

DETERMINATION: Conservation and Management

In the 1960s conservation gradually gained momentum among speleologists against a background largely of community indifference. The 1970s in particular was the decade when ASF members first became closely involved in major conservation issues. Throughout that decade conservation dominated whole issues of ASF Newsletter, editorials were frequently being used to stir more action, and we became more adept at using the media to spread our message. This continued in the 1980s but by then ASF had also moved to building a recognised capacity in an advisory role, establishing a Cave Management Commission as well as a Conservation Commission, preparing consultant reports on a number of cave and karst areas.

1. Editorialising – “stiffen the sinews, summon up the blood ...”

A Word from the President

Elery Hamilton Smith

ASF Newsletter 53 (1971)

Conservation continues to be one of the major issues facing Australian speleology. This is not just because we have become more aware but rather mining is booming and like all booms, it is running an extremist course. Colong and Mt Etna are known to all of us, Marulan and Buchan are now moving into the limelight. Some Tasmanian areas are threatened and the most recent news includes a possible threat to the fabulous caves of south west Western Australia. There is little doubt that caves are under heavier threat than ever before in this country. This brings me to the few points which I think are important to us all.

We must firstly give very careful attention to the validity of our own arguments. The mining industry recently comforted us all by pointing out that their operations affect only 0.02 percent of Australia's land surface and by highlighting their rehabilitation of mined areas. Their arguments are valid in some situations but where limestone is concerned they are sheer nonsense. The unfortunate reflection is that I have often heard conservationists use the 'gross percentage' kind of reasoning. So perhaps we are hoist with our own petard.

Secondly, we have given inadequate attention to the fact that a cave or cave area is only part of a much wider natural and environmental system. Lloyd Robinson pointed out in a recent letter how the south western caves could be damaged by mining in surrounding areas, not by or during the mining, but by long term changes in the total environment resulting from the mining and accruing of years afterwards. Almost on the same day I received details of the threat to the unique Devils Hole Pupfish of Nevada, which has survived since the Pleistocene in a single isolated colony; it is now threatened with extinction not because of direct damage to Devils Hole but because of the accumulated effect of irrigation pumping many miles away.

Finally, I am deeply concerned about the way in which we are often delayed and disadvantaged in conservation arguments by finding ourselves without adequate records or maps of our own findings. We cannot afford to wait until an area is threatened to accumulate and systematically record information. This must be done over a long time and in a systematic way. We must not depend on data hidden away in personal memory or personal notes, but rather upon adequate formalized records which turn our exploration into hard data to support any argument we may later have to mount.

Editorial

John Dunkley

ASF Newsletter 52 (1971)

In May I spent a profitable day at the Mining Wardens Court in Sydney, listening to the great Bungonia case. It was historical litigation: for the first time ever the “public interest” was being proffered in objection to a mining lease application. Australian speleology can be proud that it has members like Warwick Counsell (UNSWSS) who are prepared to take on the largest business firm in this country, one which loudly trumpets its concern for the environment it helps destroy. The full, unbiased, first-hand report within.

Editorial

John Dunkley

ASF Newsletter 58 (172)

Just as the last newsletter was about to go out, the news arrived of the signal victory in the Bungonia case. This was a fine tribute to Warwick Counsell, to his unflagging energy and full-time devotion.

But at least Warwick is fighting in a state which is increasingly environment conscious, wealthy enough to afford the middle-class ethic of conservation in a pure non-materialist form, and sufficiently farsighted to see the short-term opportunity cost as an investment. Support came from around the country, as it did in the Colong dispute, and interstate cavers awaited the outcome as though it were a local affair.

Ten years ago, even five, it is doubtful that cavers in one state know much of developments in another, much less understood the implications. This newsletter has in recent years increasingly concentrated on conservation issues, especially the remote ones. The Newsletter, and the Australian Speleological Federation fulfil their function well if they stir people to action not only over the here and now, but also the there and later, over South-west Tasmania, Nullarbor, Fanning River. But we cannot rely forever on the Aslins, Shannons, Grahams, Kevin Kiernans and Lloyd Robinsons to do the work. Most worthy causes start off with a minority of one supporter, but you can't in the final analysis win without some organisational backing. The embarrassing plethora of single-cause conservation bodies around Australia provide grass roots support but can be exploited by their opponents. We need a way of organising cavers to action over Precipitous Bluff as well as Bungonia.

