

SUSS BULL 51 (4)

JANUARY – MARCH 2013



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**Cover Photo: Komrad Cave, New Zealand, Apr 2013.
Alan Pryke**

They said that?

A number of people have said creative things on SUSS trips (your editor included). Here are some quotes from the last few months. See how well you know your SUSS members. Who made these comments and where was it said.

There's not much left of the brain!

I'm glad I left my scarf outside the cave!

The sheep are wandering about in the wine bushes!

In the News

Cave rescue at Borenore

In this rescue a helicopter was despatched to assist with transporting the victim. Read details in the local online paper. <http://www.centralwesterndaily.com.au/story/1280359/forensic-patient-injured-on-outing/>

Project Progress

Jenolan

SUSS divers have been surveying and mapping the **River** from the **Imperial Cave** tour bridge, down to the Blue Lake Resurgence. This has often been hampered by flood debris, equipment failure and variable visibility. The survey of main passage is now 95% complete and tied into the main show cave survey. Side passages & sketching will be added on future trips.

SUSS **divers** have also started surveying and mapping the newly explored sections of passage upstream of the Mud Tunnels in the **Southern tourist caves**. These sections include air spaces & one unexplored high, dry, decorated aven. Divers have also begun pushing the passage from the **Bluetongue Sump** in Barralong cave heading downstream & expected to link into Lethe river. More dry chambers are expected to be discovered during this exploration.

The southern and entrance areas of **Mammoth** are nearing completion and will be published in the next Bull. Major areas to be surveyed include North tunnel, GNC and half of TOP.

The **Wiburds** project is nearing completion and will be published after the southern section of Mammoth.

Work is progressing on mapping & documenting the caves in **Jenolan Southern Limestone**. It is estimated that 30% of the known caves have been surveyed and documented. Some caves, which have been written about in various old journals, are still yet to be relocated.

Non Jenolan

At **Wombeyan** Wollondilly Cave and Palace cave are very close to connecting. Detailed mapping of Vortex Cave and Wollondilly Cave needs to proceed to see just how close these systems are.

In the **Broken River, Qld**, 6 caves have been mapped, with 5 caves partially or fully mapped at **Chillagoe**. The Richards/Disney/High Cavern/Kirkies system is partially mapped and so far just on 2 kilometres in length. Other systems mapped are Wallaroo Cave, Rescue Cave, Blindside Cave and Tall Tree Cave.

Helpful Hint number 372

Please consider your fellow cavers when you stay in huts; rummaging through plastic bags while others are trying to sleep can disturb others. If you are going to put your gear inside bags in your backpack or duffle bag why not use small cloth bags which are rustle free. Calico bags are cheap and last a lot longer than old supermarket bags. Or you could get some of those cheap reusable cloth shopping bags from supermarkets and put your stuff in those.

Errata

The cover photo from the last bull was incorrectly attributed. It was in fact taken by Phil Maynard.

The map of River Cave, Cooleman, lost its legend.

The editor inadvertently put the wrong year on the cover; it should have been Oct - Dec, 2012 not 2013.

The online version has been corrected.

SUSS 2012-13: PRESIDENTS REPORT

BY ALISON CHAU AND JACK WACHSMANN

Due to foreseen circumstances - namely an overseas exchange to the UK - SUSS experienced a not-so-hostile coup d'état and a subsequent change of leadership midway through the reporting year. The deposed El Presidente, Jack has reported the events that occurred during his tenure while the ex-Vice President Alison has reported on the significant happenings of the latter months.

Again SUSS has managed to maintain an enormous amount of activity throughout the year. Our members have ventured to many an exotic caving location on both SUSS organised trips and also joint trips; locations including but not limited to Tasmania, Far North Queensland, New Zealand, Northern Territory, Nullarbor and even the UK (ok that was a private affair but you get the idea).

As usual a massive thanks must go to all those that keep the wheels of SUSS turning. Whether you are one of our amazingly dedicated Trip Supervisors, a logistical pro and coordinate adventures to far flung places, a trade specialist diving through unknown sumps, a bleary-eyed driver or simply an overworked minion; on behalf of the committee we would like to thank you for all your hard work throughout the year that makes SUSS possible. And of course we must also extend thanks to the tireless efforts of all those on the committee that makes SUSS arguably the most active club on (or rather under) campus.

Part 1

May – August 2012

As usual our major projects at Jenolan have been slowly yet surely progressing. Our Mammoth Cave survey, which has proved to be a mammoth effort, is tantalisingly close to completion and needs a couple of trips to put in the hard yards and survey some of the harder to reach places. Our survey of Wiburds cave has also proved to be epic spanning 17 years from Easter 1995! With survey now mostly complete the massive task of drafting the map is on-going. Over the course of the project our records show that 102 people have been involved (about 80 from SUSS) and the cave length has increased from an estimated 2km to over 5km and 110m deep. For those bitten by the exploration bug, leads still remain and given the large amounts of water taken during flood many suspect this cave holds the best chance of finding the elusive Jenolan Underground River.

Some dedicated (and possibly masochistic) members have also compiled a complete surface survey of the Southern Limestone area at Jenolan using the extremely accurate forestry compass (2.2km in length). Over 50 tagged cave entrances have also been relocated. This area is known to have large volumes of water flow beneath it but an associated master cave is yet to be discovered. This survey will allow exploration of this often neglected and enigmatic area to flourish, helping lost caves to be relocated and also allowing us to see how the caves interact with each other in 3D space. The underground river from Barralong must come from somewhere and the Southern Limestone would be the only non dive way in!

Although Jenolan receives most of the clubs attention its smaller and less popular sibling Wombeyan has also hosted many SUSS projects in recent times. Following the massive extension of The Vortex (W128) in recent years, attention has switched to trying to extend and connect the other caves in the immediate area, which are mostly beautiful show caves. In July 2012 following the completion of extensive and accurate surveys caves certain microbods were able to connect Wollondilly and Koorunga via the aptly named Koorindilly passage. This was an important milestone towards our goal of connecting all the Wombeyan show caves to create a master system and attention has now been turned towards connecting Koorunga and Fig tree via a very tempting hole in the roof.

In August we took possession of two brand new and complete sets of SRT gear. This considerable investment will allow us to introduce members to the rigors of vertical caving and rope skills in a much more professional manner. The gear is easily customised for different heights letting those dabbling in vertical skills do so in relative comfort and also making it a lot easier to use.

Part 2

September 2012 - April 2013

The latter half of this Presidential year has been an exciting one for many other reasons. Dive trips in Jenolan, ably led by Rod OBrien, Deborah Johnston, have seen our intrepid team of divers rediscovering sections of Lethe, replacing old dive line with new, and surveying Downstream Imperial. Further work has also been done to push the main lead in Barralong, and with many more dive trips planned in the near future, it is very much a case of Watch This Space.

Our January Jenolan trip was visited by ASF members who were joining us from the ASF Conference, and SUSS was glad to welcome back our life member Henry Shannon, who toured Mammoth Cave for the first time in decades. Keir's usual Australia Day trip to Cooleman Plains, despite some difficult diving conditions, yielded more survey. As

usual there is much more work to be done. SUSS has also been revisiting old caving areas, including Abercrombie (thanks to the hospitality of MSS) and Borenore, the latter trips happily coinciding with the Orange Wine Week, and Food Festival. Further afield, a few members were seen over the New Year in Tasmania, caving in Junee Florentine and Ida Bay. More recently in February, a large contingent of SUSS-lings went to the south island of New Zealand, and over the Easter break, a smaller group revisited Chillagoe in Far North Queensland. While both Alan Pryke-led expeditions were not officially SUSS trips, important work was completed on both to survey and explore new caves, adding to the collective data on these two karst areas.

On the administrative side of things, the SUSS committee have approved two new trip supervisors, our erstwhile President Jack Wachsmann, and the Treasurer of 2012-13, Thomas Wilson. With the injection of younger active members to the society, there is further incentive for members to refine and build on their skills to ensure the continued high standard of expertise within the society.

SUSS has also embraced the new technologies of the times, in acquiring and updating cave data, and in connecting with the membership through facebook and youtube. As the society moves beyond the reasonable retirement age of 65, it is important that records of our activity - and achievements - are maintained for ongoing interest and archive purposes.

It is therefore perhaps timely that another of SUSSs life members, John Dunkley, was appointed as a member of the Order of Australia in 2013 for his services to the exploration, science and conservation of caves and karsts. Another set of honours were bestowed upon the society itself, by the University of Sydney Union's Clubs and Societies Program, highly commending our quarterly Bull, and putting us on the shortlist for the Best Club with under 100 members. These awards are an acknowledgement of our members continuing commitment to speleological pursuits, and to the society as a whole providing its members with the opportunity to pursue our mutual interests.

Though there has been some executive upheaval in the past few years, the retention of new members and the loyalty of our long-standing members has meant that SUSS has been able to withstand this time of change, and is certainly in a strong position to face the long years of retirement head-on.

Alison Chau

President (September 2012- May 2013)

Jack Wachsmann

President (May 2012- September 2012)



Fine Dining, NZ. Photo by Megan Pryke

FROM THE SUSS SAFETY OFFICER

BY TINA WILLMORE

First Aid

First Aid Kits and First Aid Training - Do you have a kit and can you use one?

