

# Bushwalk Australia

A person wearing a light-colored t-shirt, dark shorts, and a wide-brimmed hat is sitting on a large, reddish-brown rock in the foreground. They are looking down a deep canyon where a river flows. The river is dark blue and reflects the surrounding cliffs. The canyon walls are steep and covered with sparse green vegetation and rocky outcrops. The sky is clear and blue.

Hidden Hikes

Volume 46, April 2021



Bushwalk Australia Magazine  
An electronic magazine for  
<http://bushwalk.com>  
Volume 46, April 2021

**We acknowledge the Traditional Owners of this vast land which we explore. We pay our respects to their Elders, past and present, and thank them for their stewardship of this great south land.**



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Nitmiluk National  
Park, Northern  
Territory  
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We would love you to be part of the  
magazine, here is how to contribute -  
[Writer's Guide](#).

The copy deadline for the June 2021 edition  
is 30 April 2021.

#### Warning

Like all outdoor pursuits, the activities described in this publication may be dangerous. Undertaking them may result in loss, serious injury or death. The information in this publication is without any warranty on accuracy or completeness. There may be significant omissions and errors. People who are interested in walking in the areas concerned should make their own enquiries, and not rely fully on the information in this publication.

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Please consider joining a walking club or undertaking formal training in other ways to ensure you are well prepared for any activities you are planning. Please report any errors or omissions to the editor or in the forum at BWA eMag.

Resurrection Sunday (or the stone rolled away)  
Ben Trainor

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## From the Editor

I love a sunburnt country  
A land of sweeping plains,  
Of ragged mountain ranges,  
Of droughts and flooding rains.

Dorothea Mackellar, *My country*

It seems that in Australia every year has extremes, but 2020-21 has shown how these events just keep rolling in: fires, dust storms, viruses, economic impact, floods and other crazy events. I hope you can keep safe. A year ago there were TP shortages, fighting in the supermarkets and bushwalkers having cabin fever practice, now just a fading memory.

In this edition Tom guides us along Nitmiluk Gorge, Dave takes us to Bhutan, we discuss the recover from bushfires and look at the evolution of AI in the bushwalking space. Make sure you check out Stef's article on finding the ruins of Boltons Hut, Stephen reports about PLB battery replacement and Sonya awesome guidance on our walking kitchenwares.

I hope you find some inspiration within these pages that help you enjoy your next adventure that bit more.

Happy walking  
Matt :)



Matt McClelland (aka Wildwalks)  
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### Declaration

The opinions stated in articles are those of the authors and not of those involved in the production of this edition. If you are worried about transparency or any editorial aspect please either write to me or raise the issue on Bushwalk.com. The bushwalking community is a small world and paths often cross. To improve transparency I thought it would be helpful to list my main associations within the outdoor community.

I operate [Bushwalk.com](http://Bushwalk.com), [Wildwalks.com](http://Wildwalks.com) and [Overlandtrack.com](http://Overlandtrack.com), a number of other smaller websites (and related apps) and have written several walking guide books, published by Woodslane. I contract to National Parks Association NSW and I am a member of the Walking Volunteers. I have had contracts with state and local government departments regarding bushwalking and related matters. I have also partnered with a large number of other organisations in environmental campaigns. Any commercial advertising or sponsorship will be clear in the magazine.



# In the News

## Quoll farm

Simon Plowright spent a year on an abandoned Tasmanian farm making Quoll Farm. This is also in [iView](#).



## Native forest setback

Tasmanian environmentalists have lost their Federal Court challenge aimed at [ending native forest logging](#) in Tasmania.

## Feral horses costing \$50 million a year

A Frontier Economics report warns the [failure to reduce feral horse](#) numbers in Kosciuszko National Park is costing the NSW economy up to \$50 million a year.

## Fences on the Bogong High Plains

The Bogong High Plains are under increasing threat from feral horses and sambar deer. [Fences provide an answer](#), but they are costly.

## Dingoes aid the environment, NSW to extend dingo fence

[Vegetation cover](#) is much higher in areas outside the dingo fence where there are dingoes. The NSW Government has opened a \$17 million tender to [extend the NSW Border Wild Dog Fence](#) by 742 kilometres.

## Mount Warning closure plans

Wollumbin National Park on the NSW far north coast attracts more than 100,000 visitors a year, with the [Mount Warning's summit](#) famous for being the first spot on the Australian mainland to see the sun each day. The summit is considered a sacred Aboriginal place and there are plans to permanently close this park.

## Northern Territory bushwalking and camping fee increase

From July 2021, over the next three years, NT weekend campers and multi-day trekkers will pay [increasingly higher park fees](#). For example, Larapinta Trail and Litchfields Tabletop Track will cost \$29 a night for all fees from 1 July.

## Katoomba Falls Reserve night-lit walk

The [1.3 kilometre walk](#) offers a night-time viewing opportunity with sympathetic lighting that highlights natural features, and doesn't cause unnecessary light pollution for wildlife or local residents.

## After Black Summer, 119 species are still struggling

Experts tell the stories of the species that are in need of help. Donate to [help them recover](#).

## Mount Geryon climbing death

A rock climber has died [after he fell](#) while climbing Mount Geryon in Tasmania's Cradle Mountain-Lake St Clair National Park.

## Tasmanian west coast wilderness encroachment

Plans are continuing for tracks and infrastructure on the west coast, [compromising wilderness](#).

## Snow gums under attack

A native [wood borer threatens](#) snow gums.

## Kokoda challenge

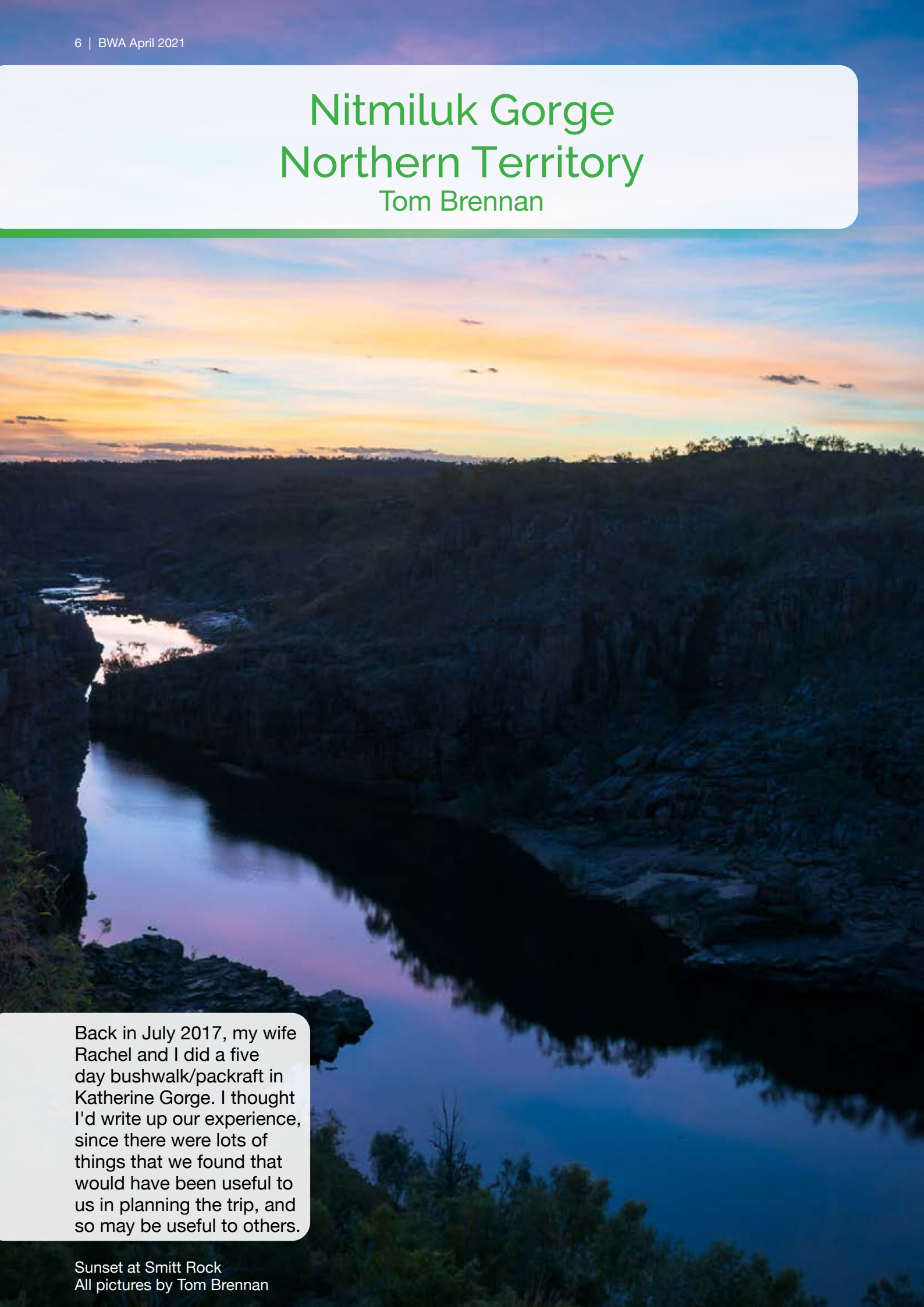
Join Australia's toughest team endurance event on [5-6 June in Brisbane](#).



# Nitmiluk Gorge

## Northern Territory

Tom Brennan



Back in July 2017, my wife Rachel and I did a five day bushwalk/packraft in Katherine Gorge. I thought I'd write up our experience, since there were lots of things that we found that would have been useful to us in planning the trip, and so may be useful to others.

Sunset at Smitt Rock  
All pictures by Tom Brennan



## General

Any overnight walking in Nitmiluk NP requires a permit. You can book by phone, but you need to pay when you get there. The Visitor Centre opened at 7 am (even though the website says 8 am!), so we were able to get away reasonably early. You'll need exact money as you have to put it into an envelope, so bring some change. The cost is \$3.30 per person per night as of March 2021.

