

Munga-Thirri / Simpson Desert Guidebook

**We want Australians to appreciate the
global significance of this place and the
plants and wildlife it supports.**

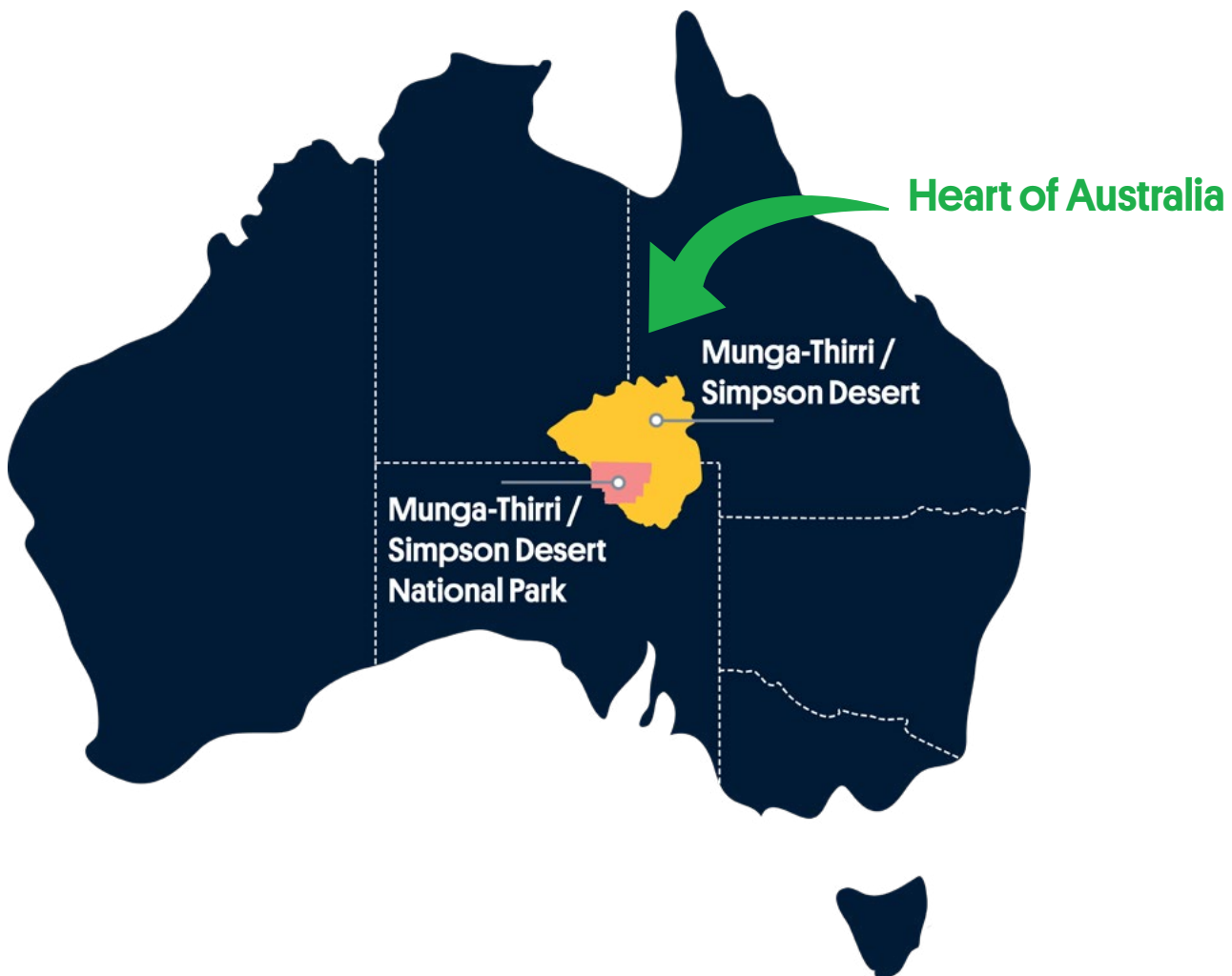
The Munga-Thirri / Simpson Desert

Spanning three states and an area almost three times the size of Tasmania, this is one of the most pristine desert ecosystems in the world, with a host of endemic plants and animals.

The Munga-Thirri / Simpson Desert sits within the Lake Eyre Basin, alongside Queensland Channel Country and Kati Thanda / Lake Eyre, which is on the Important Wetlands in Australia list and an Important Bird Area. Nowhere else in Australia can you see such a range of colours like those on display in the desert's extensive dune fields, from brilliant white to dark red, tones of pinks to oranges.

When the rain does fall the landscape erupts in desert wildflowers. It's one of the last great desert wilderness areas left on the planet, with temperatures in summer approaching 50°C and large sandstorms common.