Letter to the Editor, "Sydney Morning Herald"

Warwick Counsell

ASF Newsletter 60 (1973) (published in SMH 15/6/1973)

Senator Wriedt, Minister for Primary Industry, claims (Letters, June 7) that the NSW Minister for Conservation, Mr Freudenstein, is using scare tactics to hasten commencement of work on Pike Creek Dam.

This is not surprising because Mr Freudenstein's statement "we cannot afford to delay commencement of the Pike Creek Dam" reflects the alarm which must be shared by the majority of Government politicians in this state and in Queensland.

The first independent economic assessment of the dam project, by Dr A.J de Boer of the Department of Agricultural Economics at the University of Queensland, condemned it and claimed that previous reports contained "gross errors and unjustifiable assumptions (and that) the costs are seen to far outweigh the benefits".

The Australian Government's enlightened approach to agriculture and the imminent publication of another independent (not Queensland or NSW Gov't) economic appraisal by the Bureau of Agricultural Economics may foreshadow refusal of Commonwealth finance for the dam.

It is to be hoped that the Queensland and NSW Governments, if forced to foot the whole bill, will abandon the project, save the Texas Caves from inundation, and preserve the area for the national heritage.

2. The Big Issues

Several major issues brought ASF and some members before the courts, which were not properly equipped to handle conservation cases until relatively recently, the odds being stacked in favour of development until quite recently. Indeed in the early 1970s there was not a single Minister for the Environment in any Government in Australia. In 1971 Warwick Counsell established a legal precedent by obtaining standing "in the public interest" before the NSW Mining Wardens Court but a similar argument in the Mt Etna case failed to move the High Court. In time we went to the Supreme Court in NSW and South Australia over Yessabah and Sellicks Hill, and to the Mining Wardens Courts in WA and Tasmania over Cape Range and Mt Cripps. We won some, we lost some, we had to abandon one, but the principle was that every issue fought, whether won or lost, made it that much less likely that another one would ever arise.

And then there was Mt Etna. We are able to include here only a few of the numerous articles about Mt Etna that appeared over a period of nearly 45 years. This was the longest running environmental dispute in Australia's history.

Cave Conservation in Queensland

Anon, # 17, 1962

In a recent issue of "Down Under", the University of Queensland Speleological Society supplied a brief report on a problem of cave conservation in the well-known Mt. Etna cave region close to Rockhampton. During a one-week visit to this area, society members saw quarrying operations which are endangering caves. Approaches to the Queensland National Parks Association and to the state Mines and Lands Departments are being made. The society would appreciate support from all possible sources.

MT ETNA

Ron Lorraway

ASF Newsletter 54 (1971)

UQSS and CQSS have conferred with the Queensland National Parks and Wildlife Association and others with regard to Certificate of Application for Mining Lease no. 899, lodged at Rockhampton on 30th July 1971 by Central Queensland Cement Co. The purpose of the application is for mining further for limestone on Mt Etna. It seems that the company is not about to give up Mt Etna. Objections are being lodged by UQSS and other conservationists.

(courtesy The Explorer 2 (4) : 1, Sep. 1971)

(postscript: the quarrying finally ceased at last 33 years later)

MT. ETNA CAVES & POLITICS

Glenn Pure

ASF Newsletter 80 (1978)

MT. ETNA CAVES – IS THE QUEENSLAND GOVERNMENT BEING UNREASONABLE . . . OR SIMPLY IMPOSSIBLE?

Some ASF members may not be aware of the Mt. Etna caves issue hence I shall give a summary in the first part of this item. However, the main purpose of this segment is to detail the Queensland Government's startling abuse of powers which recently stopped this issue from reaching the courts.

Mt Etna

Mt. Etna is a conical peak 24 kilometres north of Rockhampton and forming one part of a larger karst unit which incorporates nearby Limestone Ridge and several other features. There are 46 caves on Mt. Etna in the small area of about 12 ha making this mountain the most densely cavernous area in Australia. The caves are of particular interest as they are of the rainwater inflow type and not the classical stream type (1*, 2*).

