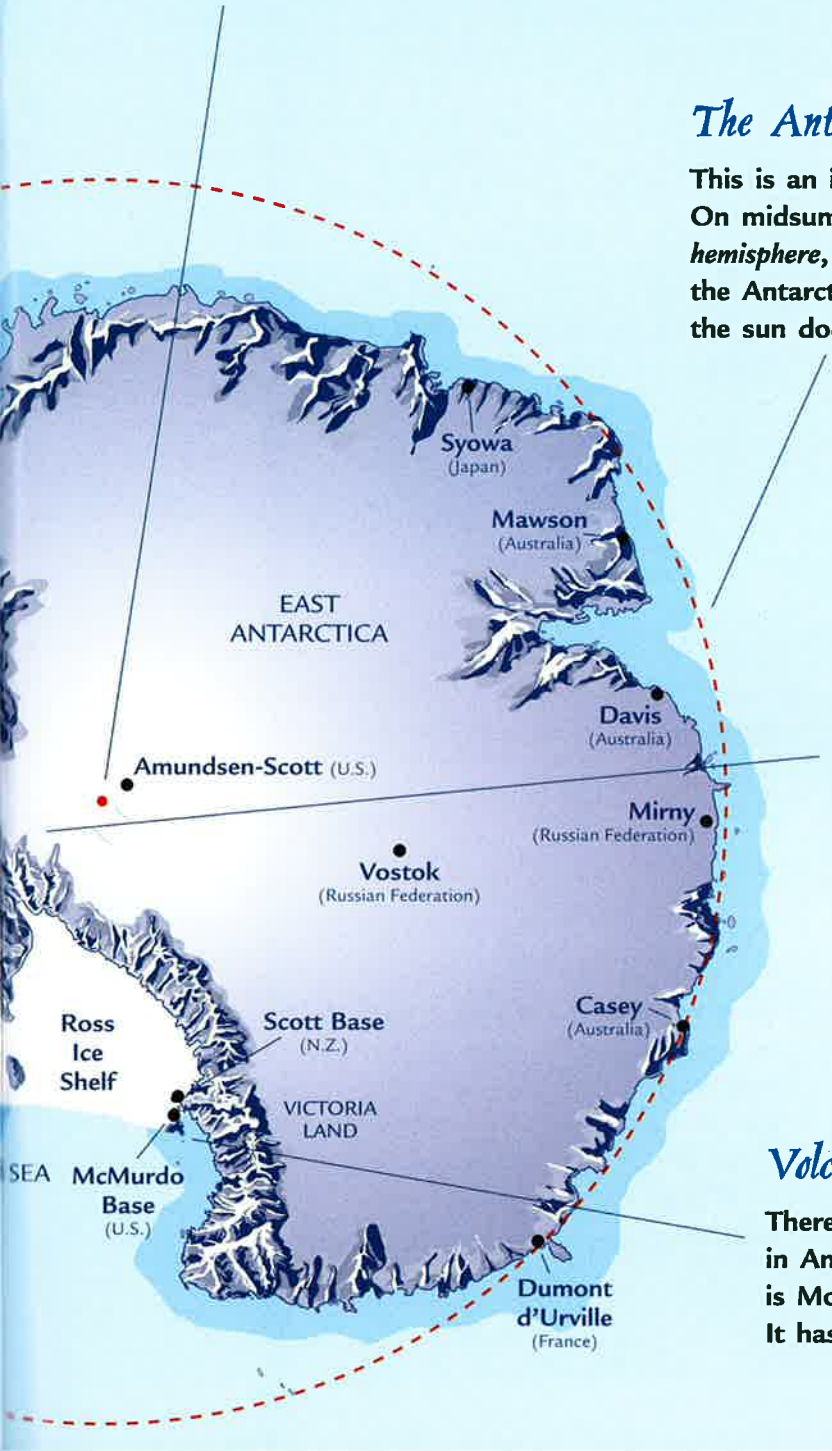
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The Geographic South Pole

The geographic South Pole marks the earth's southernmost point. It is an imaginary point situated at 90° south.

The Antarctic Circle

This is an imaginary circle at 66° 32' south. On midsummer's day in the southern ***hemisphere***, the sun does not set within the Antarctic Circle. On midwinter's day, the sun does not rise.



Transantarctic Mountains

This mountain range divides the continent into East and West Antarctica. Most of the range is buried beneath the ice, except the peaks, which are called ***nunataks***.

Volcanoes

There are two active volcanoes in Antarctica. The best known is Mount Erebus on Ross Island. It has a lava lake.

Subject: Amazing Antarctic facts and figures

Date: 2 December 11.28

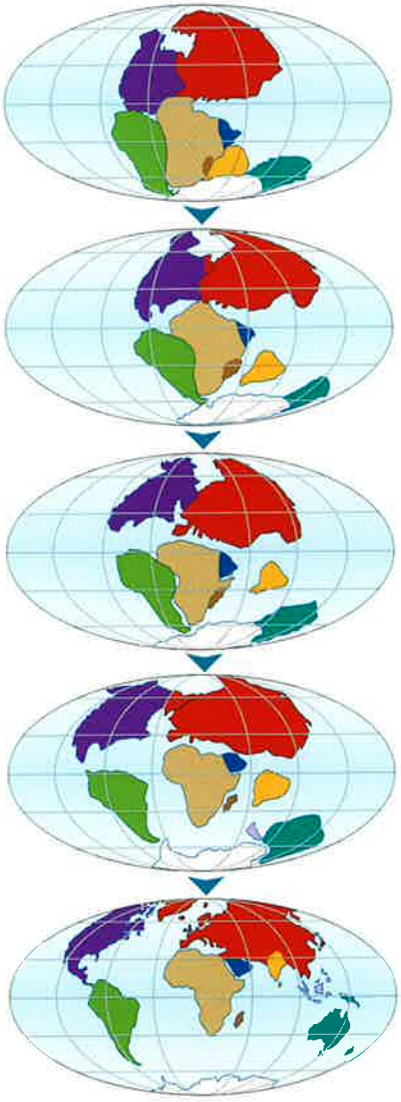
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Dear Luke

Thanks for your questions. I've got a few moments, so I thought I'd try and answer them. We're off tomorrow!

How Did Antarctica Form?



Antarctica was once part of a huge landmass known as Gondwana. Plants and animals thrived in its mild climate.

About 60 million years ago, Gondwana broke up and Australia, India, New Zealand, Africa, South America and Antarctica drifted towards their present positions.

Several million years ago, the earth began to cool. Antarctica was now a cold and isolated continent. Strong winds blowing over the Southern Ocean brought moisture, which fell as snow over Antarctica. Unable to melt, the snow stayed frozen and Antarctica's icecap formed.