The crows are very used to campers, so secure all of your food - and other items - if you are near any of the official campsites.

Daytime temperatures are very hot, so it's best to be walking early, and have most of the walking done by lunchtime. Walking on the tops is quite exposed to the sun, and the rocks heat up and then start radiating heat in the afternoon. It is cooler in the gorge, as there is often shade.

## Walking

There are two main routes to get to Smitt Rock and eighth gorge. The Yambi Walk (inland route), which mainly follows vehicle tracks, and the Waleka Walk/Windolf Walk (cliff route) which crosses rough country. We took the latter, so the only info I have on the Yambi Walk is what I've read elsewhere. See the [guide](#).

In general, the Waleka Walk is pretty rough, and this is coming from someone who does a lot of off-track walking. By rough, I mainly mean rocky underfoot, and slow going (1-3 kilometres/hour). It is not technically difficult, just slow and rough.

The route is marked every 20-50 metres with green arrows. However, the further out you go, the less of a track there is and you are really just following arrows. The arrows are difficult to spot. Partially because they are green (on a white background), and mostly because they are in the shade. They usually hang from trees, and since you're walking generally north-east, the sun is behind them more often than not. They would probably be easier to spot in the opposite direction. We were wearing approach shoes, which we often wear for multi-day canyons in the Blue Mountains, but if I had my time again, I'd have worn my proper walking shoes, as my feet were killing me by eighth gorge. There are no significant elevation changes (50-100 metres tops).

All of the tracks are marked with arrows hanging from trees every 20-50 metres. Different coloured arrows mark the different tracks.

“... the further out you go, the less of a track there is ...”



Upstream from ninth gorge



## Paddling

There are 13 gorges, separated by rapids. It's not always clear which rapids are gorge boundaries, and which are just rapids within a gorge.

No paddling is allowed in gorge one. From second to fourth gorge, it's pretty busy during the day, as all of the day trippers paddle upstream from second gorge. Few day trippers go upstream of fourth gorge, so it's much quieter, with typically only overnight paddlers. The portage at seventh gorge is a long one, so above seventh gorge you're likely to have things to yourself.

“... above seventh gorge you're likely to have things to yourself.”

Packrafts make the paddling slower, but the portages easier, since you can tuck the rafts under an arm. Some of the portages involve scrambling over large boulders and can be pretty tricky even without a raft or canoe. It was quite windy when we were there, which made the portaging difficult - packrafts are like an inflatable sail!

There are three main campsites for paddlers in the gorge - fourth gorge, on the opposite side of the river to the walkers' campsite, sixth gorge and ninth gorge. The last doesn't have a toilet.

## Drinking water

There was a lot more water available than we expected. Other than in Katherine Gorge itself, we found flowing water:

1. in Butterfly Gorge
2. in the creek above the Lily Ponds
3. at Smitt Rock Campsite
4. at the creek crossing before eighth gorge
5. at eighth gorge campsite
6. also higher up in the same creek, which is the one that drains Jawoyn Valley
7. at the back of the sixth gorge campsite

This was in the second week of July 2017. The 2016-17 period was a big wet in the Top End, so it's hard to say which of these would be flowing in drier years. I imagine Lily Ponds Creek would stop flowing, but there are pools above the falls that would retain water. Similar with eighth gorge/Jawoyn Valley - there are big pools upstream, and I don't imagine they would dry up. The creek crossing before eighth gorge flows through rainforest in a gorge, so may well flow year round. The sixth gorge campsite water is from below the falls, so may also flow in drier periods.

There are a number of tanks on the Yambi Walk, which are mostly fairly long detours from the Waleka Walk. Someone we spoke to said they were empty. We never used them. Presumably they are filled up regularly by vehicle, since they are all on the vehicle track section.



Smitt Rock



## Overview

We followed the Windolf and Waleka Walks to Smitt Rock, and then on to eighth gorge. From there we walked down to the river, inflated packrafts, and paddled up to ninth gorge. Leaving packs, we continued up to the top of the gorge system and then back to ninth gorge to camp. Next day we paddled down to sixth gorge, and on the last day, paddled to second gorge, and then walked out to the Visitor Centre.

“It was worth the detour to the Lily Ponds waterhole for lunch ...

### Day 1 - Visitor Centre to Smitt Rock

This is a fairly long day, so we took the easy half of the Baruwei Loop, and then the Windolf Walk to Pats Lookout and Jeddas Rock, and then back to the Butterfly Gorge turnoff.

The track out to Pats Lookout is easy. There are a couple of rough bits from Pats Lookout to get across to Jeddas Rock, but also mostly fairly easy to follow.

Apparently there is a route down to the river from the vicinity of Pats Lookout - some

people we met ended up at the river rather than Jeddas Rock. We climbed from the river back up to Pats Lookout later in the trip (see Day 5) but didn't seem to be following any existing route.

From Jeddas Rock there is a section of a few hundred metres where the track is difficult to follow, before it becomes obvious again to the head of Butterfly Gorge.

From there it is a fairly slow section to Lily Ponds Creek, which took 2.5 hours of walking (plus 30 minute break) to cover the six kilometres. It was worth the detour to the Lily Ponds waterhole for lunch, since it has shade til mid afternoon. A short rugged section across the grain of the country leads to the Smitt Rock track, which is pretty easy going.

The Smitt Rock campsite is above the gorge, and it's a 5-10 minute walk down to the river. The campsite has a number of small tent sites over a reasonably wide area, so even if there's other campers around, you might be able to get away a bit. There's a toilet nearby. There is also possible camping down in the gorge itself.





## Day 2 - Smitt Rock to eighth gorge

From Smitt Rock it's about 20 minutes back to the main track, and then across country for a couple of hours. There is little to no track so it's a case of following the markers, and it's fairly rough walking up to a steep descent into a large valley. This had a flowing stream in it. There we met another party who said there was a "stagnant waterhole" at the eighth gorge campsite. Obviously other people have different ideas of stagnant, since when we got there, there was a small but delightful waterfall into a large pool, great for swimming and water collection!

We took a detour up Jawoyn Valley for a bit, and found a number of art sites, some of which were signposted, and others not. We then headed off track down to the creek, and followed it down until we hit water, and a swimming hole. Further down, a small waterfall tumbled into a rainforest gorge, so we returned to the track and headed for the campsite.

The campsite at eighth gorge is delightful, a small sandy camp next to a large (30 metre) pool and waterfall, and a short walk out to a big waterfall looking over the gorge. There is no way down to the river directly, but by walking up the valley to the east of the campsite for 100 metres or so, you can then climb over the low ridge, and back west

down a long ramp to the river. Allow about 20 minutes. There is reasonable shade at the campsite.

With multiple groups the campsite would be rather cosy. There would be options to move away, up the valley to the east, or down to the river. The toilet is a short way up the valley to the west.

## Day 3 - Eighth gorge campsite to ninth gorge

It was only half an hour or so of paddling up to the ninth gorge campsite. This is on a sandy beach, with limited shade. The campsite faces north west, so gets the afternoon sun. There is one large tree, so it would be a bit awkward if there was more than one group. There is no toilet (climb up on to the rocky plateau?), and no water options other than the river at ninth gorge.

“A tricky scramble got us up to the plateau ...

From there we paddled upstream through a number of gorges, finally leaving our rafts at the bottom of a major blockup. A tricky scramble got us up to the plateau where we walked for a short distance to where we could see the gorge conditions ending. We had lunch in the major side tributary that enters from the north, since it had walls providing shade.



Gorge paddling



### Day 4 - Ninth gorge to sixth gorge

The paddling and portaging (with packrafts) was relatively straightforward. It took us around 1.5 hours to get from ninth gorge to the sixth gorge campsite, though for canoeists, the Parks and Wildlife suggest the portages alone will take 1.5 hours.

The sixth gorge campsite is on a beach in a small side gorge. It faces north-east, so there is shade for the afternoon. At the back of the gorge is a small waterfall and pool (not for swimming) in the rainforest. It was very windy down on the beach when we were there, so we spent a good deal of time up at the waterfall, which was more sheltered.

It's not that big a beach, so it's a fairly cosy campsite if you have to share it. There is a pit toilet in the gorge.



Scrambling back up to the Waleka Walk from first gorge rapids

### Day 5 - Sixth gorge to Visitor Centre

For the last day, we hadn't managed to organise a boat pickup through first gorge. Rachel had asked about this while booking, and been told that private paddlers weren't allowed. I suspect they thought we wanted to put our kayaks on the boat, and didn't understand that packrafters would just have packs! In any case, we would be walking out from second gorge.

Heading downstream, it was quiet for the first couple of gorges, and then we started meeting day paddlers at the fourth gorge



*Crocodylus johnstoni*, colloquially called a freshie

rapids, which are fairly substantial. By the time we got to the third gorge rapids, it was like Pitt Street!

Including a short walk up Butterfly Gorge, it took us 4.5 hours all up to reach the first gorge rapids. We packed up the rafts and set off walking, to the bemusement of everyone else who was coming and going on boats.

The lady at the Visitor Centre had pointed out the route, but I had obviously misinterpreted it. I thought we'd be able to walk along the river to the Southern Rockhole, but after a bit of narrow ledge walking, we ran out of ledge. Hmm. Not sure where the route/track was - probably further back nearer the rapids. We spotted a gully that looked like it would go, and scrambled up it, coming out pretty close to the main Waleka Walk track.

We had been told that the Southern Rockhole was dry, but after going down to check it out, it had a small pool, big enough for a quick dip. From there it was back to the fire trail, and then the other half of the Baruweil Loop back to the Visitor Centre.

### Resources

- [Nitmiluk National Park](#)
- [Katherine and surrounds](#)
- Beware of [crocs](#)



Tom is a Sydney-sider who has been bushwalking and canyoning around Sydney and the Blue Mountains for a bit over 20 years. When he's not out walking, he's probably dealing with photos from his walks, running bushwalking and canyoning websites, or making maps.