Most importantly, Mt. Etna is a major bat maternity site. One small cave on the mountain is the sole maternity site crucial for the survival of 250,000 Little Bent-Winged Bats (*Miniopterus australis*) 1*. During the summer months when the cave is occupied by the female bats, the population is estimated to eat nearly one tonne of insects every night. Mt. Etna is also a haunt for the extremely rare Ghost Bat (*Macroderma gigas*), the Eastern Horse-Shoe Bat (*Rhinolophus megaphyllus*) and the Unpouched Sheath-Tailed Bat (*Taphozous georgianus*), (J.Toop, pers. comm., L. Hall, pers. comm.; 1*, 2*).

Sizeable populations of macropods reside on Mt. Etna (L. Hall, pers. comm.; 1*, 2*).

The past

On the 21st. February, 1920, an order in Council in the Queensland Government Gazette proclaimed that a small area 24 km north of Rockhampton and referred to as "Mount Etna Caves" be made a Reserve for Recreation. It seemed then that Mt. Etna had been recognised as an important recreational site and would be preserved as a part of Queensland's heritage. It was not surprising then that local residents were shocked when they learnt just 5 years later that limestone mining leases were granted over much of Mt. Etna and Limestone Ridge. Although these leases were never worked and were consequently forfeited, bat guano mining which had begun several years previously in some of the caves was causing increased damage which is still evident today. Guano mining continued for many more years before eventually ceasing.

The history of Mt. Etna has been a coloured one as it was threatened several more times by assorted limestone and guano mining operations. However, it was not until the middle of this century that the threat as we know it today, came into being. Seven limestone mining leases were granted over Mt. Etna and Limestone Ridge to Central Queensland Cement Pty. Ltd. during the period 1954 to 1973. Another lease was granted to Mt. Morgan Pty. Ltd. on Limestone Ridge.

In 1962 the U.Q.S.S. was formed and conservation activities began immediately. Despite several years of research, lobbying and publicity, mining operation started in early 1967. The limestone was transported from the rapidly growing quarry on the eastern face of the mountain, 18 km south to a cement plant on the northern outskirts of Rockhampton.

From 1967 to date, U.Q.S.S. activity on the issue has been intense. In the late sixties and early seventies there appeared to be considerable disparity in Government policy and considerable confusion amongst the public as to the future of Mt. Etna. In 1968, a Queensland Government Inter-departmental Inquiry, with representatives from the Mines Department, recommended that 31 acres, covering most of the caves on Mt. Etna, be gazetted as a national park. Albeit, it was in 1975 that a clear statement of Government policy was made. In the statement, the Mines minister, Mr. Camm, said that mining would be allowed to continue unabated on Mt. Etna while the three leases on Limestone Ridge would be surrendered pending gazettal of a national park over the same. Mr. Camm carefully avoided mention of the fact that this 'compromise' would allow the destruction of the 46 caves and the huge bat populations which are unique to Mt. Etna.

Suggestions of the existence of alternative limestone deposits to Mt. Etna have been denied, without supplying reasons, by the Queensland Government. Ironically, the Queensland Government recently granted leases over huge limestone deposits at Mt. Larcom, just 100 km south of Mt. Etna. Even more ironically, the leases were granted to Central Queensland Cement's parent company and the limestone is to be used for cement manufacture. The Queensland Government will not deny the findings of an economic report (3*) that the Mt. Etna-based plant is "grossly inefficient" and will be economically redundant when the parent company begins operation of its highly efficient Mt. Larcom-based plant – yet the Queensland Government continues to endorse mining at Mt. Etna!

The present

In Mr. Camm's 1975 statement to parliament he said "An over-riding consideration was that Central Queensland Cement Pty. Ltd. had a legal right to mine limestone at Mt. Etna under the terms of the leases already granted to it." Does the company in fact have an unquestionable legal right to mine?

Avenues of legal action were investigated and it was found that a genuine case existed questioning the granting of the mining leases over the recreation reserve on the mountain.

Because of the nature of the legal action, the Queensland Attorney-General's "fiat" had to be obtained before the challenge could come before the courts. After 19 months of stalling, the Attorney-General replied on June 24th., 1977 . . . "I am not satisfied that the action is one in which I should intervene. In the circumstances, I decline to lend my name to these proceedings . . ."

But just 6 days earlier, on June 18th., 1977, the recreation reserve which was the basis of the legal challenge and had covered Mt. Etna for the 58 years since 1920, was revoked!