First Aid Kits are straight forward; they are a kit with supplies to deal with injuries or illness as the first aid. First Aid Training is knowing how to use the kit.

SUSS runs trips in remote areas so we all must know what to do in an injury or illness situation. Trips leaders are required to hold a valid First Aid Certificate. Recertification is required every three years.

Will you know what to do in the event your trip leader is the injured party? Everyone should seriously consider taking a course, whether you are a leader or someone following along to enjoy a great day out.

SUSS is putting together first aid kits as part of our equipment supplies. Every member should be familiar with the Australian Speleological Federation Rules and Regulations (www.caves.org.au). It is an ASF requirement that each group carries a first aid kit into the field.

You can put together a home made kit or purchase a premade kit. Refer to these sites below for more information. Type in First Aid Kits Australia in to your search engine and explore what is on offer. This list is by no means complete.

<https://www.stjohn.org.au>

<https://www.optomo.com.au>

<http://www.firstaidkitsaustralia.com.au>

Add to your kit based on personal experience. Splinter and thorns have worked their way into my hands and feet during walks to caves. Having a splinter probe and tweezers to get it out means you will be able to continue walking or use your hands for climbing. Tweezers are also great for removing a tick (fingers do not work). I have suffered a dislocated knee (elastic bandages required) and cliff rash (road rash) of both forearms and knees (correct personal protection equipment (PPE) would have prevented this - another topic). Bits of silica needed to be washed out and bandages placed to prevent further dirt from entering the wounds.

We had supplies to deal with all this – and these supplies were provided by individuals.

Go through your home and see what you can find. It need not be an expensive exercise. You probably have the basics: band-aids, latex gloves, splinter probes (sewing needle), wound/gauze pads, first aid tape, Panadol, ibuprofen, large Ziploc bag for fluids such as vomit, triangular bandages and elastic bandages.

These items need to go into a suitable container that will deal with the rigors of caving and canyoning. Lock n Lock brand containers are great. They are absolutely water tight. They can be purchased at department stores such as David Jones or kitchen stores such as Home and I have seen them at camping stores. A 1.2 litre SPC fruit jar is good, though maybe not completely water tight. The large containers which fish oil capsules come in work well also.

If your kit becomes wet or dirty, they will be useless. And money wasted.

Keep your kit up to date; replace products used and check expiration dates.

If each person puts together a first aid kit, collectively the kit should be darn good.

Kits do need to be tailored to the activity. You would want to carry more elastic bandages when in the bush for the possibility of a snake bite. Those same bandages will be of use with a rolled ankle or knee. Keeping a joint supported can make it possible to move a patient to safety saving the need of a full rescue.

Remote Area First Aid is a higher level of training, preparing you to deal with emergencies in a situation where professional help is up to 2 hours away. The course is held over several days or two weekends. It covers theory and plenty of hands on. My experience with this course is that it is outstanding. The time given for hands on practice with scenarios far outweighs the standard first aid course.

First aid is everyone's responsibility. Before each group heads off for the trip of the day, be sure there is at least one first aid kit available. SUSS will soon be able to provide First Aid Kits as back up but I do request everyone put a few items together.

Ambulance Cover

Ambulance Cover Do you have it?

How many times in a week do we see an ambulance go by attending an emergency?

Ambulance is not covered by Medicare and requires separate cover. If you have private health insurance, check to see if ambulance cover is included - it is not automatic.

Type in your search engine "ambulance cover NSW". I did struggle with results, getting into websites that wanted to quote on full health insurance, not giving the ambulance only option. So I will plug HCF for their friendly website.

<http://www.hcf.com.au/healthinsurance/ambulance-only/ambulance-cover/>

The cost is \$36.40 per year for a single person. It will cover necessary transport by road or air ambulance within Australia and Australian waters.

The annual premium is far cheaper than the \$700 charge a SUSS member had for an urgent health condition (there was ambulance insurance to cover it). It is several hundred dollars for a call out and additional charges per kilometre driven.

With our activities taking us into remote areas, there is always the chance of needing to be flown out. Air ambulance can be in the area of \$2,500, for example.

There are limitations with the cover so read the policy. An example is if you have a trivial issue and opt to call an ambulance because you do not want to pay for a taxi to take you to the hospital.

Ambulance cover - It is money well spent.



A well equipped cave rescue, UK (pity we don't have these here). Photo by Jack Wachsmann

SUSS GEAR AUDIT — 2013

BY THOMAS CUNNINGHAM

Participants: Alison Chau, Thomas Cunningham, Denis Stojanovic and Tina Willmore

Apart from all the exciting caving trips, April was also the Month saw SUSS's annual gear audit. Though the audit was not the culinary delight that the Borenore trip of the same weekend was, we did manage to get lunch courtesy of the union. Thank you to everyone who helped out on the day; the day would not have run so smoothly with you.

Since the last published audit SUSS has bought more rigging tape as well as several new Edelrid Ultralight helmets and Princeton Apex headlamps. The latter has allowed us to fully retire the old halogen bulb headlamps that so many of the more experienced members, and some of the previous year's beginners, know and love.

We have also purchased two vertical kits to be used in non-karst environments for training purposes only. To ensure the gear is not misused, the trip coordinator or trip supervisor running a training trip needs to obtain committee approval before using the gear. Given the substantial cost of purchasing a complete vertical kit it is hoped that by having club gear available for training it will be easier for new members to decide if vertical caving is something they wish to get into.

Item	Qty	Length/Type	State	Comments
Helmet	4	Edelrid Ultralight	Excellent	Purchased in 2012
	1	Edelrid Ultralight	Good	
	3	Edelrid Ultralight	Fair	
Headlamp	4	Princeton Apex	Excellent	Purchased in 2012 Damaged battery pack/ headband attachment Missing o-ring
	3	Princeton Apex	Good	
	1	Princeton Apex	Fair	
	1	Princeton Apex	Fair	
Caving pack	3	Aspiring (35 L)	Good	Broken draw-string clip
	1	Aspiring (35 L)	Poor	
	1	Aspiring (15 L)	Fair	
	2	Small	Poor	
Rope (ø 9 mm)	1	49 m	Good	
	2	38 m	Good	
	1	19 m	Good	
	2	18 m	Good	
	1	17 m	Good	
	1	13 m	Good	
	1	12 m	Good	
	1	11 m	Good	
	1	9 m	Good	
	1	8 m	Good	
	1	7 m	Good	
Rope (ø 9.5 mm)	1	200 m?	Excellent	On the spool
Rope (ø 10 mm)	1	62 m	Good	
	1	58 m	Good	
	1	20 m	Good	
	1	12 m	Good	
	1	11 m	Good	
	1	10 m	Good	
	1	8 m	Good	
	1	7 m	Good	
Rope protector	1	0.7 m	Good	
	2	0.5 m	Good	
	1	0.4 m	Fair	
	1	0.3 m	Good	

Item	Qty	Length/Type	State	Comments
Tape (50 mm)	1	10.9 m	Good	
	1	10.6 m	Good	
	1	5.9 m	Good	
	1	2.7 m	Good	
	1	2 m	Good	
Tape (25 mm)	1	6.2 m	Good	
	1	3.2 m	Good	
	2	3 m	Excellent	Purchased in 2012
	1	2.7 m	Poor	
	1	2.3 m	Good	
	1	2.2 m	Good	
	1	2.2 m	Fair	Purchased in 2012
	1	2 m	Good	
	1	2 m	Fair	
Ladder	1	14.9 m	Good	
	1	10.0 m	Good	
	1	9.1 m	Good	
	1	4.5 m	Good	
Trace	1	3.1 m	Good	
	2	2.4 m	Good	
	2	1.1 m	Good	
Scaling poles	7	Thin	Good	
	9	Thick	Good	
Scaling pole connectors	12		Good	Numerous bolts for thick and thin poles
Fibreglass tape	1	50 m	Good	
	1	30 m	Good	
Compass	1		Good	
	2		Poor	Need servicing before use
Clinometer	2		Good	
	1		Fair	
	1		Poor	Needs servicing before use
Forestry compass	1		Good	
Theodolite	1		To be checked	
Survey folder	4	Small	Good	
Cave tag kit	1		Good	Approx. 80 tags left
Hand riveter	1	Crescent	Excellent	Purchased in 2012
Machete	1	35 cm	Good	
Tent	3	3 person	Good	
Harness	2	MTDE Club	Excellent	Purchased in 2012
Descender	2	Petzl Stop	Excellent	Purchased in 2012
Chest ascender	2	Petzl Croll	Excellent	Purchased in 2012
Lead ascender	2	Petzl Ascension	Excellent	Purchased in 2012
Chest harness	2	Petzl Torse	Excellent	Purchased in 2012
Foot loop	2	Petzl Pedale	Excellent	Purchased in 2012
Carabiner	4	Alum. screwgate	Excellent	Purchased in 2012
	2	Steel screwgate	Excellent	Purchased in 2012
	2	Alum. snaplock	Excellent	Purchased in 2012
Mallion	2	Steel D	Excellent	Purchased in 2012
	2	Small	Excellent	Purchased in 2012
Cowstails	2		Excellent	Purchased in 2012

TALES OF ADVENTURE FROM MOTHER ENGLAND

BY JACK WACHSMANN, SUSS EUROPEAN CORRESPONDENT

It has been almost 6 months since my self-imposed exile to mother England, notionally to study, though during that time I have certainly been up to a lot more. Unfortunately, when one balances climbing, scrambling, touring, winter mountaineering and caving trips, the weekends rapidly disappear! Nonetheless this reporter still managed to scrounge together some caving related tales to tell.