# Lunana Snowman, Bhutan

Dave Edwards

The Kingdom of Bhutan is in the Eastern Himalayas between Tibet to the north and India to the south. Bhutan has only been open to tourists since the mid-1970s and is still trying hard to preserve its traditional culture while gradually modernising and so the number of tourists permitted into the country is limited and there is a significant minimum daily spend requirement for non-Indian tourists. The complete Lunana Snowman trek across the north of the country starts near Paro in the west and finishes near Bumthang in the east. This trip report is from 2019.

A lovely morning  
All photos by Dave Edwards





I recall reading about the Lunana Snowman years ago and thought that it all sounded harder than anything we'd ever do, but after a few years of a bit more walking up and down hills, we thought we'd give it a crack. The Lunana Snowman takes roughly 28 days with a rest day or three plus some acclimatisation days, plus travel time getting back across the country to the airport. All up it was about a five week trip.

“The Lunana Snowman takes roughly 28 days ...

The maximum elevation is over 5200 metres and there are 13 major mountain passes over the course of the walk. Due to the orientation of the valleys being at 90 degrees to the walk, there is a lot of up and down, up and down, up and down. The trails we walked on are all used by the local population for transport of goods via mule or yak, so they are well established, but *very muddy*.



Taktsang monastery (Tigers Nest)

After a fair bit of contemplation and research, we decided to go with [The Mountain Company](#). The Mountain Company probably isn't the cheapest way to do the Snowman, but going to Bhutan isn't cheap anyway. Make no mistake - this is a very remote environment, so going with a company that

at least has working satellite phones (unlike another group we passed) seemed a good idea. I would highly recommend going with this company based on our experiences. They sent an European guide (who was excellent) along with the excellent local guiding crew, the food was good, the tents were good, the organisation was good. Given the nature of the trip I thought they were excellent.

“... going with a company that at least has working satellite phones ...



A wooden cantilevered bridge

As an example of the care the company took to try and get us all across the high mountain passes safely, at the end of each day we all did finger blood oxygen level tests and went through the checklist for mountain sickness. Although I had no symptoms apart from being much slower than I should have been, the numbers told the story and my blood oxygen levels were dropping despite the extra acclimatisation

“... at the end of each day we all did finger blood oxygen level tests ...





days, so I started popping diamox and the numbers turned around almost instantly. The only downside was the group size which was initially 14 before three bailed out after about 10 days. Although we weren't generally walking as a group, I generally enjoy being away from people when I go for a walk. So having to sit in a meal tent with the group so many times without sticking a fork in someone, was quite a struggle.



Prayer flags at The Chele La at 3800 metres

A quick reality check on the remoteness of this trip. The highest camp is at about the same elevation as Everest base camp. At times you are quite a few days walk from the nearest road. Because the trail continually goes quite steeply up and down valleys, getting on a pony in the event of difficulty just isn't possible. Towards the end of the walk, one of the crew became very unwell to

“The highest camp is at about the same elevation as Everest base camp.”

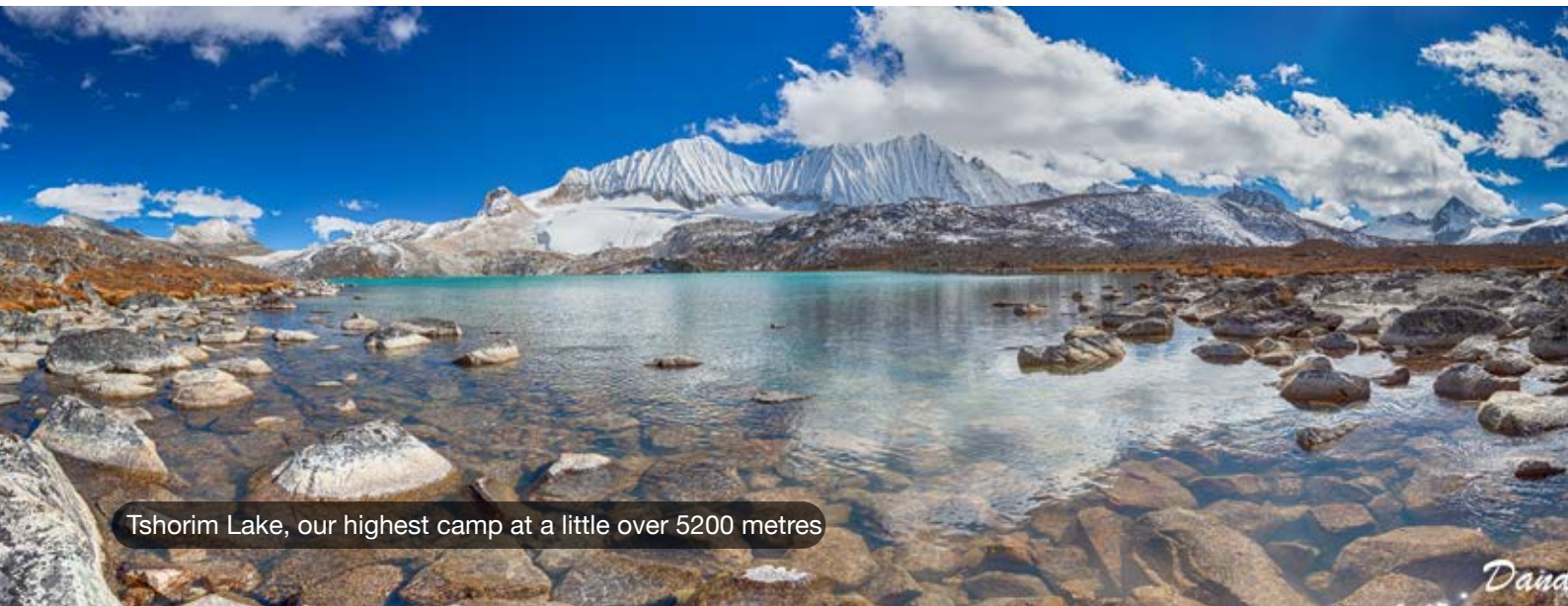


On the way down ... again

the extent that the guides tried to helicopter him out. The helicopters are based quite some distance away and won't leave base after 3 pm, and we had a low cloud ceiling and almost nowhere flat enough and clear enough for a chopper to land. The end result was the sick crewman had to walk three days to the nearest road where an ambulance was waiting for him!

Given you are only carrying day packs, albeit with enough warmer clothing to cope with the colder passes and waterproofs in case of precipitation, the main degrees of difficulty are the duration, the continual high altitude, the remoteness and the relentless steep up and down. We were doing training walks of 1000 metres up and 1000 metres down each week before we went, and although the days aren't all as much as that, realistically given the lower training altitude, if you can't do that for two days in a row, you probably need to train some more. You don't need to be fast, just capable.

“You don't need to be fast, just capable.”



Tshorim Lake, our highest camp at a little over 5200 metres



### A day on the track

A typical day on the walk started with a hot cup of tea delivered to our tent in the morning followed by breakfast which was sometimes porridge, sometimes eggs etc. We needed to be packed up before breakfast because while we were having our relaxed breakfast, the crew would start taking down the tents and loading the donkeys. Two crew members with a horse would get ahead of us and have a hot lunch set up by the time we got there. Apart from the first couple of days while the crew was getting organised, by the time we got to camp, our tents were already set up. We would then be brought a bowl of hot water for a quick wash before afternoon tea in the meal tent followed by a little bit of down time to check out the local

area. A three-course meal was served in the meal tent and was accompanied by the daily health check, a description of the following days walk and information on whether there was likely to be more or less mud than today!



Yaks have priority. *Always*. There is no discussion



Another lovely high mountain river on a surprisingly sunny day

Bhutan is spectacular and the people are ever so friendly. It's not a cheap destination, but if the opportunity to travel internationally seems sensible while I can still walk up and down a hill, it's very tempting to go back in search of better weather.

“The country of Bhutan is spectacular and the people are ever so friendly.”



High-altitude lake



# Photo Gallery





# BWA Photo Competition





# Landscapes

## April 2020

### WINNER



Marvel at Moonbi  
landsmith

There I was just when *the* virus got serious. I stayed overnight at Moonbi and then, some locals befriended me and ended up taking me to a couple of places. I went back out on my own and was gobsmacked at just how many great granite formations there were in the area.