Did the Attorney-General deliberately delay 19 months to allow time for the decision to be made to revoke the recreation reserve? It is unlikely that we will ever find out for sure because neither the Attorney-General will explain why he refused to grant his fiat to the action or the Premier explain why the recreation reserve was revoked!

The Future

The Queensland Government's policies and actions over the years on this issue leaves little to the imagination. They appear to have an unbending attitude that mining should continue at Mt. Etna no matter what the circumstances are. The future of Mt. Etna then must be decided solely by the company – will it continue mining until the mountain is destroyed, or will it stop operations before then for economic reasons as we have suggested they might? CAN WE AFFORD TO GAMBLE?

Help

You can help save this unique area by writing and voicing your opinion. write to:

1. Politicians that you consider appropriate (e.g. Qld. Mines Minister, Cl- Parliament House, Brisbane, etc.)
2. Newspapers:
 - a) The Australian, G.P.O. Box 4162, SYDNEY, N.S.W. 2001.
 - b) The Courier-mail, Campbell Street, BOWEN HILLS, QLD. 4700.
 - c) The Morning Bulletin, 162 Quay Street, ROCKHAMPTON, QLD. 4700.

References

1* Sprent, J.K. (1970) ed., "Mount Etna Caves", Uni. of Qld. Speleological Society.

2* Hamilton-Smith, E. and Champion, R. (1976) "Mt. Etna & The Caves", Uni. of Qld. Speleo. Soc.

3* Ware, J.A. and Metwally, M.M. (1975) "An Economic Study of the Queensland Cement Industry", Capricorn conservation Council. (photo-copied)

Mt Etna – The Battle Continues

Peter Berrill

Australian Caver 110 (1986)

Just a short report to let ASF know the CQSS is still active and desperately fighting for Mt. Etna. I (Peter Berrill, President) have just started (2 years) caving again after a spell of 8-10 years and can see no advancement on the Conservation issue after all this time. It is not for the want of trying by the CQSS and UQSS. The State Governments attitude to us is negative and the National Parks seem to be on the side of Central Queensland Cement!

CQC are presently mining a hill of limestone to the immediate west of Mt. Etna.

They have levelled this hill and are going to open cut mine. The open-cut operations have destroyed at least 1 known cave. This cave was found one night by the members and named "Crystal Cave". It has since been completely destroyed. It was photographed extensively because of the quality of cave decorations.

The formation in this cave would have equalled anything in the world. Quite a statement I know but I think it is true! The cave did not have a bare patch of limestone. It was too beautiful for words to describe.

The mining has about 2 years of supply left at their present site and we have stepped up the battle to try and force the issue, but as yet have had no official comment from the company. As for National Parks – well! They seem to be working against us. The Ranger responsible for Limestone Ridge National Park, named "Fitzroy Caves National Park" is not allowed to officially go on Mt. Etna and cannot make any statement on the issue.

When they exhaust their present supply of limestone the next area is the cavernous face of Mt. Etna. At this stage we don't look like stopping them. We, the UQSS and CQSS, have tried all avenues available but come up against a brick wall.

Our active membership only numbers about 12 and with limited numbers it is hard to achieve much.

As I previously said I have rejoined the club after a spell of some years and I am trying to regenerate membership and interest to help the issue.

We have been battling now for at least 20 years. It may be the longest running conservation battle in Australia and they are still mining away our caves and turning them into cement. We need numbers to help.

At this stage the only alternative left seems to be to go underground to stop them. This has been considered by a number of members, but is still only a personal issue.

In 1988 the Mt Etna issue, which had already been progressing for over 25 years, reached the High Court of Australia on a question of standing. It was referred back to the Supreme Court of Queensland, which awarded costs against members when Central Queensland Speleological Society had to abandon the fight. But in time there was a remarkable turning point. In 1999 reconciliation was reached between CQSS and Central Queensland Cement with the Company agreeing to drop all legal action, writs and costs against CQSS supporters, to donate \$100,000 towards purchasing Cammoo Caves for addition to the National Park, and to commit to rehabilitation of the quarry site.

The entire contents of Australian Caver 151 (2000) was devoted to the Mt Etna saga.

Angel or Ogre

Australian Caver 151 (2000)

Kerry Hamilton

The Central Queensland Speleological Society has had something less than an angelic public image these past thirty years. That isn't to say that we didn't have our support base obviously we did or this wonderful turn of events we celebrate today would not have occurred and the Mt. Etna Caves National Park would be a hole in the ground.