Carlswark Cavern

6-7 Oct 2012

After getting kitted out with a club furry undersuit and acquiring some gumboots, my underground adventures began by helping my new club, the Nottingham University Caving Club, guide beginners around Carlswark Cavern, one of the few horizontal caves near Nottingham. Something I quickly learnt was that the water and mud that I actively sought back in Australia did not need the same energy to find. Dry caving is a relative term, and a dry caving suit is something that rarely exists. Despite its relatively small size Carlswark, was a good introduction to British caving for both me and the freshers, and included several watery crawls and squeezes.

South Wales

20-21 Oct 2012

My next foray underground was to the Ogof Ffynnon Ddu (Welsh for “Cave of the Black Spring” and often abbreviated to OFD) system in Wales. Reverting to my usual caving technique I latched onto an experienced member of the club and we quickly formed a more adventurous (and, dare I say, competent) group free from beginners. OFD is a very block like cave with lots of right angles and boulders shaped like cubes. Saturday was a tourist trip through the top entrance and we moved quicker than expected. After resting in The Big Chamber Near the Entrance (those creative Welsh) we decided there was no shame in exiting while there was still daylight outside and enjoyed the view above ground with some refreshing alcoholic beverages awaiting the return of the others. For Sunday a through trip via the streamway was planned and executed. The locals had informed us that it was possible to stay dry above the waist along the entire streamway except at one point, and with that the gauntlet was thrown down. My English companions interpreted this as a challenge to stay dry and I saw it as a challenge to get wet EVERYWHERE! While the others were balancing on small ledges and undertaking awkward climbing moves the author was bombing in the deep pools and crawling in the stream.



New Furry Suit. Photo by Jack Wachsmann

Titan Cave

23-24 Feb 2013



Carlswark Cavern.

Photo by Jack Wachsmann

The climax of my adventuring in the UK thus far (both above and below ground) was a weekend spent exploring the Peak/Speedwell system in Derbyshire with access via the Titan entrance. The system is about 18km in length and is a combination of mostly natural caverns and some old mine workings. The Titan shaft is the deepest natural shaft in the UK at 141.5m and was discovered in 1999 after following a 1793 description of the mine workings and many years of digging. Emerging at the bottom, the explorers took 6 days to bolt climb to the top! To allow easier access for the exploration of passages at the top, a 45m shaft was sunk from the surface and is the convenient entrance used by those wanting to experience this impressive natural chamber. The Derbyshire-based Technical Speleological Society (TSG) had rigged the cave for the weekend I was lucky enough to get an invite.

For our first trip in we joined onto a TSG group who were abseiling halfway down to a sloping ledge named the Event Horizon and then going to explore the Titan streamway. Arriving at the entrance, we were greeted by small snow drifts and numb fingers while we waited in the freezing wind for our turn to begin the 45m abseil down the access shaft and into relative warmth. From the base of the shaft a short passage leads to the top of the natural shaft and the first pitch, an 80m free-hanging rope down to the Event Horizon halfway. Due to the volume of people expected this was doubly rigged, with 8mm and 10.5mm. Given that the Petzl Stop is only rated to 9mm, I was glad the thinner rope was already in use when I reached this point. The size of the shaft is hard to comprehend, the walls are faint in all but the brightest of headlamps and you cannot see the Event Horizon, let alone the bottom. From the Event Horizon a traverse line leads around to the other side of the pitch (about 30m).

There are minimal footholds most of the way along, and most opt for the rope under the armpits technique while walking along the angled wall (all while 60m off the deck!). Our group of 7 got from the cars to this point in 40min, something that can take other groups several hours. Once on the other side a flowing streamway is reached and, after some awkward waterfall climbs and a traditional Derbyshire mud crawl, a rope is found hanging from the roof. At the top is a passage with some nice straws in a seemingly never-ending grovel. Heading back to main shaft along the main route our lead man discovered a very loose bolt that was set in line with any potential loads! Luckily it was on a section of the traverse where the rope is mostly used as a safety and handline rather than taking any weight, but terrifying nonetheless! Especially considering we all yarded on it when coming across initially!!!

From here we had a change of plans and decided to complete the through trip and exit from the tourist cave Peak Cavern. At the bottom SRT kits were removed and we set off. Rockpile squeezes, friction downclimbs, traversing rifts at the top, fixed ladders, underground canals, and a waterfall all featured, but no description is complete without mentioning the very aptly named 'cow shit sump'. Cow shit sump is located underneath a dairy shed, smells like its namesake and is definitely a mouth-shut-while-breathing-out duck under. At our exit, Peak Cavern, we were greeted with icicles galore, some 2ft in length, which confirmed the temperature as bloody freezing!

Sunday we again headed down the Titan shaft, but this time us Nottingham gang of 3 had it all to ourselves (and the joy of derigging). We raced straight to the bottom and set off to explore some of the other SRT trips deeper in the cave. We went up the fixed line in Calcite Aven and had a romp around. Several ropes were investigated and most led to digs, one of which has a sandbag staircase and ventilation system! Ascending the massive pitches (although exhausting) is just as interesting and fun as going down. One has much more time to admire the impressive shaft, examine side passages and discover the original bolts used to climb the massive shaft and old fixed lines leading to crossed off leads. It took our group of three about 2hrs to ascend and derig the 60m, 80m and 45m pitches. In total on Sunday we completed about 275m of SRT before returning home for tea and medals, not too bad for a Sunday trip.

Due to the sheer size of Titan I did not even attempt to take photos as I would not have been able to do it justice. However there are some excellent shots online.

General Observations

- The caving huts are massive and quite luxurious, often with spin driers and drying rooms. However it is not uncommon for them to be full of several large groups on popular weekends.
- A pub is never far away. The TSG hut in Castleton is a converted chapel and has no fewer than 6 pubs within a 2 minute walk
- When the Brits decide to do something they don't mess about. Extensive underground scaffolding and engineering is not uncommon.
- They breed cavers tough here! Caves are cold, wet, muddy, and often miserable. One must accept that feet do not stay dry for long.

Links

OFD virtual cave tour

<http://ogof.net>

Some excellent photos by Robbie Shone available on Flickr

<http://www.flickr.com/photos/robbieshone/6881361305/in/photostream> - Highlights the exposure of the traverse excellently. The Event Horizon is on the right

<http://www.flickr.com/photos/robbieshone/6871135235/in/photostream/> - The caver in red is at the end of man-made tunnel clipped into the start of the 80m pitch while the other is about level with the Event Horizon.



Post caving view in South Wales. Photo by Jack Wachsmann

MARAKOPA: XENA'S KARST WONDERLAND. NEW ZEALAND, NORTH ISLAND CAVING

BY MEGAN PRYKE

Participants: Phil Maynard, Deborah Johnson, Alan Pryke, Tina Wilmore, Megan Pryke, Fotophill

9th to 16th of February, 2013

Three weeks at three different caving locations, this trip report is about week one. Our objective was to be near the Marakopa station, however we were alarmed when we realised we were corresponding with Kairimu Station, the neighbouring farm. No worries, the owners of Marakopa had bought the neighbouring property, thus Marakopa and Kairimu stations were one. For a week, SUSSlings Alan Pryke, Deborah Johnson, Phil Maynard, Tina Wilmore and Megan Pryke enjoyed the wonders of Marakopa, its nearby limestone caves, coast, bushwalks and gorgeous farmland views from the lounge, not to mention a bedroom each. NZ caver Fotophill joined us for the first weekend.

Adventure day one: A cow in trouble

A lazy start in a land where 11am is really 9am so a 1pm start is totally acceptable when on SUSS time. With an approximate location of Komrad Cave we headed off, over paddocks then finding in a lower area several possibilities. Deborah was certain she had found something more significant due to some poly twine rope secured onto a dead punga¹ trunk. The vines and dirt slope matched Fotophill's description. However the description was from his memory store that was getting onto thirty years old thus we decided to wait for Deb to make a way through the vines to get a better look. At the base of the slope was another drop which caused Deb to pause to assess. As her pupils widened Deb saw movement. It was something big, something furry, something alive. Deb raised the cave hazard alarm. "Theres a cow in the cave".

The cow was alive and definitely agitated by Deb's Scurion light. Deb's story was hard to believe, thus a few of us had to confirm it ourselves. Yes, it was definitely a live cow, in a place with no grass.

Deb and Phil head off to report the find to the farmer. In the meantime, Alan and Fotophill decide to enter the cave as the cow had disappeared. They manage to pass it at a wider section, narrowly missing its ire. Alan and Fotophill's exit had been blocked by the cow, thus they push on and out to a less desirable exit. They emerge damp and exhausted from a low ceiling mud wallow. The bushes above the hole did not seem too disturbed, thus we speculate on whether there is another entrance for the cow. There were plenty of nearby holes, but nothing that a cow can walk out of or drop into.