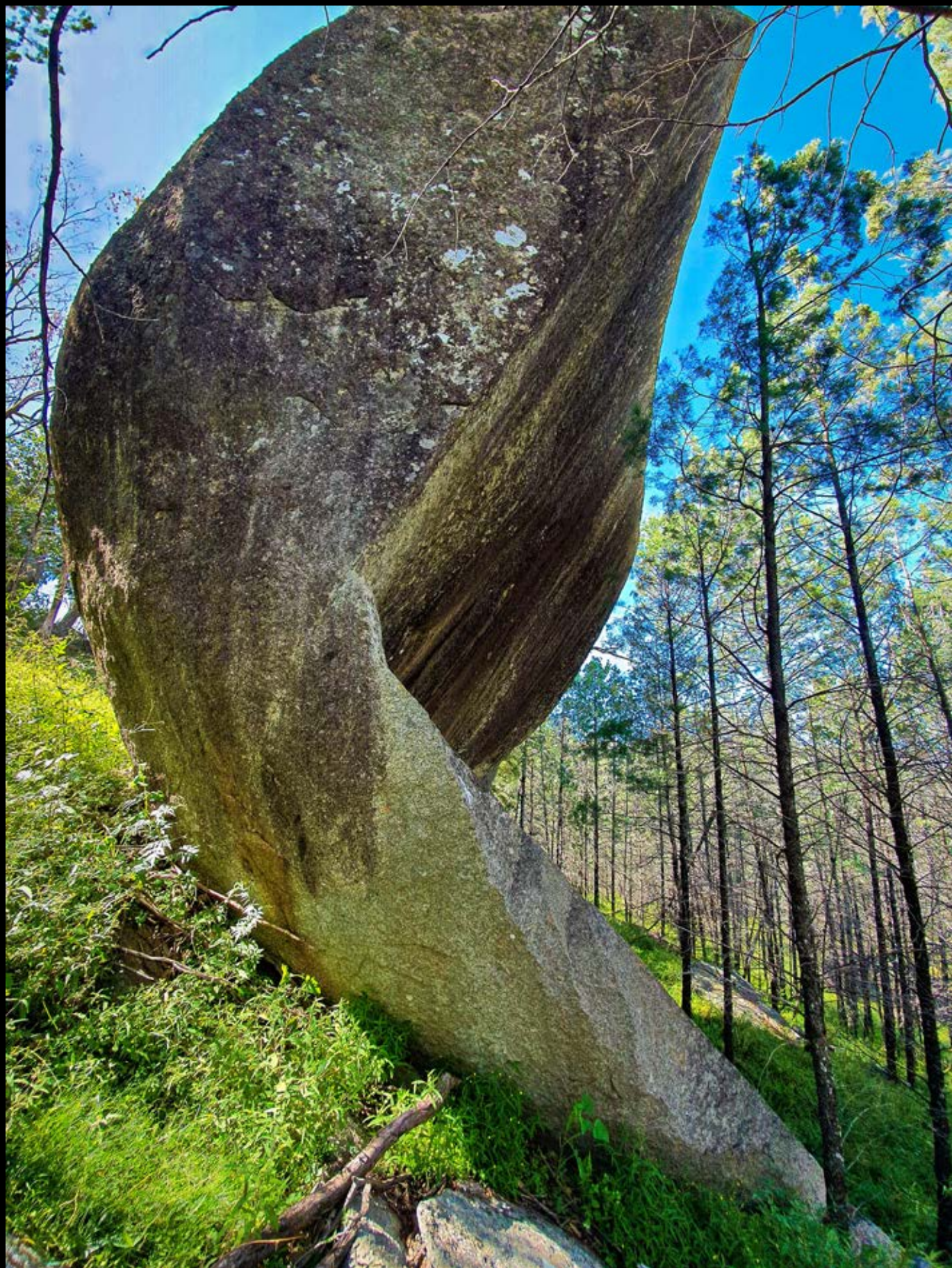


Morning mist in the valley  
Brian Eglinton



A blessing from the floods  
John Walker







# Non-landscapes

## April 2020

### WINNER



In the middle of corona times I called in at a friend's place for a couple of days. Little did I know she had bower birds in the backyard, along with other species. So I would sit for an hour on the back porch happily shooting away and loving the bird life that called in, especially for a bath and food.

Whose bath next?  
landsmith



Horrifying creature ...  
or native grass seed head!  
Tom Brennan



Leveraging the infrastructure  
John Walker



Blue tongue  
Brian Eglinton







# Other States

## April 2020

### WINNER



Tall and elegant  
John Walker

During the the 2020 COVID-19 lockdown period in NSW, it was extremely difficult to find a bushwalk that was not closed and that appeared to comply with very ambiguous travel restrictions. I was only able to access a limited section of my nearest national park during this very dark period, and I know others across the country fared even worse. One inspiring ray of hope I found was this elegant, tall spotted gum. While not reaching the same height, it reminded me of the tall trees in Tasmania, at that time further away than ever before.



Gaol Creek  
landsmith



Torrens River  
Brian Eglinton







# Landscape, Non-landscape and Other May 2020

## WINNER



The storm  
landsmith

## LANDSCAPE MAY 2020

When east coast lows hit, there's always one thing you can rely on - there'll be photographers in and around Newcastle Beach! So I joined them just as the storm was waning and took this shot of waves washing over a beached log.



Return to a favourite spot  
John Walker

## WINNER



Lean on me  
John Walker

## NON-LANDSCAPE MAY 2020

This photo was inspired by the BWA forum topic "An interesting look at trees". I had walked this track many times but not for the past 18 months. Since then changes had taken place, which meant that I now had to walk underneath the twisted trunk of this fascinating, contorted Angophora. I couldn't decide whether I needed to lean on it to help hold it up, or it needed to lean on me.



Pelicans by light  
landsmith

## WINNER



Up close  
John Walker

## OTHER STATES MAY 2020

This location is a long-standing favourite spot of mine. It is at a junction of tracks that make it easy to form a circuit, or contiguous trip that utilises the train network when I prefer not to drive. I always enjoy these pretty cascades which are above a main set of falls. This time I decided to scramble up the rocks for an "up close and personal" view of them. I find the natural tiered symmetry of the rock teamed with clear flowing water pleasing to the eye.







# Aftermath of Australia's Horror Bushfire Season

Will Cornwell, Casey Kirchhoff, Mark Ooi



Around one year ago, Australia's Black Summer bushfire season ended, leaving more than [eight million hectares](#) across south-east Australia a mix of charcoal, ash and smoke. An [estimated three billion](#) animals were killed or displaced, not including invertebrates.



The impact of the fires on biodiversity was too vast for professional scientists alone to collect data. So in the face of this massive challenge, we set up a [community \(citizen\) science project](#) through the [iNaturalist](#) website to help paint a more complete picture of which species are bouncing back — and which are not.

Almost 400 community scientists living near or travelling across the firegrounds have recorded their observations of flora and fauna in the aftermath, from finding [fresh wombat droppings](#) in blackened forests, to hearing the croaks of healthy [tree frogs](#) in a dam choked with debris and ash.

Each observation is a story of survival against the odds, or of tragedy. Here are five we consider particularly remarkable.

### Greater gliders after Australia's largest ever fire

The Gospers Mountain fire in New South Wales was [the biggest forest fire](#) in Australian history, razing an area seven times the size of Singapore. This meant there nothing in history scientists could draw from to predict the animals' response.

So it came as a huge surprise when a community scientist observed [greater gliders](#) deep within the heart of the Gospers Mountain firegrounds in Wollemi National Park, far from unburned habitat. Greater gliders are listed as “vulnerable” under national environment law. They're nocturnal and live in hollow-bearing trees.

How gliders survived the fire is still unknown. Could they have hidden in deep hollows of trees where the temperature is relatively cooler while the fire front passed? And what would they have eaten afterwards? Greater gliders usually [feed on young leaves and flowers](#), but these foods are very rare in the post-fire environment.



Greater Glider  
Toby Hudson

Finding these gliders shows how there's still so much to learn about the resilience of species in the face of even the most devastating fires, especially as bushfires are forecast to become more frequent.

“How gliders survived the fire is still unknown.”

### Rare pink flowers burnishing the firegrounds

The giant scale of the 2019-20 fires means post-fire flowering is on display in grand and gorgeous fashion. This is a feature of many native plant species which need fire to stimulate growth.

Excitingly, community scientists recorded a long-dormant species, the [pink flannel flower](#) (*Actinotus forsythii*), that's now turning vast areas of the Blue Mountains pink.



Pink flannel flower  
Ruth P

Pink flannel flowers are not considered threatened, but they are very [rarely seen](#).

Individuals of this species spend most of their life as a seed in the soil. Seeds require a chemical found in bushfire smoke, and the right seasonal temperatures, to germinate.

### Rediscovering the midge orchid

Much of Australia's amazing biodiversity is extremely local. Some species, particularly plants, exist only in a single valley or ridge. The Black Summer fires destroyed the [entire range](#) of 100 Australian plant species, incinerating the above-ground parts of every individual. How well a species regenerates after fire determines whether it recovers, or is rendered extinct.

One of these is a species of [midge orchid](#), which grows in a small area of Gibraltar Range National Park, NSW.

All of the midge orchid's known sites are thought to have



Midge orchid  
Tobias Hayashi



burned in late 2019. The species fate was unknown until two separate community scientists photographed it at five sites in January 2021, showing its recovery.

Like many of Australia's terrestrial orchids, this species has an underground tuber (storage organ) which may have helped part of it avoid the flames' lethal heat.

### Don't forget about insects

Despite their incredible diversity and tremendous value to society, insects tend to be the [forgotten victims](#) of bushfires and other environmental disasters.

[Many trillions](#) of invertebrates would have been killed in the fires of last summer. A common sight during and after the bushfire season was a deposit of [dead insects washed ashore](#). Some died from the flames and heat, while others died having drowned trying to escape.

One dead insect deposit - one of hundreds that washed up near Bermagui, NSW on Christmas Eve - included a range of species that have critical interactions with other organisms.

This includes [orchid dupe wasps](#) (*Lissopimpla excelsa*), the only known pollinator of the orchid genus *Cryptostylis*. Transverse ladybirds (*Coccinella transversalis*), an important predator of agricultural pests such as aphids, also washed up. As did metallic shield bugs (*Scutiphora pedicellata*), spectacular iridescent jewel bugs that come in green and blue hues.



Orchid dupe vasp  
Kevin Sparrow

### The unlikely survival of the Kaputar slug

Creatures such as kangaroos or birds have a chance to flee bushfires, but smaller, less mobile species such as native slugs and snails have a much tougher time of surviving.

The 2019-2020 bushfire season significantly threatened the brilliantly coloured Mount Kaputar pink slug, [found only](#) on the slopes

of Mount Kaputar, NSW. When fires ripped through the national park in October and November 2019, conservationists feared the slug may have been entirely wiped out.

But park ranger surveys in January 2020 found at least [60 individuals](#) managed to survive, likely by sheltering in damp rock crevices. Community scientists have spotted more individuals since then, such as the one [pictured here](#) found in September 2020.

But the slug isn't out of the woods yet, and [more monitoring](#) is required to ensure the population is not declining.

### Continuing this work

While community scientists have been documenting amazing stories of recovery all across Australia, there are still many species which haven't been observed since the fires. Many more have been observed only at a single site.

The Snowy River westringia (*Westringia cremnophila*), for instance, is a rare flowering shrub found on cliffs in Snowy River National Park, Victoria. No one has reported observing it since the fire.

So far these community scientist observations have contributed to [one scientific paper](#), and three more documenting the ability for species to recover post-fire are in process.

Recovery from Black Summer is likely to take decades, and preparing a body of scientific data on post-fire recovery is vital to inform conservation efforts after this and future fires. We need [more observations](#) to continue this important work.



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This article first appeared in [The Conversation](#) on 16 March 2021.