For over a decade, the Wilderness Society has been working to protect this globally important ecosystem, getting two fossil fuel companies to withdraw their plans to start damaging exploration work in the fragile desert environment. **Finally, on 25 November, 2021, Australia's largest ever national park in the Munga-Thirri / Simpson Desert was proclaimed by the South Australian government.** Covering 3.6 million hectares, it is almost four times the size of the famous Yellowstone National Park in the US. This is a grand initiative, on a scale we have been advocating from the start. It is a significant step towards a huge conservation corridor in the heart of Australia, allowing endangered animals and plants to move and adapt to a rapidly changing climate.



Stories woven into landscapes

The Munga-Thirri / Simpson Desert is as rich in First Nations history, spanning many thousands of years, as it is in the rainbow colours of its sand dune sunsets. The South Australian section includes the traditional lands of the Wangkangurru/Yarluyandi people. Other groups include Aranda and Arrente, all of whom maintain a strong connection to Country.

Their stories are interconnected with the landscape, such as stories of mikiri (or freshwater soaks) in the claypans, swamps and small salt lakes that enable travel through the country using these for secondary sources of food and water. Rock carvings and places of cultural significance occur throughout the desert region.

There are limited roads, no buildings on the landscape and no industrial disturbance, making the Munga-Thirri / Simpson Desert a rare intact ecosystem that has been inhabited by First Nations people for thousands of years. As a desert wilderness of international significance, where nature hasn't been disturbed by industrialisation, we need to consider how it will be protected for the future.



Poached egg daisy (*Polycalymma stuartii* syn.) |
Image: Bill Doyle

A home for unique species

Despite most parts of the desert receiving 5 inches (125mm) or less rainfall annually, the Munga-Thirri / Simpson Desert is home to over 900 species of flora and fauna, including the water-holding frog and a number of reptiles that inhabit the desert grasses.

Desert mammals that only exist here include the kowari (a brush tailed marsupial rat), while birds only found in this desert environment include the grey grasswren and Eyrean grasswren. They live alongside iconic thorny devils, budgerigars, dingoes, and wedge-tailed eagles, as well as a wealth of other flora and fauna who have learnt to adapt and thrive in these conditions. The wedge-tailed eagles here are known to nest close to the ground, in large piles of sticks, which is rarely seen in other areas they inhabit.



Budgerigars taking a break | Image: Bill Doyle

Bird life

For the twitchers there are galahs and colourful flocks of budgerigars to spot, but for the truly dedicated bird-watchers there is a (less colourful) bird found only in the arid heart of Australia that need to be checked off. The Eyrean grasswren is fairly nondescript, brown in colour with a long tail like the fairy wren. It can be seen darting between long grasses on dunes...if you're lucky.

And then high in the sky, circling on the desert thermals you will see raptors like the wedge-tailed eagle and even pelicans after the rains, along with wetland birds from all over Australia once wetlands start to form.

Wildflower season

If you head to the desert between April and September, and time your visit a few weeks after the big rain that drenches the landscape, the red sands spring into life with a carpet of wildflowers. You'll find billy buttons, poached egg daisies and cunningham bird flowers; the wildflower blooms are one of Australia's incredible natural transformations.

Try and spot these animals:

Thorny devil

Widespread throughout arid Australia, the thorny devil (*Moloch horridus*) has to be one of Australia's most iconic reptiles. Their colouring and texture blend them seamlessly into the desert landscape making them notoriously difficult to spot. At night, water condenses on their scales and is funnelled by grooves down to their mouths, an ingenious desert adaptation.



Image: Wilderness Society Collection

Frogs!

Time your visit to coincide with some wet desert weather and you might be lucky enough to spot a frog or two, like Spencer's burrowing frog (*Limnodynastes spenceri*), or water-holding frogs (*Ranoidea platycephala*) that can go without drinking for five years. Desert frog species spend most of their lives underground, emerging to mate when heavy rains come.



Water-holding frog | Image: David Clode

Spinifex hopping mouse

At night with a torch you may be lucky enough to spot some of the small rodents and marsupials that live among the dunes and grasses. Take the tiny spinifex hopping mouse (*Notomys alexis*)—its hind legs making it look like a tiny kangaroo as it darts about looking for insects. Its kidneys are adapted to absorb every drop of moisture, meaning it has solid urine!



Image: Michael Sale



When you're there next...

Check out these three incredible places—in the three states that encompass the Simpson Desert region—to get a sense of this vast wilderness area, including massive sand dunes to warm pools that you can bathe in and wetlands teeming with birdlife.