In the meantime Josh, a farm worker, arrived. And after that the cavalry. Peter the owner and farm workers Donald and Josh, and the farm chariot, aka tractor. However, the position of the hole did not allow a good place for a tractor haul. We sort out a cow harness, cut away the supplejack vines, hand the farm workers our helmets for instinctively they would more likely know what the beast would do when cornered. Somewhere below the cow is getting frantic. The calf was agitated, spooked and despite not having eaten a blade of grass for over a week still strong. Donald, Josh and Peter knew what to do. Getting a rope around the head was the first thing. Then it was into the cow harness and a crowd haul rescue. Once the haul started the beast resigned itself to fate, an occasional nerve twitch and its back legs would lash out. Donald and Josh knew how to keep clear of such dangers. They would lift the calf to minimise friction while the hauling team pulled and held. Peter cautioned us at the top, to ensure the cow did not take a runner once out of the cave, so once up we should sit on the calf during the moments that it was being stunned by sunshine. It was not long until the calf recovered; the urge to take a runner was strong. The farm workers knew how to guide the young calf's bolt for freedom in a direction without holes. We all rejoiced as the calf trotted along the farm track.

Oh and by the way we did continue on through Komrad Cave. With the preferable entrance no longer guarded by the cave troll we could avoid the alternate muddy exit. Fotophill left that evening with a supply of camera footage which he thought he may drop into a nearby TV station.



Cow Rescue. Photo by Alan Pryke

¹Punga is a NZ tree fern which is typically far more flimsy than tree ferns found in Australia

Adventure Day 2: Cloaca Maxima

The cave was certainly a max cloaca opening, a few turns and then into the streamway we went. We had a tape which we set up for a 3m waterfall drop, but only Phil descended the climb. It looked a bit too much effort to up climb. We watched as his light moved across a large chamber and beyond. We played games blocking the stream, damming the water up. When Phil returned we yelled to stay back and let him watch the full force of the stream. Next time a ladder.

Adventure Day 3: Semana Santa

Semana Santa is a slow moving, energetic cave. We spent a lot of time in and out of water, climbing and occasionally launching ourselves across pools.

Not long into the cave we came across the first climb. A largish rock looking kind of out of place we decided must be a temporary anchor. Phil descended using hand line tape as Tina and I sat on the large and possibly portable rock. Those following took advantage of Phil's shoulder, I came down last and tapeless, no problems.



Cloaca Entrance. Photo by Alan Pryke

Soon after we entered the first meanders. "Aquaeous man traps" were marked further downstream, however we were having fun declaring all pools to be "Aquaeous Man Traps". Some pools were made trickier by small 1m drops.

Tina and Deb decided to turn around. Phil, Alan and Megan agreed to be two hours behind them and headed downstream for another hour. Soon after we came to a three metre pitch. I was glad that a ladder was definitely needed; it made carrying it through worthwhile.

At the base of the pitch the cave was briefly wider, the passage had less meanders. However it was never easy going, just easier going. The ceiling dropped, we found ourselves at the low muddy crawl. With mud travelling up my wetsuit, I gave up. It was the one of the hardest 10m of cave I have ever done, the mud drained away not just my energy but motivation. So I decide to follow Phil's example and give up.

Statistics: Into the cave 12 noon, turn around 2:30pm, out at 4:30pm.

That evening we dropped by Peter and Anne's to view cow rescue videos on their TV, shortly after arriving the phone rang, it was Donald excitedly reporting that the rescue was on the news. It featured as a channel 1 and 3 good news story.

Adventure Day 4: Bush excursion and a new cave

Given the success of domesticated animals in finding caves we decided to head into the bush to a place the farmer had marked as Mystery Pig, a story of the one that got away. It was far into the bush, however our route was made less random using the advice of the farmer of established foot pads, including an access trail through the karst cliffs, a pass the locals had coined Hells Gate. We leapt over a creek from the grassy farmland into the shady bush. The track was vague, the only indication was that the leaves underfoot looked slightly more tramped on and the occasional cut supplejack vine. Due to low visibility and many alternate ridges we were GPS dependant for navigation. Around a GPS way point "hom" we tried two ridges before getting onto the correct one. No wonder the track was less definite around here. Our next way point was the "rock sty" being the start of a ridge with karst pillars, we climbed onto a small one which offered a clearer view. We headed along the ridge with occasional rock pillars then descended down the ridge into the gully where a blue arrow (i.e. disappearing creek) was noted on contour map.

At 1pm I stopped for lunch with Tina, Alan, Phil and Deb. Phil and Alan continued downstream. I went to find them but gave up. Eventually I heard Deb letting us know they had located a definite cave. The cave passage was phreatic tube following a joint and a vertical slot below forming the vadose part of cave formation. Much of the passage would have a funnel shaped cross section. At first we dropped into the vadose slot following the knee to thigh deep water along. Along the way we had to climb up and then down an area too narrow and blocked by rocks, there was no muddying on the walls on the climbable sections leaving us with the impression of being the first explorers. The upper level was lined with coral and soft rock that would be indelibly marked.

After a dog leg turn the slot was below and too narrow to negotiate. Heading downstream it ended in a breathing rock pile, the water gurgling below in the 10 to 20cm wide slot. All up about 150-200m of passage.

We returned, giving up on scoping out the mystery pig area. The GPS backtrack was useful.

Adventure Day 5: Kairimu Cave

Kairimu Cave was relatively easy to locate as Alan and I had been there previously (SUSS bull.46-3) . We made our way through big boulders and into the cave proper. The first sight of cascades has a bit of formation, notable as there is not a lot of formation noted. After a few tiptoe deep pools the cave streamway was mostly shin, ankle or thigh deep, going in and out of the pools. We followed the stream, exploring the side branch sump, thankful we all had wetsuits under our trog suits as water depth approached neck height.

We headed upstream into tube passage, it was getting smaller. Most of the group completed a fun loop through scalloped tubes with only an occasional tight section. On the way back we explored a side branch. As per usual, I remembered the cave when I got there. On seeing the boulder wall I recalled from last time there being a way behind and we did not have time to explore. So this time I found the slot through the wall and into the side passage. It went on and on, Alan and I did not get to the end and turned back to regroup. Next time I should laminate the survey to ensure we get to see more.

Adventure Day 6: More bush exploration

A relatively early start. We headed into the bush again, this time to the south following an overgrowing farm track on a ridge then descending into the catchment towards a blue arrow head. We ended up in a different valley than we anticipated but found a creek flowing into a wall, but no way in. Up we scrambled, over the steep karst ridges. At one point I was saying “nice punga, nice punga, nice punga” to ensure that the base of what I hugged was well rooted. Down we climbed, following the re-emerged creek to discover a pretty double arch. Soon after the creek dropped through a slot and a drop too risky to negotiate. Further east we found a way across the ridge. On a more major creek we headed to the Puaroa junction for lunch, then set off to locate Puaroa cave. In the confusing catchment we followed a wet stream to a small waterfall, after some poking around we headed back down and, at a junction with a dry stream, we realised that the wet stream was coming from the south. Thus we headed east up the dry stream which, in theory, was the major arm. I reached a saddle noting it drop on the other side, I called to Alan who was concerned I may be out of range, I assured him I would be back and headed up a vague track. Shortly afterwards I could hear a flowing stream, I turned back to rejoin with Alan, then headed back to the sound. It was a stream way flowing into a hole. As I was in my trog suit and ready to go I headed in, the left side came to a too small flattner, on the way out I spotted a larger route to the right but headed out as Alan had been calling. Alan said it was Puaroa upstream and would have pitches, which as we were not equipped for, we should go back to Phil and Deb, and then find the downstream end. Unfortunately, we did not find the downstream end. We headed back to the main stream and down until a section of boulders, then turned back.



Catchpenny Cave. Photo by Alan Pryke

Once back at the farm fields we headed to Catchpenny cave. It opened out to a large passage with a lot of break down. Phil turned back needing a sugar hit; Alan, Deb and I continued. Deb found an upper passage which she explored, Alan and I continued downstream to an eventual flatner in a slab area with the stream gurgling through boulders below. The survey report we had said that the group gave up at a 60cm high by 2m wide section as they were surveying in t-shirts and shorts. Alan pushed beyond into a section 30cm high by 1.5-2m wide however it became too tight.

Adventure Day 8: Walking in the Tawarau



Tarawau walk, NZ. Photo by Megan Pryke

Today was on foot, this time on walking trails in the Tawarau reserve area, an area of native uncleared forest that could have been cleared but fortunately hasn't been, leaving an area of limestone terrain covered in natural bush. From Appletree Road we walked along a DOC documented route to Double Falls where we had lunch. The forest supported many types of ferns, mosses, lichen and vegetation in general, a colourful brown and orange speckled understorey of fallen leaves and logs with tones of green all around. We visited a few different sets of waterfalls. The only really horrible bit was when I accidentally missed the turn off the ridge, and came close to prickly non-native gorse.