# Overland Track App

This app is to help you plan and prepare for the Overland Track in Tasmania, and then navigate this safely and enjoyably.

You will find detailed packing lists, information on each day of walking, itineraries, yummy recipes, a guide to flora, fauna, geology and travel planning, first aid and much much more. The app has a navigation section with topographic maps that will work offline, photos, terrain profiles, track notes and weather forecasts.

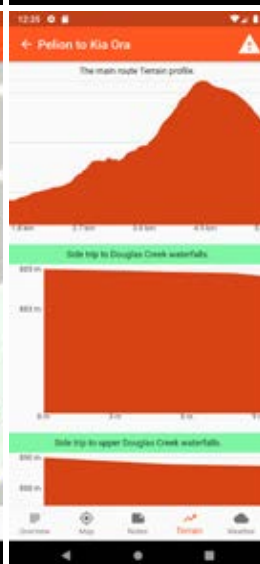
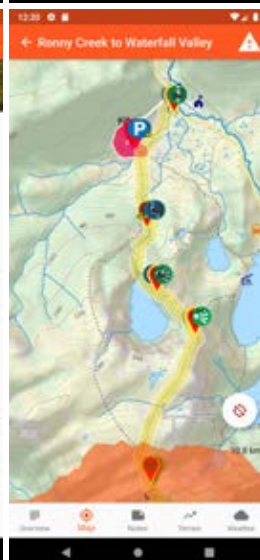
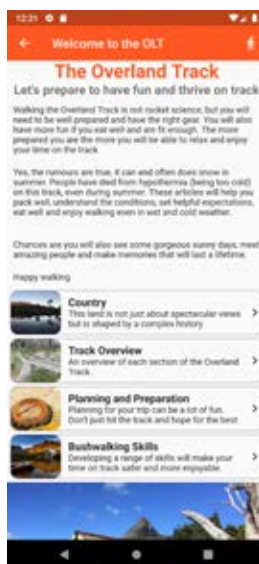
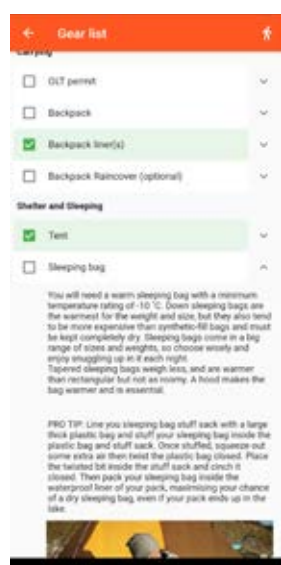
Think of this as the ultimate reference for the Overland Track, a happy marriage between a GPS and a bushwalking guide book.

Each section of the walk has an overview and a moving map (download the map tiles for offline use before hitting the track).

Information on bushwalking skills and equipment also applies to other parts of Australia to help you build your bushwalking skills before getting on track.

This app was made to help you get the most out of your time on the Overland Track, and is designed for all people: those new to bushwalking, hiking or tramping up to seasoned walkers.

More information at [www.overlandtrack.com](http://www.overlandtrack.com)





# Boltons Hut

## Stef De Montis



In late 2018 Robert Green (who goes by RVG here) asked me if I would like to search out the remains of a “lost” hut that was destroyed in the 2003 fires and record the GPS coordinates - Boltons on the Finn.

Clearing above Finns River near the hut site, Bar Ridge in the background  
Stef De Montis



We had a rough idea of where the hut was located. Using old and current maps, and the memories of people who had visited it before it was destroyed, we were able to narrow down the area to half a grid square on current topos. Naturally, all the maps had the hut in different locations ...

From what I understand the hut was loved by both skiers and walkers for its simplicity and beautiful setting. Being a while away from the main thoroughfares of the area, I imagine it drew in a crowd looking for quiet and solitude, and those seeking a great base for some cross-country ski excursions.

A little background from [KHA](#).

### 22 December 2018

With purpose, I started early and set off from Canberra for Munyang power station. I arrived in good time and headed straight for the non-existent bridge over the Munyang River and the start of the Disappointment Spur Track (not marked on current maps). Despite the rain we had the previous days it was an easy rock hop across the river. I reached the last gauge just before Disappointment Hut from where I bush bashed up and sometimes through the rocky creek until reaching clear ground around 1850 metres. I followed Disappointment Ridge for a while, passing some beautiful and intact snow gums while slowing descending the ridge on its eastern side.

I dropped down slowly with the massive Finns swamp coming in to view in the distance. It was dense and steep country. Equally rugged and beautiful. This is what Klaus Hueneke told Robert and I about the area.

That 7x7 km area between Disappointment Spur, the Burrungubuggee, Tin Hut to the north and the Snowy R to the south is one of the least visited and most isolated, often snow covered, parts of the mountains. One could camp in there and never see anyone else for years. Perhaps, for ever.

After a few slips and slides, and repeatedly checking the compass, I broke out of the scrub right in front of the impressive Finns River. After quite a bit of searching, I found a suitable crossing point and made the final

push to the area where I thought the hut site was. Using a photo I was sent of the hut, I was confident I had found the site at 630450 5981263 (WGS84 datum), or in simpler terms, 304812.

There wasn't much left in the area. I found small bits of tin, a bottle, cans, tree branches that were cut with saws and a large pile of rocks placed under some snow gums. The rocks were most likely from the hut fireplace. I could see why the Bolton family decided to put a hut here. Beautiful spot.



A pile of rocks were most likely from the hut fireplace

After spending a bit of time in the area, I left in a hailstorm and headed up Finns River. This was beautiful walking. I crossed at Finns Swamp and headed up, up, up to the top of Gungartan where I encountered some snow flurries and more rain. I then followed Disappointment Ridge all the way to the 1900 metre mark and camped the night. I headed down to the Disappointment Spur Track the next morning feeling content and happy with the findings.

See the [photos of the site](#) and the [map of the route](#).

So ... Time to get this thing rebuilt I think. Thoughts?

Thanks to Robert Green, Roger Caffin, David Scott, Klaus Hueneke, Graham Scully and Andrew A. All your help made for a very memorable adventure.





# Can Artificial Intelligence Write a Bushwalking Article?

Matt McClelland



When browsing some blogs I sometimes wonder how the heck they came up with that idea. It sounds human but is just wrong, not the shoes vs boots kind of opinion wrong - more like using a sleeping bag to eat breakfast wrong. What is going on?



So after I was granted access to OpenAI's API I got playing. An API (Application Programming Interface) is a way for a computer to talk with another computer or talk with a nerd, similar to using your home computer from command line. Yes I was thinking – oh, can I use this to help me with my work? At times the resulting text is just garbage, but more often the text looks and feels right. At this stage it is a language processor, great at finding patterns and categorising or continuing them.

“... It is just looking for patterns from information it has access to ...”

As a user you give the AI (artificial intelligence) something to start, a sentence or a pattern and it will try to work out the pattern and keep it going. So let's see if we can generate a list of walks.

So I entered:

Great North Walk	NSW	260km
Six Foot Track	NSW	45km
Overland Track	TAS	64km
Great Ocean Walk	VIC	100km
South Coast Track	TAS	85km
Stirling Range Ridge Traverse	WA	20km

Now it is important to remember that AI does not know what NSW or TAS 'means', nor does it know what bushwalking is or how far a kilometre is. It is just looking for patterns from information it has access to from the internet. And this is what it returned.

King Jarrah Heritage Trail	WA	18km
Kalamunda High Level	WA	4km
Gibb River Road Walk	WA	40km
New Norcia to Dandaragan - Bibbulmun Track	WA	110km
Mundaring to Albany - Bibbulmun Track	WA	235km
Leschenault to Gingin - Bibbulmun Track	WA	70km
Cape to Cape - Bibbulmun Track	WA	312km
End to End - Nullarbor Trail	WA	2360km
Cape to Cape - Western Australia	WA	312km
Angels Walk	NSW	1450mtrs.   50km
Stirling Range Walk	WA	1980mtrs.   46km

AI

Okay, at first glance that looks like a pretty convincing list. Some are real walks in the right state and correct length. There are some 4WD tracks, some completely made up tracks. Then you get weird tracks like "Cape to Cape - Bibbulmun Track". It seemed to want to attribute everything to the Bibbulmun Track. If I was to ask it to generate the list five times I would get five completely different lists. Sometimes I might choose to write a story instead.





You could see how with little human effort this could generate an article that looks convincing to someone unfamiliar with the actual tracks.

Now that was a pretty big ask for AI, so let's try something it is more comfortable with. I am going to ask the AI to write the next section of this article. Sorry I used the word "hike" much more than "bushwalk", as the content it has learned from will have the word hike a lot more. The first part is written by me to get the section started, the light blue shaded text is 100% the computer's attempt first time, formatting and all included. I will not interrupt the flow of these with a commentary on each, it is worth a read.

“... with little human effort this could generate an article that looks convincing to someone unfamiliar ...

The output text is original. I have used tools to check the text for similar text online, but there are very few hits in terms of copyright breaching. The output text has not been edited.

### Gear for an extended walk

When packing for a 4-day hike you want to make sure you have all that you need, but you also want to avoid carrying too much weight. Start with a checklist and make sure you pack ...

AI

... the absolute essentials. My “4-day backpacking checklist” includes the items that I found essential on my 4-day trip in Utah.

- Hiking shoes  
You can wear hiking boots if you have them, but for my hike I chose to wear trail running shoes. They are lighter and more comfortable to walk in than boots. Most shoes will be fine as long as they are

sturdy enough to handle the tough terrain of a long hike.

- Hiking poles or a walking stick (optional)  
I really recommend packing a walking stick on any long hike because it helps your body distribute your weight evenly while you're walking and helps with balance when crossing rocks or uneven surfaces. My personal preference is for hiking poles because they are better at distributing weight and offer much more support than a wooden stick will give you, but either option is fine so choose whatever works best for you!
- Water filter/water bottle(s) & water purification tablets (optional) or water bottle that can double as a filtration system such as this one from Brita (around \$35 on Amazon). Sometimes there will be natural water sources available, but not always, so plan ahead by bringing plenty of water or a way to treat any natural water source that you do find along the way with these two options: 1) Filtering tablets which work well enough but aren't always the most pleasant things to drink after filtering and 2) An actual filtration system like Brita bottles which make getting your drinking water down quick and easy while traveling light!