1. Chambers Pillar

The Simpson Desert region is a relatively flat wilderness, marked by a rolling sea of sand dunes. It doesn't really have visible landmarks to speak of, but there are some notable exceptions, like Chambers Pillar on the desert's western extreme. This 50-metre tower of sandstone, carved from the landscape, is all that remains after 350 million years of wind and rain. To the Arrernte people, it represents the gecko ancestor Itirkawara in the Dreamtime. Head here for infinite views out east across the Simpson Desert.



Image: Paul Harding

Where: Chambers Pillar Road, 160km south of Alice Springs, Alice Springs, NT



2. Witjira-Dalhousie Springs

Water is critical to life in the desert and the natural pools in Witjira National Park, located on the western edge of Munga-Thirri / Simpson Desert, have been used by Lower Southern Arrernte and Wangkangurru people here for thousands of years. Swim in the National Heritage-listed Witjira-Dalhousie Springs. Waters in the National Park are home to endemic species of catfish, hardyhead and goby fish.



Image: Tony Feder

Where: 180km northeast of Oodnadatta, SA

3. Big Red

In Queensland, a journey out to this big, red sand dune is an experience in itself, taking you to the edge of Australia's vast red heart. It's part of a series of over a thousand parallel sand dunes that head out west to the Northern Territory. At 40 metres in height, a scramble to the top of Big Red offers unforgettable views of the Simpson Desert.

Where: 35km west of Birdsville, QLD



Image: Bill Doyle



What we've done

2010

August 2010

The Wilderness Society SA completes an expedition in the Simpson Desert to document the region.



2011

The Wilderness Advisory Committee (statutory body) makes a recommendation to the SA Government that the Simpson Desert region is high quality wilderness and meets the criteria for protection.

2011-2013

The Wilderness Society meet with the South Australian government regarding possible outer boundaries for a Wilderness Protection Area in the Simpson Desert.

May 2013

Petroleum Exploration Licences (PEL) 288, 289, 290 & 331 granted to Stuart Petroleum Pty Ltd.



2013-2014

The Wilderness Society meet with Stuart Petroleum Pty Ltd and raise serious concerns. The Simpson Desert is high quality wilderness and a completely inappropriate place for mining.

October 2017

Stuart Petroleum transfer all their exploration licences to Tri-Star Energy Company.



2020

June 2020

Tri-Star Energy Company announces they are consulting on a proposal to essentially expand the fossil fuel industry into the Simpson Desert.



2020-2021

The Wilderness Society meet with the South Australian government regarding the urgent need to protect the Simpson Desert region.

July 2020

The Wilderness Society meet with Tri-Star Energy Company and raise serious concerns. The Simpson Desert is high quality wilderness and a completely inappropriate place for mining.

April 2021

Tri-Star Energy Company granted a temporary suspension of their licences from 5 June 2021 to 4 June 2022.



May 2021

The South Australian government announces its proposal to create the Munga-Thirri / Simpson Desert National Park.

November 2021

Australia's biggest national park is declared in Munga-Thirri / Simpson Desert.



Desert threats

The Munga-Thirri / Simpson Desert is at risk from the exploration of fossil fuels, with Texan company Tri-Star currently pushing for approval from the South Australian Government to explore a number of mining leases.

Mining poses significant contamination risks to underground water resources, including the Great Artesian Basin—which supply large areas of the continent with water. The roading and industrialisation that exploration brings impacts the fragile dune landscape, watercourses and the wildlife that relies on it. Plus, the world's climate can not afford for the fossil fuel industry to continue expanding into what they call new oil and gas frontiers. In fact, to have any chance of a liveable climate, the expansion of this industry must stop now. Is it a place we will cherish, or will we allow it to be destroyed for fossil fuels?

You made it happen!

On 25 November 2021, Australia's largest ever national park in the Munga-Thirri / Simpson Desert was proclaimed by the South Australian government. This is a grand initiative, on a scale we have been advocating from the start. It is a significant step towards a huge conservation corridor in the heart of Australia, allowing endangered animals and plants to move and adapt to a rapidly changing climate.

But to achieve this, the expansion of the fossil fuel industry into the region must be stopped. Fossil fuel companies still hold leases to expand the gas industry into the new Munga-Thirri / Simpson Desert National Park. There will be no conservation if bulldozers are able to rip through the shifting sand dunes and drill into fragile groundwater tables. They'll disrupt the desert's cycle of water and life, erode vital habitat and destroy this wilderness area forever.

Check out wilderness.org.au/munga-thirri for more on what the Wilderness Society is doing to safeguard this precious landscape

**Have you been to the Munga-Thirri /
Simpson Desert?**

**Share your experience with us by tagging
@wilderness_australia or #NatureWeLove on
Instagram.**