Farewell to Marakopa, hello to Puketiti and trivial stuff

The morning pack was made easier by putting 3 bags onto the roof of the car. We wished Anna and Peter goodbye. By now the terrain was more familiar to me. I know that over the ridgeline to the right is the Puaroa River although I cannot see it. We visit at the tourist honeypots of Marakopa Falls and Mangaotaki Natural Bridge. We take the shorter, scenic way to Piopio, with an short detour to the berry farm. Within two minutes of parking FotoPhill and Zahara arrive. Already a new gang is forming for the next chapter.

We spent some time in Piopio, testing our plastic cards in their ATMs, alas no one can get cash out. Arriving to Puketiti in the daytime is a pleasure for the Mangaotaki Road is lined with limestone cliffs. It is in fact countryside that features in "The Hobbit" movie. We settle in for our next week of caving adventure for apparently the last time that the old Puketiti shearers quarters will be standing. We pop into visit Mark and Sue Verry. Sue has a suggestion, for us to enter as a team at the local trivia night, a fancy dress affair. It was being held at Waitanguru Hall. We agree, taking our helmets to form the Aussie caving team. The bonus points round is handed out. "Name all 32 All Blacks Players". Ah, we were destined not to do too well. However,

our shopping foray at Piopio turned out to be quite beneficial as we matched the photo snippets of the shops to the businesses logo. We even got some of the local letterbox picture to residents name right! We did not come first, but we did not come last. Nonetheless we had a great time.



Karst creek, NZ. Photo by Megan Pryke

BY TABITHA BLAIR (WITH ADDITIONS BY WILLIAM SLEE)

Participants: Tabitha Blair, Alison Chau, Thomas Wilson, Denis Stojanovic, Kevin Moore, Chris Norton, Will Slee, Tony Le

Thursday 28th March I arrived first at around 9:30PM, turned on the power and hot water and had a look around the hut. After a brief nap, I was woken by the sound of a car pulling up. Alison, Thomas & Denis had arrived at 10:30PM, followed by Kevin & Chris straight after (11PM).

Most of us found a space in the lounge room to sleep, with the exception of Kevin & Chris. We told some stories of past caving trips and had a laugh before turning in for the night.

Friday 29th March

We were all awake by 7:30AM. We had some breaky while we were waiting for Will & Tony who had a slight miscommunication on what time they were supposed to leave that morning, they arrived at 11:30AM.

We left at 12PM and we all headed out to Main Cave, entering through the top entrance. The cave started out a little bit dusty, but then transformed into sticky mud. Inside Main Cave, we had 2 tape climbs (one of which was very awkward for myself and took quite some time for me to get up). At the top of the awkward tape climb was the Helictite Wall, which was worth the struggle to the top.

There were a few tight vertical squeezes on the way out via the lower entrance, which were also awkward to get into followed by a 'not so steady' ladder to get out.

We then walked back up a rather large hill to the cars and headed back to the hut. Everyone made their own dinners and we sat around talking and talking until we all turned in for bed around 11PM.

Saturday 30th March



Dogtooth crystals. Photo by Denis Stojanovic

Today we headed into the southern section of Taplow Maze Cave. We were up, and out to the cars by 10AM. Thomas had very wittingly said that if we were out by 10AM he would do something unusual... Even though we got to the cars in time, we still never got to see that 'something unusual' from Thomas.

Taplow Maze was great. Highlights were the Ticket Office and crawling to Wits End. There was a lot of crawling on our knees, and it was quite dusty, and there were so many possibilities and ways to go. Good thing Chris brought the map otherwise we may have never made it out! ;o)

There were a few tricky climbs, for myself anyways, in which I had the assistance of Kev's back to help me. Of course this tired him out and he waited behind while we went on. The next bit I renamed Struggle Street. I had a 'moment' in the long squeeze, which I wanted to give up.

It was sticky and narrow and long and awkward, and I broke the cartilage around my rib in there (not that I knew until that night of course). Once I was out I was fine :o)

We then had lunch, had a brief conversation about shaving gorillas and then headed out.

After Taplow, Chris & Thomas headed off to Wyreemba cave as part of Thomas' accreditation as a Cliefden trip leader. Seeing as there was still some day light left Alison and William decided to join them. After a pleasant drive down to the river it was time to find the cave. After a few false starts we eventually found the cave. William was the last in and decided after a short squeezey bit it would be more enjoyable to relax on the surface and take some photos after the previous tiring trip for someone who has not caved in a while. It wasn't long before the others surfaced after discovering the cave wasn't very exciting at all and encountering some foul air. It was decided to embellish our exploration and the cave features for the benefit of those who had remained in the hut.

Tony also went fishing and caught some watercress, to sell at an expensive Asian grocery store :o)

Back at the hut, everyone had their dinner, then the entertainment started, with MKR SUSS version, featuring Alison, Denis and Thomas trying to make crepes. Oh the drama! Not to mention more of Chris's fine story telling that had us all enthralled about previous trips and **shenigans** including rescuing a floating Subaru on one trip.

Sunday 31st March Happy Easter!

After a few yummy chocolate eggs, we tackled Murder Cave. Kevin stayed back because he remembered not being able to go the whole way through. I said I would give it a go anyways.

Murder Cave was great! We saw the Dragon, the Pineapple, and the famous Blue Sral I must say, for the amount of hype that surrounded the Blue Stal, I was expecting a ginormous blue stalactite that would be really easy to find. . . The real one was just as beautiful, but it certainly wasn't as big as I thought ;o)

We sat down for a break, and talked about Chris's Japanese skills. Turns out all he can say is 'My hovercraft is full of eels'. After a few giggles we separated, and left Denis and Alison to continue a dig, I went back to the hut. William put forward the idea of heading into the local pub for dinner, this idea was quickly adopted by Tabitha who began the call around to see if any were open - unfortunately not, so we had no excuse but to go and do some more caving.



Relaxing in Mud. Photo by Tabitha Blair

For the brave few still standing we decided to go to Molongulli. Chris and William would rig the cave and go through followed by Thomas, Denis and Alison after their dig. Well this cave certainly was a challenge for a cave that is only about 200m long but manages to go up and down like a yoyo. After reaching the main room and taking one look where the Nazgul was located we decided to continue on to set up a tape. After Chris voiced that to set up the tape we had to do some free climbing that he wasn't terribly fond of, William volunteered to help. Unfortunately this was not too successful and required the expertise of Chris. The next part of the cave was hell for William who found it extremely difficult to get traction with his gumboots which seemed to be covered in dish washing liquid. After more cursing, sliding, pfafter and crawling in mud we finally made the loop back to the start. William summed up the cave as "Death, but fun in a perverse exhausted way". Just before exiting up the ladder we discovered Thomas and Alison entering the cave enquiring if we had rigged the tape in the cave for them. After all digging they were hoping to skip the cave & return to the hut they were not so lucky. Upon reaching the surface, Dennis asked William if the cave was wet as it looked like he had just returned from the shower, nope that was just a sign of how much fun he had traversing the cave (in comparison to Chris who was barely dirty and looked like he had taken a stroll in the garden).

That night we listened to the vast variety of Chris's iTunes library, loads of mash ups and strange music. We also watched the next instalment of SUSS MKR - more crepes which were actually quite yummy!

Monday 1st April



Helictite Wall. Photo by Tabitha Blair

Reaching near the end of the long weekend we decided to tackle 2 more caves before heading home. First was Trapdoor which was a great little cave to explore and help develop Tony's climbing and overcome his fear of heights.

Next we proceed around the hill to Yarrawiggah which was another enjoyable cave with a rather challenging vertical squeeze. To our delight we reached the chamber where the original entrance was straight down a small hole in the ceiling. Upon entering the room we were confronted with a very strong aroma and copious amounts of flies. After discovering the cause of this (a dead animal which had fallen through the upper entrance) we decided not to go any further and get out of there quick smart. Arriving back at the hut we had discovered that Tabitha had done most of vacuuming and were delighted with this, it wasn't too long before we were homeward bound.

CAVE DIVING IN MCCAIVITY AT WELLINGTON CAVES

BY DEBORAH JOHNSTON

April 20-21, 2013

Participants: Deborah Johnston, Greg Ryan and Rod Obrien

“With a bit of luck, we should be there before 11 tonight”.

Wait, what? That was 5.5hours away! Rod Obrien and I had hit the road bound for Wellington Caves nice and early, but with that sentence I immediately realized that I had totally forgotten how far away Wellington was from Sydney having only visited once before years earlier to help Keir Vaughan-Taylor and Ian Cooper with their excellent Anticline Cave project.

The trip was uneventful, although I raised an eyebrow at Rod’s choice for dinner in the dingiest looking pub in Bathurst. This turned out to be a fantastic choice as the nights entertainment (for a crowd of about 8) was a scruffy teen with an acoustic guitar and a simply amazing singing voice. Most entertainingly, he sung notoriously crude hiphop lyrics, but in a soulful romantic style. I think I was the only person who noticed the lyrics though as the little old laddies and gentlemen tucked into their \$10 schnitzels without a sideways glance. We were later told by a few proud locals that he was on a singing talent show, ‘the voice’, where he was being coached by famous singer Seal. Leaving Bathurst, we plodded on for our destination located between Orange and Dubbo, arriving right on cue at 11pm to check into our surprisingly spacious cabin in the onsite caravan park.