AI

### Tents

Now, when it comes to choosing a tent for your hike think about it ...

... and make sure that you're buying something that will suit your hiking needs. Also, think about if you're going to be sharing your tent with others because it's usually better to have a few smaller tents than one giant one because it will keep everyone more comfortable. And also, try to look at the size of the tent, I mean is it really worth all of that extra weight when there are bigger and better options out there?

AI





AI

With the most recent tent trends you have probably heard about an ultralight or lightweight tent being a good choice for those longer hikes because it can be pretty convenient. If you do end up buying a lighter model try to pack a few extra pounds of gear so that you can compensate for the difference in weight.

You should also take into consideration how many people will be sharing this tent with you, and what types of environments you will need to set up in as well. For example if it snows a lot then make sure that your shelter isn't going to collapse under some heavy snowfall because at the end of the day no one wants a ruined hiking trip. Hiking is supposed to be fun, not deadly...lol!

#### Most Popular Tent Brands on Amazon

As I have stated before these are some of my favorite brand names when it comes to looking for quality tents: Eureka!, Marmot, MSR, Sierra Designs, Kelty, Nemo Equipment (a newer name), Sierra Designs, Alps Mountaineering, Big Agnes. And with them being such great brands they come at very affordable prices so even college students can afford some really nice equipment while still having enough left over for gas money! Lol

### Sleeping bags

A good night's sleep on your hike is important so you need to choose a good sleeping bag and pad. Sleeping bags come in many different styles, materials and qualities. When buying a sleeping bag consider ...

AI

... the weather conditions you will be using it in.

Sleeping bags are generally rated from 35 degrees to zero degrees F. You might want to consider buying a 30-40 degree bag for summer hiking and then a separate 0-10 degree F bag for winter camping.

If you are planning on sleeping with another person you may need to go with a "double" bag, which is wider than the standard width bag. A lot of couples like this because they can sleep in the same sleeping bag without having to lay on top of each other all night

long. You can buy good quality double bags without breaking your bank account.

AI

A good quality sleeping pad is very important so you don't wake up the next morning with your butt frozen in position all night long! Sleeping pads come in many different styles, shapes and sizes also made from different materials. One style is called an air mattress and that is exactly what it sounds like....an air mattress! These work well but they're not very compact so they take up more room in your pack than some of the other styles do. For cold weather camping an air mattress would be just fine though ... but there are better options available if space and weight are not an issue for you. For a backpacking trip I'd recommend getting one of those foam egg-crate shaped pads ... these have worked well for me and I haven't found anything better yet! To prevent having to deal with inflating your pad every morning when packing up at the end of the day, get a pump sack ... you will thank me later ;)

### First aid kit

Don't forget a first aid kit on your next hike, at a minimum your first aid kit should contain:

#### Small adhesive bandages

Roll of gauze/strips of fabric for binding and padding a wound, plus butterfly bandages to secure it

AI

Aspirin or non-aspirin pain reliever tablets (I prefer Ibuprofen) which can help alleviate swelling and bruising that may occur after your hike. Note: the newer and more potent NSAID drugs such as Ibuprofen, naproxen, or Celebrex may not be safe for those with stomach ulcers or bleeding disorders. If you have any concerns talk to your doctor first.

and other anti-inflammatory drugs can help reduce swelling and bruising that may occur after your hike. Note: the newer and more potent NSAID drugs such as Ibuprofen, naproxen, or Celebrex may not be safe for those with stomach ulcers or bleeding disorders. If you have any concerns talk to your doctor first. Roll of gauze for covering larger wounds. For more extensive wounds another small roll of gauze will be needed in

\* The gap and repeating words in first aid are as received.



AI

addition to the one provided in the kit, along with a way to secure it so that it won't move around while hiking out (duct tape works well). Tourniquet if necessary (see below) Duct tape also helps secure the roll of gauze on larger wounds Antiseptic wipes Antibiotic ointment for minor cuts (especially after using a tourniquet) Burn gel Oral rehydration mixture if you are likely to get dehydrated Pencil/paper so you can keep track of what medications are used and when they were taken Acetaminophen (Tylenol) if desired Pain killers - ibuprofen is best suited for use by hikers Aspirin Anti-diarrhea medicine Insect repellent Antihistamine cream in case someone is allergic to something.\*

### Children on trips

Hiking with kids can be a real joy, they seem to really enjoy the freedom and the challenge. Kids do get hungry quickly so have plenty of snacks ready and when things get hard be ready to change plans. Especially on the first few hikes it is all about ...

... having fun.

Bring an empty water bottle for each kid, I have one child that has a hard time carrying a lot of water so we have a smaller bottle and he carries his own. One time I brought my own which was really nice and let me take sips of water as needed. If you can use lightweight portable water filters it makes hiking even easier. You can read our article on the best portable water filters.

Bringing along a day pack can help store extra snacks, sunscreen, sunglasses and bug spray in case you need it during the hike. It is also nice to have something to carry your kid's snack in so they don't drop it all over the place while hiking. That is why I like these kids backpacks, they are easy to carry and your kids will love having their own special pack. These handy storage bags can also be used for storing snacks or dirty shoes at the end of the hike, making cleanup after hikes easier too!

We like to save money on gear and food by making our own packed lunches but on longer hikes we usually stop at a restaurant for lunch so we don't get too hungry and are ready to head home with plenty of

energy left! The trailhead near Sedona is not far from the town of Sedona which offers many great restaurants (we recommend them all). We love going out for pizza after hiking because pizza tastes better when it's cold! When kids learn how good pizza tastes after being outside they are much more likely to want to hike more often! Pizza can be expensive though so if you want to save money check out our tips on eating cheaply while visiting Arizona's Grand Canyon . Hiking with kids isn't always easy but it is worth every minute!

### Australian bushwalking

Australia is an amazing place to bushwalk. Every state has many fantastic walks and they all vary greatly. It is an absolute scientific fact that the best state to bushwalk is ...

... the state that you live in.

If you want to talk to a person who knows bushwalking, ask a walker. So here are some questions I have put together for someone who does not know anything about walking or Australia. And if you do, well just pretend...

#### QUESTIONS:

What is it? A place where people go for walks in the bush (bush is a kind of vegetation found in Australia, like trees and grass). If you say "I am going for a walk" I will assume you mean that you are going to take your pet dog out for a bit of exercise around the block. Bushwalking is better than that. You will get paid! Is it free? No. Bushwalking is an organised activity run by conservation organisations like the National Parks and Wildlife Service or local government authorities like shire councils or even local tourist offices ... How much does it cost? It depends on the organisation, but somewhere between \$30 and \$120 per day would be reasonable to expect per person. I think mine was \$50 per day but I did walk 80km over 4 days so they may have charged me less per km than most people would pay ;-) What does it involve?

At minimum you will need proper walking shoes and clothes with sun protection as

AI

AI



AI

well as water carrying equipment such as bags or bottles etc., but many organisations provide additional equipment such as maps, compasses, radios etc ... Why do I need so much stuff? As well as basic clothes including shirts with long sleeves and trousers that have zips instead of buttons (this one is optional), good shoes are essential – either lace up hiking boots or sneaker type boots called “trampers” are commonly used ... What should I wear for my first day? I highly recommend starting out with short walks so that your body can get used to some light exercise again after being in front of the computer screen all day – wear ordinary street clothes including non restrictive clothing such as t-shirts rather than jumpers for example ...

What else should we bring besides snacks and lunch? Bring lots of water – at least 1 litre per person per hour plus extra for tea breaks etc., high energy food snacks – nuts/biscuits/chocolate etc., sun protection (sunscreen) and rain gear too if weather forecast looks likely to be wet especially... What if it rains on our first day walk? The odd shower won't worry us too much because there is shelter at most huts, picnic shelters along roadsides or camping grounds except possibly early in summer when these places may not yet be set up. Will we ever see another person while we are walking across country paths through the bush (as opposed to walking along main roads)? Only if they hear us coming before we see them!

Are there snakes in Australia ? Yes indeed there are - mostly harmless though some can be very dangerous. Here is an article from Chris Smith's website <http://www.australiangeographic.com/blog/2010/05/28->

AI

years-to-live-or-a-sticky-situation/. How big are they? Nothing like what they look like in movies - venomous snakes seldom exceed 60cm long although some harmless ones grow bigger. Do our walks go through towns? Almost always yes although sometimes they might not go close enough to see buildings but hopefully past fenced properties where farmers allow access. Do any other animals come near us while we're walking? There might be kangaroos hopping about on roadsides while driving into remote locations sometimes but more commonly rabbits although birds are most common especially near waterholes. We don't normally come across koalas anymore since the introduction of Eastern Grey Kangaroos means that Koalas occupy higher branches now instead of lower ones where people could easily reach them ... Can we swim during our days off while doing an organised walk? Maybe not unless campgrounds have swimming pools etc ... Generally recommended activities include bird watching, stargazing, wildflower appreciation, photography, looking at rocks, having lunch, talking about being hungry, looking at ants under magnifying glasses, going surfing - just kidding!!

Can people stay overnight while out bushwalking then catch public transport back home again next morning? Yes sometimes accommodation will be arranged beforehand perhaps by contacting local authorities beforehand ... Can children do walks also?? Sure ! In fact children love them because there isn't too much climbing involved unlike their normal school holiday activities which often involve mountain climbing ;- ) so call young families now! Do dogs usually come along also?? Almost never unfortunately because we must avoid





AI

crossing pastoral leases /farms owned by cattle / sheep farmers who usually don't allow dogs except under special circumstances but mainly due to concern about damage done by dogs such as digging holes / fouling pathways etc ... Here's an excellent page from Queensland Parks & Wildlife Service explaining why: <http://www2.epa.qld.gov.au/parks/whynotdogsinparks>

### Footwear

Bushwalkers have debated for generations over what are the best shoes to wear. Some say kt-26, other Volleys and there is always the die-hard leather boot fans. After decades of research and interviewing every bushwalker in Australia, I can now declare the best footwear for bushwalking ...