Greg runs a safety guideline. Photo by Rod Obrien

Wellington Caves is internationally recognised for its mammal fossils. The first Australian marsupial fossils were discovered at Wellington in 1830, four years after the first recorded visit to Cathedral Cave (then referred to as Mosman’s Cave). Bones originally collected from Breccia Cave were first thought to be from elephants, but then recognised as the extinct relatives of modern day marsupials. The specimens gathered onsite guided scientific research in the field across the world throughout the 19th Century, including most likely Charles Darwin’s 1859 ‘Origin of the Species’. Visitors are reminded of this history today with a giant Diprotodon sculpture greeting them at the entrance that seems to beg being climbed upon which is unfairly not allowed.

SUSS has dominated exploration and discovery at Wellington Caves with the SUSS cave divers getting together in the late 1980s and visiting Limekiln Cave (then referred to as Peppercorn Cave) which had been discovered in 1858 but not fully explored. The divers quickly discovered the hundreds of meters of submerged passage which made it the largest cave in the area. During this time, SUSS cavers also learned of a ‘Water Cave’ listed in an old council survey map which had since been covered over. SUSS was able to convince the powers-that-be to let them use a backhoe to dig up the center of the caravan park in 1988, unearthing the anticlinal roof of the cave which was dug out and stabilized by dedicated SUSS cavers over the next couple of decades. Anticline cave is now a tourist attraction for the park with public access via a fence, and future plans to build a pathway for visitors to reach a platform inside the cave overlooking the lake beneath.

Early on Saturday morning we were joined by Greg Ryan and all underwent the tradition gear pfaffing, also known as the ‘what did I leave at home this time?’ game. I had left Rod’s favourite regulator behind which earned me maximum shit-list points in the game! I had also most embarrassingly left my shoes and overalls in Sydney. I briefly considered wearing my dive booties but they seem to disintegrate a bit more beyond my eyes on cue, leading me to grab some Target fashion gumboots and a \$7 jumper in town after our leisurely cafe breakfast.

Greg then dropped in on the friendly Wellington staff who grabbed a stack of keys from the casual guide not working that day, and handed them over so we could park near the entrance to the old Phosphate Mine only a very short distance from the Limekiln entrance. This prime parking had the added benefit of being able to change into our wetsuits and dive booties on a tourist path, thus avoiding most of the evil burrs that cover nearly every inch of the campground.

Rod and Greg had mentioned a couple of times that we would have all our gear, a total of around 11 full packs, down to the water in 10 minutes or so. I was skeptical, but then quickly realised that Greg



SUSS - in it for the fashion. Photo by Deborah Johnston

definitely knew what he was doing when it came to this cave! The guys grabbed two aluminum work ladders, both the perfect heights, and some truck ratchet straps, and about 10 minutes later we had moved the gear and ourselves down to the water as promised.



Greg and Rod inspect skeletons.
Photo by Deborah Johnston

Our entrance into Limekiln cave was via a short vertical drop, a deceptively slippery slope, then another short drop to a medium sized chamber where we got our gear organised. This was made luxurious by the large ground sheet Greg had brought to keep ourselves and the gear mostly clean. After getting into our wetsuits and drysuits fully, we then chained the tanks down a short crawl and awkward drop to a cosy chamber (fitting a maximum of two people) which revealed the dramatically small entrance to the water dubbed 'the birth canal'. This is the typical entrance to the underwater sections of the cave, although there are at least two other chambers that can be reached by both divers and dry cavers. The submerged section of Limekiln cave was called McCavity to help distinguish it from the dry upper sections. Greg

informed us that the name 'McCavity, the Mystery Cave' was given by Simon McCartney who had been inspired by T.S. Elliot's character 'Macavity the Mystery Cat' (popularized in the musical 'Cats').

Because of the lack of airflow through this section of cave, and the vegetation that washes in, the lower sections were noticeably stale with elevated CO₂. Being the club canary with my lack of tolerance to CO₂, I quickly felt very hot and clammy which my heart and respiration rate increased noticeably. I wanted to get in the water and breath from my tanks as fast as possible, but being flustered only slowed things down as usual. Rod Obrien has an air consumption rate that seems impossibly low (indeed some suggest he only breaths from his tanks when people are looking!) so he was sent in the cave first to wait while we each spent around 10 or so minutes entering one at a time. He clipped on one tank and went to slip through the restriction, appearing far too large to ever actually fit. As a commercial diver by trade, and our country's top cave diver to boot, Rod has made a habit of proving the seemingly impossible as possible, and with a few strategic wiggles he was through. We passed down his freaking lazer beam (or was it a dive torch?) and his other tank and he disappeared down into the submerged section of cave to wait.

I was next, and got ready to go with my fins down the hole then swiveled to reach for the last item required, my trusty dive mask. I found the mask immediately, unfortunately I found it with my palm promptly shattering the tempered glass into about 100 pieces like some sort of evil kungfu master. Wait, is that even a thing? Who does that! Yes, it is a thing, and I did it.



Dive Mask remnants.
Photo by Deborah Johnston

Mindful that Rod was under the water depleting his air supply, Greg and I hurriedly collected the bits of glass with our surprised expressions remaining constant. As Rod and I later reflected, we had all but guaranteed that one of us would lose or smash a mask according to 'Murphy's law' because on this trip - for whatever reason - each of us did not take a spare mask for the first time that either of us could remember. Luckily Greg does not tempt fate with foolish shortcuts and promptly produced the spare mask that he had brought right into the cave. After some quick adjustments to Greg's non-stretchable neoprene mask strap and I had it on my face and wiggled down the hole. Although smaller in size than Rod, I made fitting down the restriction with a tank take 10 times longer and look 100 times harder than he had.

During our visit the water began around 15cms below the bottom of the restriction which is considered a very low level for the cave. At times the whole squeeze section is totally submerged and most groups carrying in an extra air tank with a long hookah hose that divers can breath from before being passed their own tanks to clip onto their harnesses. Because of this I found it very comforting to know that I could negotiate the squeeze into the water with one tank clipped on, however I recognised that climbing back up the squeeze with a tank on would be absolutely impossible for anyone.

Once in the welcoming 19 degree water, I struggled to seal the mask unsuccessfully with the top half completely fogged, and the bottom half persistently flooding with water. I realised that if I was going to call the dive, I'd need to do it in the next few minutes before Greg entered the water. I persisted with the loose mask a minute longer then popped my head back up the hole just in time to block Greg's feet from coming down! I later reflected on how much pressure I had felt to 'soldier on' despite the mischievous mask, however it is important to note that this pressure was entirely internal as all the SUSS divers maintains as a 'golden rule' that anyone can call a dive, at any time, for any reason. As the wise divers will always say, you never get just one thing that goes wrong and that one thing invariably leads to another, and another. I had learned this lesson the hard way once before as an even more novice diver and always try to remember how seemingly little problems can launch you headfirst into trouble when ignored.

With this on my mind, Greg pulled my tanks back up for me and then hopped in the water while I went for a cup of tea and a bit of a sulk. Because I had missed that dive, I was pretty sure it was the best dive anyone has ever done, ever! During my interval, some kids spotted my helmet and gumboots and asked me if we were looking for dinosaurs in the caves. I told them “well kids, I won’t tell you that we are NOT looking for dinosaurs!!” which was badly received by their parents who probably had to become dinosaur experts answering questions for the rest of the weekend.

As the guys finished up their hour long dive, Rod retrieved a weightbelt from immediately below this section which contained more than twice the weights you would expect for this dive tucked away in it’s pockets. He was delighted because he had just broken the zip on his pouch-weightbelt and this would be a perfect replacement. Unfortunately though, Greg knew the group that had dropped the belt back down into the water after having packed up everything else for the day, so we took it out to return to them (hint hint: Rod drinks Tooheys Old!).

After some more cups of tea and a tank refill for the guys, Rod and I head back into the cave for my attempt two that afternoon, with Greg helping us move the gear and putting his tanks in position for the next morning. I had adjusted Greg’s spare mask to achieve a seal from the water, but unfortunately the cave was still playing hard to get and I saw next to nothing as it fogged up within seconds of being cleared. I did however get to hear a lot of the dive, with periodic expressions of frustration from Rod who was trying to film sections of the cave with the most unhelpful dive model of all time! Greg was waiting at the hole to capture the traditionally unflattering photos of us struggling back out (complete with a leg cramp) and we pulled our used tanks out to finish off the day. All negatives were forgotten that night as Greg cooked up a storm for everyone that evening.

The next morning we treated the mask for fogging and attached my old flexible strap, then we all headed back in again for round three on Sunday morning after playing the “whose wetsuit smells most toxic” game. Rod again wiggled down with one tank on while I opted to have both of mine passed to me once in the water, and to my delight the mask was perfectly sealed and crystal clear! First we looked at the syncarids, small crustaceans that live near the air chambers of the cave and are regarded as “living fossils” and get scientists all hot under the collar. After admiring these ugly little white crawly things, Greg then led the way for a grand tour of the cave.



Greg and Deborah admire the beautiful decoration. Photo by Rod O'Brien

build up of some black residue which I assume is bacterial. While this cave is only shallow, with a maximum depth of around 8 metres (in current water levels), the passages are up to around 20m wide in places.

You could tell when approaching ‘Bondi Beach’ (an area many dry cavers would have visited which can be reached from the surface via an alternative route) by the mountain of bat guano built up on the floor below. Despite our careful maneuvering, the shallow depth meant it was difficult to avoid stirring up swirls of the poo which swooshed around us along with plumes of yellow snotty bacteria. We popped up into the air chamber and were startled by many more bent-wing bats than expected. There were numerous other opportunities to poke our heads out of the water into heavily decorated air spaces throughout the cave, but most of these had toxic concentrations of CO₂ which meant keeping the regulators in our mouths to continue breathing from the tank was essential. Near ‘Bondi Beach’ we also saw many curvy tree roots which had made their way down from the surface, with the larger clumps accumulating sparkling layers of fallen calcite raft.

Perhaps the most exciting feature of the cave is the tiny skeletons that can be stumbled across when looking around carefully. Some appear to be tiny quolls which are probably thousands of years old, while near the entrance you have more recent skeletons which have washed in, including two little frogs. I don’t believe anyone has systematically documented and dated these skeletons but it would make for some interesting research.

McCavity was once a dry cave, and a beautifully decorated one at that. Most of the walls contain large sheets of flowstone, cave coral and what looks like moonmilk. Everywhere you look you can also see rimstone pools, columns, shawls and stalactites, with amazing helictites hiding in clusters on the roof as well. For reasons not yet known, this cave then flooded and is now completely submerged with water that is still, and mostly crystal clear. This has created a new feature of the cave as where water surfaces meeting air chambers a build up of calcite rafts occurs, eventually becoming too heavy and sinking which results in giant mounds of calcite piled up on the cave floor below. Interestingly it is noticed that none of the formation seemed effected by being submerged, besides some features sporting a



Undated skeleton deep in the cave. Photo by Rod O'Brien

BORENORE 20-21 APRIL 2013

BY KEVIN MOORE AND ROWENA LARKINS

Participants: Ian Cooper, Kevin Moore, Phil Maynard, Nancy Yu, Tabitha Blair, Rowena Larkins, William Slee + Izzy

Borenore has a special place in SUSS history, as it was the destination for the first SUSS trip, when Jak Kelly and a small band of early SUSSlings purloined a rope and hopped the Western Mail in search of adventures underground. In the days when a student vehicle was a good pair of walking shoes, it had the advantage of a nearby railway station.

It isn't one of the famous areas, and these days Borenore trips are usually combined with Orange Gourmet events: in this case, F.O.O.D. week. This time however, Coops had a plan: Cathedral cave, which he had been mentioning as a good place to visit. Those who had allowed good food and wine to expand their waistline over the years were warned that there was a bit that might not be negotiable.

Those who came early attended a movie night at Orange Mountain winery. The Shiraz Viogner and curries went down particularly well, as we watched a Laurel and Hardy short, and the 80s flashback nightmare that is "Starstruck". Those of us that remember the 80s had some difficulty persuading the younger members that people really did dress like that. The rest of the group had duly arrived by the time we got back to Coops' place.

Next morning, we drove out to Borenore. Coops had a vague memory of where Cathedral Cave was: halfway up a hill, with a panoramic view of the car park. This was clearly an old memory, as the hillside that presented itself was well wooded with sparse scrubby stuff. The team settled in for some surface trogging. The first entrance we found looked promisingly like a cave, until you tried to go in. Some desperate from OSS had tagged it, but it was clearly not the one, and we were clearly too far up the valley.

We searched around further, and doubled back a bit, and eventually found another cave, this time with a gate in it. Coops looked at it dubiously: it clearly wasn't fitting his memory of the cave, and the car park was nowhere to be seen through a wall of scrub. A couple of us went in for a look while the rest joined Coops in search of the real one. Ten minutes later, we had to call Phil out of the cave, as Rowena had found the real one.

The real one is halfway up the hill, has a short shaft entrance, and a sort of glimpse of the car park through a gap in the scrub. The cave itself is reasonably extensive, but a short way into the cave there is a slot in the floor, which is the way on. Coops had a go, and was reminded of the passage of time and the effects of good food and wine. It looked like this time I'd have someone to talk to on the wrong side of the squeeze.

Rowena With my medically-induced-svelte figure I was selected to adventure the vertical squeeze. I slipped through with ease and Ian told me the way on was to the right. I passed down a 45 degree rock pile that was crouching height and came to a room with a dry streamway. The smooth mud floor told me that no-one had been through here since the last time the stream had flowed. The walls were well decorated with pristine flowstone and amazing helictites. I called back up to the group waiting behind for them to send down small people, like Nancy.

Nancy came down and together we admired the walls and decoration. The tent pegs lying loose on the floor, and the tangled lengths of cord, indicated that someone had put trail marking out, but it had been washed away in the recent flood. There were also survey markers in the floor, numbering from 15 to 9. Where were the lower numbers?

Helen and I climbed a mud bank and were stunned to see Izzy looking up at us. We had come in a circle and were back at the crouch passage.

We were about to show Izzy the decorations when a Phil appeared. It seemed no-one else was letter box sized enough to get into the room.

Phil did the loop and while he was admiring the decoration I spied a small hole heading down a rift. I called back to Phil that I was heading down the hole, and poured myself into it. I was in a rift and could see another survey marker ahead. I told the others I was heading on, and Helen decided to pour herself after me.

The rift was one of several fingers radiating out from a central point. The passage led down from the hole we had scrambled through. There were several other fingers heading up passages, which we checked out, as well as a passage heading down. Just as we thought we had come to the end, a twisty rift could be spied continuing. We kept going down rift after rift, each with its own finger set, and came to a phreatic tube going down. Knowing that there was just the two of us, that it was Helen's first cave, and there was a crowd of people getting bored on the other side of the verticle squeeze, I made the call to keep some mystery about this cave and check out the tube next visit.

We re-traced our steps and at a junction I asked Nancy if she remembered the way out. She chose a passage which I knew was wrong, but as we had not been up it before I decided to see how far before she realised it was the wrong passage. At the blind end she wondered aloud where to go, and I told her it was not the way out.

I led her back and up a different rift to the way out. At the end of this rift was the climb up to the chamber, but the climb seemed a lot harder than it did on the way in. Eventually I managed it and, on turning a corner, found myself in a well decorated room that I had not been into before. Stunned I retraced my steps, went back down the climb and pondered. Where had I taken a wrong turn? I then went up a different rift passage and spied an easy climb. Nancy and I both got back up this climb and were back in familiar territory. There is much to explore in this cave.

We had no trouble getting back up the vertical squeeze, and rejoining our comrades, where we headed out of the cave and off to a vineyard for a BBQ lunch.

Kevin The Orange Highlands winery, to be precise. A fine selection of gourmet sausages and other tasty goodies presented itself, and the team settled down to a late lunch and a wine tasting. A few purchases made, we headed down to Cargo Road. Disaster!



***Nancy, Traversing Tunnel Cave, Borenore.
Photo by Rowena Larkins***

The venison pies and the coffee machine were in a tent at the Forage event. The wines were still on, so we spent the afternoon there, before heading down to Canowindra for the ballooning event and markets.

The market area was terribly crowded, and the queues for food and coffee lengthy. Many of the stalls had clearly not expected the numbers. We certainly hadn't. We managed to get some food, and went over to the oval where the balloonists were inflating their balloons. The wind was getting up, which must have been a worry for them. After the balloon glow, we found Nancy, who had escaped the crowd, and headed back to Coops' place.

Sunday was farmers' market day. Breakfast at the markets: all of the things we would have liked to have at Canowindra were available, with much shorter queues. Venison pies, bacon and egg rolls, baklava, and coffee. I had a brush with fame when Kate Bracks (MasterChef) mistook my bag of shopping for the ingredients for her cooking demonstration while I was distracted by a coffee purchase. Having rescued my purchases, we retired to the relative safety of Borenore caves.

Tunnel cave is a through trip cave, which is well trogged by the locals, and colonised by bats. New signage has been put in by the National Parks people, closing the cave during the bat hibernation period in the winter. Tunnel cave makes a good morning trip for beginners, with a nice rift section in the middle to keep them on their toes, and plenty of side passages to send them up for a look. Tabitha particularly enjoyed the rift bit, while Nancy was off everywhere with boundless energy. We found a room in the middle of the cave and switched off lights, for the beginners to experience true darkness and to give the bats a chance to feast on the flies that had followed us into the cave.

The next stop was the Verandah, which is just over the hill from the exit. The Verandah is an overhang at a bend in the creek, rather than a cave, but is an interesting karst feature to visit if you're in the area. It's quite a large and aesthetically pleasing overhang at a bend in the creek.

Last stop was Orange Mountain wines again, for a bit of wine tasting before lunch at Coops' place and the trip home.

REPORT ON CAPEERTEE NATIONAL PARK TRIP

BY AUTHOR: MIKE LAKE

Date: 15 December 2012

Participants: Mike Lake SUSS, Phil Maynard SUSS, Joe Sydney HCG, Bob Kershaw ISS, Jim Crockett MSS, Harry Burkitt NHVSS and Central West Caving Group members; Peter Dykes, Kaleb Powell (PD's grandkid), Dillon Powell (PD's grandkid), Haley Bambridge and Verna Iles.