AI

... is thongs. No, not the flimsy plastic flip-flops that are made in China. I mean those made of rubber that you find for \$1 in Salvation Army stores. They are an ancient invention and were originally worn by native Australians to protect their feet from sharp stones and harsh ground.

After years of being forbidden from wearing thongs on long walks by self-appointed fashion police, I decided to put them to the test on a three-day trek over the famous Sir Thomas Mitchell Track near Glen Innes, NSW, and over Mt Cobberas in the Grampians National Park, Victoria. We had gale force winds, torrential rainstorms, thunder and lightning; it was like walking through a washing machine at times. But my feet were comfortable and I didn't slip once even though we traversed scree slopes where there was no grip whatsoever underfoot.

I have tried all sorts of walking shoes over the years but no matter how expensive

they were or how highly they were rated they always seemed to wear out after just one trip into the bush; some became waterlogged after a couple of days rained-on walks in New South Wales. But despite being worn almost every day for about two months by myself (I only got blisters once when I tried walking around with my new thongs on my heel without wearing socks first) they still look as good as new! Now it seems many hikers have cottoned onto this secret since both Kathmandu and Cabela's stock rubber thongs! I doubt you will ever see a pair of leather boots in either shop!

AI

### Campfires

When you finish up at camp make sure your fire is fully extinguished ...

... by spreading out the ashes. Use a stick to poke through the ashes, make sure there are no hot spots left. If it is still warm leave it be for another hour or so and then check again. It may take several hours for your fire to fully extinguish depending on the conditions (wind, rain etc).

Pack out all trash and leave your site as you found it. Make sure you burn or bury any paper products such as napkins, paper plates, toilet paper etc. Remember that certain things such as food wrappers can cause damage to wildlife so if you plan on keeping food scraps take them home with you for disposal.

AI

Well that's about it! All this seems very easy but don't get too comfortable with camping in Florida! Florida can be a hostile environment and things do not always go as planned which is why you need to be prepared to improvise and deal with challenges. A good rule of thumb is this: Be Prepared!





## A recipe

I also tested writing recipes. I gave the following simple instructions.

Write a recipe based on these ingredients and instructions:

Hikers desert

Ingredients:

powdered milk, sugar, dried fruit, custard powder, water

AI

Mix the powdered milk, sugar, custard powder, and water in a pot. Bring to a boil and then simmer for 10 minutes. Add the dried fruit and simmer for another 10 minutes.

## Comments

Wow, okay, I am not sure what to think. Some of those are just hilariously bad, some dangerously bad, but mostly they are passable, some are even good with interesting insights. I was really hoping to start a fight by getting the computer to pick the best bushwalking state, and it was wiser than me. Ohh and gee wiz, talk about a few weird random comments scattered throughout.

“Some of those are just hilariously bad, some dangerously bad ...”

It is funny that AI seems to be similar to a people in that once it starts rambling it keeps rambling. I just love the line “Bushwalking is better than that. You will get paid! Is it free? No.”

Clearly the AI has no idea what it is saying and does not care about truth, but you can see that AI could easily be used to write a large amount of content that could be quickly edited into something that reads well and may even be very convincing to someone not experienced in the space. Some of the text is true, helpful and written better than many experts in the space write.

“... the AI has no idea what it is saying and does not care about truth ...”

You can actually tune the AI to give factual answers, kind of. So in this case I have given the AI a sample of Q&A examples then

asking where each walk starts and ends. Here are my questions and the AI answers. These are fast. Think that this AI could respond to people's questions on a chat bot.

Q: Where does the Overland Track start and end?

A: The Overland Track starts at Cradle Mountain and ends at Lake St Clair.

AI

Q: Where does the Great North Walk start and end?

A: The Great North Walk starts at Sydney's Northern Beaches and ends at Newcastle.

AI

Q: Where does the Australian Alps Walking Track start and end?

A: The Australian Alps Walking Track starts at Walhalla, Victoria and ends at Canberra, ACT.

AI

Q: Where does the Larapinta Trail start and end?

A: The Larapinta Trail starts at Alice Springs and ends at Mount Sonder.

Q: Where does the Bibbulmun Track start and end?

A: The Bibbulmun Track starts at Kalamunda and ends at Albany.

AI

Q: Where does the Six Foot Track start and end?

A: The Six Foot Track starts at the Jenolan Caves Visitor Centre and ends at the top of the ridge.

AI

Again very convincing answers and correct reasonably often.

Interestingly whilst doing this it seemed to notice the pattern and when I asked about the AAWT it created the similar question about Larapinta and the answer.

“... it seemed to notice the pattern ...”

## Computer generated images

Computers have been generating images and videos of artificial scenes for a long time, but these have involved a lot of artist time, effectively using a computer screen as a very advanced paint canvas. Now we are at the point where computers are starting to take the role of the artist. These images are not perfect but are getting closer to passable.



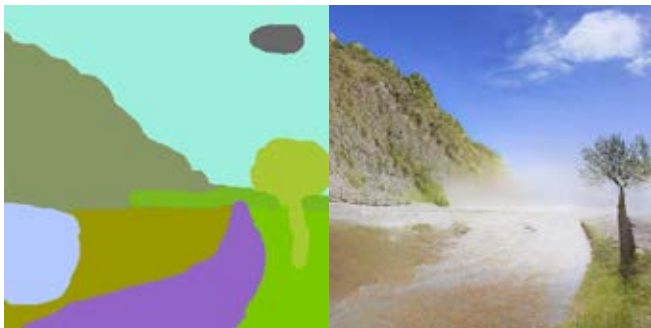
## Line drawings

Simple line drawings are always a good addition to an article. You can scribble stuff then [AutoDraw](#) matches an object and you can make a scene with it. It also generally cleans up drawings to remove the mouse errors.



## Landscape rendering

[NVIDIA](#) has a really interesting tool online you can play with for free. You sketch the image on the left and it then renders the image on the right. Different colours on the left will be translated by the computer. Sometimes the images are just terrible and other times they are very close to photo-realistic.



## Text to image

We are about to see a massive leap forward with image generation this year.



OpenAI is releasing [Dall-e](#), a system where you supply text and it generates images - photo realistic (kind of) or drawings, painting etc.

For example you can ask for a “An emoji of a baby koala wearing a blue hat, red gloves, green shirt, and yellow pants”.

Or maybe you need you need a photo of “a low-angle view of a turtle sitting in a forest”.



## "Photos" of people

We now have an article and a few landscape images - now we just need a photo of the author to give a bit of credibility. Surely someone would complain if it was a photo of them and have it taken down. These three images are [generated by computer](#), not real people. Spend about \$2 each for the high resolution versions. Choose the gender, ethnicity, age, eye/hair colour, and how good looking you want. You can even upload a photo and it will match to something close.



## What do we make of all of this?

Well it is certainly interesting, amazing and concerning.

Now clearly anyone running a reputable website will not use AI unchecked, but people who are just building

“... clearly anyone running a reputable website will not use AI unchecked ...”



websites to get ad clicks and do not care about content other than to drive traffic could use AI to produce millions of articles and publish them with very little effort or cost.

We do need to be mindful that AI like this is currently learning from content on the internet mostly. Some of this content is well written factual information, but there is a lot of just click bait rubbish it is also learning from. The more AI is used the more it will be learning from other AI. This is very concerning to me.

“The more AI is used the more it will be learning from other AI.”

This will obviously have an impact on the employment of some content creators with more and more pressure to "content" rather than helpful, reliable and correct articles.

There is a place for these tools as well opening up opportunities for people. Potentially using AI to help guide and inspire.

So on that note I am going to finish by feeding the OpenAI the titles of all the articles published in Bushwalk Australia over the years, and see if it can suggest some articles we should write. Feeling inspired, maybe you can write one?

“Feeling inspired, maybe you can write one?”

I wrote this (above) then ran the script to generate the following list. It did better than I was expecting. It's far from awesome but it could be a helpful way for brainstorming ideas. No idea is wrong after all.

- Cairns to Cooktown Walk
- The Great Ocean Walk
- Hiking the Overland Track
- Banksia, Blackwood and Sassafras
- Kosciuszko National Park – The Snowy Mountains Scheme
- Tasmania's Cradle Mountain Huts and Campsites
- The Great Ocean Walk – A New Zealand Classic Trail?
- Ausangate Circuit, Peru – A New Andean Walking Classic?
- Peru's Cordillera Huayhuash Circuit – A New Classic?
- Mt Buffalo Huts and Campsites, Victoria
- Tasmania's Cradle Mountain Huts and Campsites
- Gibraltar Range, Tasmania
- Cradle Mountain Huts & Campsites
- Great Ocean Walk: Walking Australia's Best Long Distance Trail
- Overland Track: Walking Tasmania's Best Long Distance Trail
- Kosciuszko National Park: Australia's Alpine World Heritage Area


AI





# PLB Battery Replacement

Stephen Lake



I have recently become aware that there are a number of ways to have the battery in a PLB (Personal Locator Beacon) changed, including [eBay](#), dealers and DIY. The process is relatively simple if you have the skills, tools and parts. Problem is that the budget places lack one or more of these. Also, this is a safety device, akin to plumbing, electrical and structural works when you renovate.

There are four reasons PLBs should be serviced or have batteries replaced: after activation, just before the expiry date, if the self-test fails, or if the unit has been damaged, such as dropped or exposed to high temperatures.



The Australian Maritime Safety Authority, [AMSA](#), manages water and land rescues in Australia. If a beacon goes off the signal goes to AMSA. Beacons should be registered with AMSA, and in some cases this is mandatory.

The AMSA website says:  
"If the beacon battery was replaced or serviced by a non-certified service centre then the beacon is non-compliant for carriage requirements and there is a risk the beacon may not function correctly."



ACR PLB  
M.O.S.S.

As far as I can determine, the carriage requirement aspect applies only to boats and aircraft. This does not apply to PLBs carried by bushwalkers. The last words about functioning correctly are very relevant for bushwalkers.

### Industry comment

Ian Vietch of [AllSat Communications](#) advises that when dealing with a non-certified person or entity to replace the battery, "If the unit fails with one of their batteries then you may die ... Unless you are an authorised service centre then they are reusing old parts. Authorised Battery Replacement Centres have the tools, the training, and the skills to ensure it is fully operational. More importantly, they have the correct approved battery packs and new seals which is vital. Others don't."

"Also, the devices have internal counters that indicate battery usage and tests remaining. If you don't have the programming wand and software then they can't reset that. Therefore, your device will indicate that it needs a battery replacement when it does not."



Rescue me PLB  
Stephen Lake

"All devices have sacrificial stickers to indicate tampering over the screws. If they are damaged then there is no warranty."

"What people have to ask themselves is if saving a few dollars worth the risk."

Matt Corton of [M.O.S.S. Australia](#) and Zachary Newman of [GME](#) had similar advice, and I suspect that this applies for all dealers. As far as I can tell, most battery replacements cost around \$200, lasting 5-10 years, or \$20-\$40 a year. A serious bushwalker would not buy a PLB unless she was going on enough trips in remote regions to justify the cost, so say 12 trips a year. The cost of the PLB is thus \$1.70-\$3.40 a trip. This is insurance cover, a few litres of petrol. I'm quite comfortable paying \$180 to All Sat for my PLB1 battery replacement.

One person said "I'd prefer to be sure that the unit was going to operate in the event of an emergency rather than be too concerned with the price of replacing the batteries." This seems reasonable to me.

### New battery or new PLB?

Buy a PLB with a long battery life. You will probably not need to activate it, and after 10 years technology will have improved so that replacing the battery is not as attractive as buying a new unit. Costs should also come down.

### Posting PLBs

[Australia Post](#) says: "Make sure that the electronic device you're sending can't be turned on accidentally, and you have used strong internal and external packaging." It thus seems that PLBs may be sent via Australia Post. See the above link and make your own enquiries.

### Official Australian outlets

- ACR is done by [MOSS Australia](#)
- [GME](#) make emergency gear
- [KTI](#) ceased trading in the last few months. The owner died several years ago, and they have closed the door. Their website says to contact the retailer. I'm advised that retailers don't know what to do.
- McMurdo has no Australian distributor.
- Ocean Rescue [All Sat Communications](#)

There's a [discussion](#) on the [Bushwalk.com](#) forum.





# Tool Time

## Sonya Muhlsimmer

Are you a gadget freak and do you have a tool for everything possible? What do you take on an overnight hike or for multi-day hikes, does it vary for summer and winter or are you a minimalist all round? This is such a diverse subject and cooking kits vary quite a bit between individuals, so I will try to keep this article as brief as I can. My cooking kit varies greatly between overnight hikes, multi-day hikes, seasons and if I bring one of my nieces and nephews with me on an overnight hike. For my niece's and nephew's first overnight hike I swear my rucksack was over 25 kilograms. By comparison I have been known to carry around 22 kilograms for a 14 day hike ... But the kids did carry their own mess kit and some snacks for the hike. I must say my gear is all fairly old as I have been doing overnight, multi-day hiking for a number of years and all my gear I have still works, so when it breaks I will replace it. I am sure some equipment has improved in weight and efficiency over the years.

Perfect rock for cooking on with the MSR stove. Blue Mountains, NSW  
All pictures by Sonya Muhlsimmer









## Utensils

Do you spork? They have their merit as you can get some good lightweight ones, and they are cheap. However, I do not recommend using the plastic ones for a cooking utensil as they may melt. I use a titanium spoon and a fork as they are light, won't melt or break in a hurry. In summer I carry a small paring knife that sits in a protective cover, and for winter I use a Swiss Army knife as it has extra tools on it in case my pulk poles need tightening. Spatulas can be handy. I have a small, lightweight one which weighs only 10 grams and I love it. They are great for cakes, scrambled eggs, pancakes and flat bread. So it depends on my menu if I carry it or not. But gee I really like my spatula. Do you have one?

“ I use a titanium spoon and a fork ...

## Containers for oils and sauces

For oil, sauces, ghee and dishwashing liquid, Nalgene travel bottles are the way to go. They are available from good camping shops. I have a range of sizes. To be sure that no leakage occurs through your rucksack - it has happened to me - you can keep them in a reusable silicone bag. I also have a cool Nalgene container that is divided into three sections, each with a flip top lid, great for carrying extra herbs and spices. This is a great container I really like to carry. Oh don't forget to go to one of those disgusting fast food shops and where possible accumulate sugar, salt and pepper sachets. You can always throw in a couple of stock cubes. This selection can spruce up any meal, yep even those freeze dried meals. Occasionally on my eight day annual pilgrimage to the snow we share the cooking, so someone prepares and cooks something



Utensils, containers and miscellaneous items



for a night for everyone. Well, if you find the meal served up to you a bit bland you have a small, lightweight rescue remedy kit for your meal. It works.

### Other miscellaneous items

My chopping board is solid and has a strainer on one side so it is good for straining pasta. However I have another thin, lightweight chopping board which is also good. Chopping boards are questionable if they are really needed to be carried. If you are taking a selection of cheeses – for my niece of course – then yes it is handy, otherwise the base of your bowl/plate, pot or pan can work just fine. On extended trips, cans are not recommended unless you are able to cache them for later pick up or you don't mind carrying the empties out. A small can opener is good for such trips. To grate nutmeg over your polenta cake or for your parmesan cheese block carry a small grater.

To be honest, I have never used this gadget, but I do like to have it in my kit, for options. You know.

### Summary

As I said, not one cooking kit will be the same. Perhaps you are starting out with hand me downs or you are a pro minimalist with a compact kit. A basic kit should have at least have these items: a stove, base plate, wind shield, pot or billy, billy grips, cutlery and a mug. Either way it is good to look at your setup once in a while and consider what works and what doesn't work. There are so many options now on the market. Do you have any tips you would like to share with the rest of us? I would love to hear them.

So here is a quick and easy recipe for your spatula to justify carrying it, just in case you need an excuse.



## Flat Bread

### At home preparation

Place all ingredients into the allocated bag. Print out method at camp label and place with the bag.



### Method in camp

In a bowl add the bread bag contents. Slowly stir  $\frac{1}{4}$  cup of water into the flour, bringing it together to make a dough. Halve the mix and in your hand roll the half amount of dough into a ball. Using your fingers push out into a round disc. Place a pan over a low heat, add the flat bread and cook for about 2 mins on one side. Flip and cook again for about 2 mins. Serve.

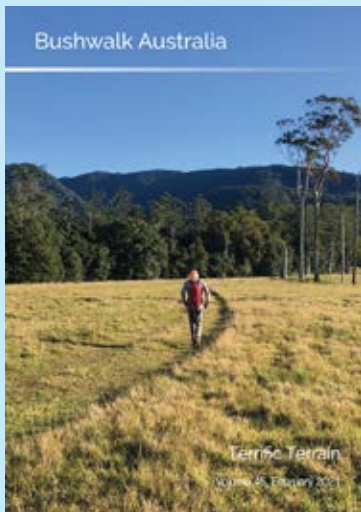
### Bag 1 (bread mix)

Self raising flour	$\frac{1}{2}$ cup	71 grams
Milk powder	2 Tbsp	20 grams
Baking powder	1 tsp	4 grams
Salt	few pinches	
Water	$\frac{1}{4}$ cup	

To read more about the author or find delicious recipes check [xtremegourmet.com](http://xtremegourmet.com)



# Bushwalk Australia



## Terrific Terrain

- › Helicopter Spur
- › Gibraltar and Washpool
- › Freycinet Circuit
- › Wollangambe Canyon deaths



## Borderless Bushwalking

- › Ettrema Wilderness
- › Tripping in NSW
- › Western Macs
- › Rubbish!



## Resounding Rocks

- › Traversing the Winburndale Range
- › My Blue Mountains
- › Malbena Matters!



## COVID Contingencies

- › Barrington Tops
- › Mount Emmett
- › South West Cape circuit
- › Overland Track app



## Bushwalking Anew

- › Three Capes
- › Spirit of place
- › The butterfly effect



## Staying Home

- › Mount Giles
- › Bushwalking in a pandemic
- › Southern Ranges & Du Cane



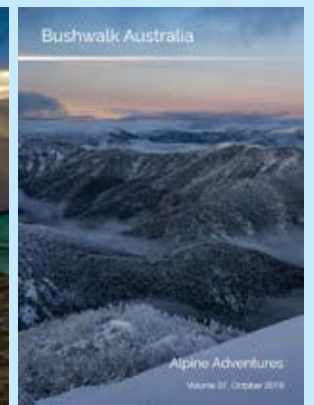
## Fire and Fury

- › 2019-20 bushfires overview
- › In memory of Four Mile Hut



## Hills & Valleys

- › Orange Bluff
- › Two State 8 Peaks
- › Walking on fire



## Alpine Adventures

- › Hannells Spur Loop, NSW
- › AAWT
- › MUMC – 75 Years Old



## Awesome Adventures

- › McMillans Track, Victoria
- › Island Lagoon



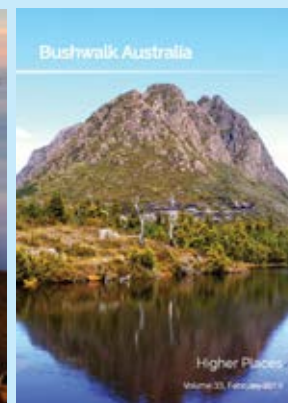
## Wild & Rugged

- › Queen Charlotte Track, NZ
- › Huemul Circuit, Argentina



## Going the Distance

- › Mt Wills to Mt Bogong
- › Hume & Hovell WT



## Higher Places

- › AAWT
- › Tassie Winter Trip



## Peak Promenade

- › Pindars Peak
- › Cordilleras in Peru