**Peter Dykes, Joe Sydney, Jim Crockett, Phil Maynard, Vera Iles, Bob Kershaw, Kaleb and Harry Burkitt.
Photo by Mike Lake**

This was a joint trip with Central West Caving Group (CWCG), Highland Caving Group (HCG), Illawarra Speleological Society (ISS), Metropolitan Speleological Society (MSS) and Newcastle and Hunter Valley Speleological Society (NHVSS).

We all met at the campsite by the Capertee River. There was hardly any water in the river at all and no flow was visible. We had a short planning session to work out the days activity which was to locate caves in the southern section of the park, to relocate Armstrong Osborne's features noted in his paper on the area and especially to get GPS coords for all noted features. Many of us already had a GPS list of some features.

Phil and I took Joe Sydney to just north of the campsite and way up a steep hillside to show him the horizontal entrance of a cave in really crappy limestone that had been shown to us by David Noble in 2010. The entrance is about 1 metre square and the cave goes into the hillside for about 20 metres. No breeze or likely prospects though. Joe got a GPS

reading for the cave and we all headed back to catchup with the others.

Aside: 2010 was the year that new Capertee National Park had been gazetted and within a few weeks SUSS was there. It was on that trip in 2010 that Dave Noble happened to be there laying 1080 baits and as he knew Alan Pryke, Phil and myself he kindly showed us around and pointed out quite a few karst features to us for investigation.

Some of the karst features tagged on this trip are listed below. Cave prefixes are CV as this area is in the Capertee Valley karst region. Armstrong's feature list uses the prefix PM as he did his report when the area was still known as "Port Macquarie", before the owner sold the property to the NPWS. GPS locations for these features are held by Mike Lake and other clubs that were on this trip.

- CV12 Flowing spring
- CV14 Fossil tufa deposit (Armstrong's PM 9)
- CV15 Mike and Jill's spring,
tag on rock on RHS of track several metres before spring.
Flow about 1/4 BPM (buckets/minute)¹
- CV16 Doline (Armstrong's PM 10)
- CV17 Doline, about 15 m across, outside caretaker's house,
star picket placed in centre of doline.



Mike and Jill's Spring. Photo by Mike Lake

1. In speleology water flows are generally measured in cumecs. One cumec is one cubic metre of water per second. However given the accuracy of my estimate I'm using an alternative and appropriate measure of discharge.



**Harry, Peter and Joe at CV14, an old tufa deposit.
Photo by Mike Lake**



**Another spring just several metres from the doline
CV16. Photo by Mike Lake**



CV17 doline. (Personally I would not have placed a picket in the doline; someday someone will come with a tractor to slash the long grass). Photo by Mike Lake

PICTURE GALLERY



Will and Izzy, SRT training, Mt York. Picture by Nancy Yu



Hells Gate, NZ. Photo by Alan Pryke



Waterfall Outside Cave, NZ. Photo by Alan Pryke

THINGS TO BUY

For postage and handling costs and the details of how to order go to the SUSS website <http://ee.usyd.edu.au/suss/> and click on "Publications". There you will also find a range of must-have maps and other publications.

Maps and Bulls on DVD

The entire SUSS cave map library of over 300 maps is on DVD and available for purchase. Our map library was scanned to provide wider access to the maps for SUSS and other ASF Caving Clubs and to ensure that many copies exist in the event of the loss or damage of the originals.

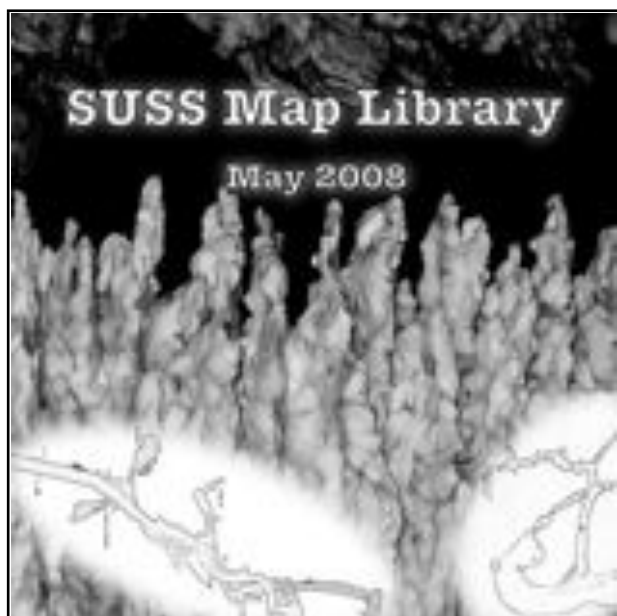
There are field sketches, ink maps produced on drafting film, ink maps produced on linen, as well as some of the latest digitally-produced cave projects. The DVD also contains all SUSS Bulls in HTML format from 35(1), July 1995 to 47(4), March 2008 and SUSS Bulls as PDF format from 42(1), April 2002 to 47(4).

Price is \$25.00 + PH. Pick one up at the next SUSS meeting or if you can't make that then contact the treasurer and they can supply you with the SUSS publications fund bank BSB and account number for a direct deposit.

Tuglow Caves

By Ian Cooper, Martin Scott and Keir Vaughan-Taylor. 1998, 70 pages.

Examines caving procedures, site descriptions, history, biology, surveying and maps, geology and hydrology of Tuglow Cave and others. Cost is \$13 for members and \$16 for non-members + PH.



A must-have reference DVD for all cavers



The Caves of Jenolan, 2: The Northern Limestone

Edited by Bruce R. Welch. 1976, 140 pages.

We still have some copies of these books left. Contains maps and descriptions of many caves in the Northern Limestone section of Jenolan plus notes on the history of Jenolan and its geology, geomorphology and hydrology. Cost is \$8 for members and \$10 for non-members + PH.

TRIP LIST: JUN TO SEPT 2013

SUSS General Meetings are held on the first Thursday of the month at 7:00pm (for a 7.30pm start) in the Common Room in the Holme Building at the University of Sydney.

For updates to this list, check out the SUSS Website: <http://suss.caves.org.au>. Detailed information on each caving area (plus other useful information such as what you will need to bring) can be found in the *Beginner's Handbook* section of the Website.

Please Note: it is YOUR responsibility to inform the trip supervisor of any relevant medical conditions which may in any way affect your fitness, such as asthma, diabetes and the like.

Jun

1–2 Jenolan. Our regular haunt! Stay at the luxurious cavers' cottage. Wet caving as well. Contact Rowena: rowena1234@hotmail.com

6 General Meeting. Holme Building, 7.30pm. Thomas Cunningham will describe his experiences in Chillagoe.

8–10 Wee Jasper. Staying in a cottage, and exploring the caves of this scenic southern highlands area. Abseiling experience essential. Contact Chris: chris.norton@fjc.net.au

15–16 Wombeyan. Beautiful caves in the southern highlands Contact Phil: philip.maynard@uts.edu.au

22–23 Wyanbene. A decorated, sporty cave in a remote area of the southern highlands. Contact Will: william_slee@hotmail.com

23– July 7 Camooweal. This interclub trip SUSS, CEGWA and ASFCDG will be exploring and mapping virgin cave at Camooweal in QLD. Experienced caver and cave divers welcome for exploration and surveying. SRT skills essential. Contact Deborah for more details: birinxi@gmail.com

July

Jun 29– July 7 Jenolan. Our regular haunt! Stay at the luxurious cavers' cottage. Contact Thomas: tcun0287@uni.sydney.edu.au

14 Training day. Learn the ropes in a safe environment - Contact Tabitha: tabspeanut@gmail.com

20–21 Wombeyan. Beautiful caves in the southern highlands Contact Rob Jones: rob@robjones.org

27–28 Canyoning. Maybe wet, maybe dry, come Winter canyoning and find out - Contact Alison: a.d.chau@gmail.com

Aug

3–4 Jenolan. Our regular haunt! Stay at the luxurious cavers' cottage. Contact Maddie: m.logan330@gmail.com

10–11 Tuglow. Vertical caving, decorated chambers, streamways with waterfalls, this cave has the lot - Contact Denis: dstojanovic91@gmail.com

17–18 Wombeyan. Beautiful caves in the southern highlands Contact Will: william_slee@hotmail.com

24–25 Bungonia. Easy caves, hard caves, horizontal caves, less horizontal caves. Contact Jack: jack.wachsmann@gmail.com

31– Sept 1 Jenolan. Our regular haunt! Stay at the luxurious cavers' cottage. Contact Alison: a.d.chau@gmail.com

Sept

7–8 Watch the SUSS web site trip list for details of this weekends activity.

14–15 Wombeyan. Beautiful caves in the southern highlands Contact Rob Jones: rob@robjones.org

21–22 See the SUSS trip list for what surprises will be this weekend.

28–29 More surprises - check the SUSS web site.

Oct

5–7 Yarrangobilly. (TBC) Keep an eye on the SUSS web site for confirmation and contact details.

12–13 Jenolan. Stay in (you guessed it) the luxurious Cavers' Cottage. Contact TBD.

19–20 Wombeyan. Beautiful marble caves in the Southern Highlands. Scenic campsite with a chance of ground-breaking discoveries. Contact TBD.