But this delightful outcome, this refreshing turn-around was not brought about by some Dick Smithian magnanimous gesture or by a sweeping move by a people's government anxious to score a few votes; no this was done by you and me, yes, the "little people" that we hear less and less of in these days of big and bigger government.

Can you imagine how it felt to be able to visualise today's occasion thirty-two years ago and needing to stand patiently by watching priceless natural assets squandered while we waited for public opinion to change as we knew it would? It had been changing rapidly all around the world. People were realising that the "dig it up – chop it down" mentality was a short-sighted approach with dire consequences for their children.

And so we waited, and waited some more. And while all this waiting was going on we pulled out our hair, we squabbled among ourselves, we fought vicious battles in "Letters to Editors", around the country, we hauled various "issues" before the courts even to the Holiest of Holies we went, the High Court of Australia. And it hurt, a lot. But what hurt most of all was the alienation, the being set apart from friends, from employers, from promotion and from family in many cases.

Being cursed with foresight had costs that our merry band of young bucks (and fawns) could not foresee. Yes, we had sage old elders too and it seems in hindsight, that they were well aware of what those costs might be, but simply knew there were no free lunches. For their patience, with us and advice to us, we are forever grateful.

Speaking of such things, let's go right back now, to a time when rank commercialism was under control, a time when folk gave more than lip service to their beliefs, to when the Olsen family were proudly showing off their caves to townspeople, who'd travel by buggy the bumpy two hours from Rockhampton. Yes, it seems that in the 1800s there was a greater appreciation of the wonders of nature. Else, why would our great grandparents have sought the highest protection then available to place Mt Etna and its caves under the Recreation Reserve that secured the mountain until the granting of leases to mine in 1962?

"There is a tide in the affairs of men", seems to have been a truth evident even in Shakespeare's time, now we too have seen a most providential turning to the point where we see the two protagonists in the "Mt Etna Issue" coming together in a spirit of reconciliation and understanding. No society remains static in its perceptions; we all come to see that some of our treasured beliefs don't stand up to continued scrutiny. We have in this hand-over today, proof that slow social change, though painful in the getting, is inevitable and unstoppable. Truth has won the day and healed the soul.

Postscript: In 2004 the Company approached ASF with a proposal that freehold title to 14ha of its land on Mt Etna, including two caves and a house, be transferred to ASF.

In the late 1970s the gates closed on the Serpentine Dam in SW Tasmania, and the real Lake Pedder disappeared. The next hydro-electric target was the Franklin – lower Gordon River system and several caving expeditions located caves along the river banks, including one discovered by Kevin Kiernan (Fraser Cave, later renamed Kutikina) that was to prove pivotal in transforming public, political and scientific opinion about the value of this remote region. In 1983 the High Court upheld the constitutional validity of Commonwealth legislation overriding Tasmanian state legislation purporting to authorise the dam.

CAVES, MAN AND ELECTRICITY IN SOUTHWEST TASMANIA: An update on the Lower Gordon situation

Kevin Kiernan

ASF Newsletter 92 (1981)

Tasmania's southwest. Today, valleys of dense rainforest dating from prior to the Gondwana break-up; broad buttongrass plains; deglaciated mountains; deep gorges; valleys floored by limestone seldom, if ever, visited by cavers. But as the climate has oscillated between warmer and colder stages during Quaternary time the forests have alternately expanded over much of the area only to contract to riverine gallery refuges during the intense cold of the glacials, when the declining glaciers spewed forth torrents of turbulent milky-grey meltwater and leaden skies clung to wind swept and ice-capped plateaux. A wilderness seeker's paradise.

Prehistoric Man in the South-west

Twenty-two thousand years ago, man had reached Hunter Island off the north-west coast. Twenty thousand years ago he had reached the Florentine Valley. He reached Tasmania by crossing the Bass Strait land bridge exposed by glacial low sea levels, and roamed a more open and windy environment inland where game animals abounded and he could move freely withdrawing towards the coasts as the forests expanded. Man may not have reached South America much more than 10,000 years ago, but in Tasmania, he endured an ice age. But, within 72 years of the arrival of European man's settlement in 1804, the Tasmanian race had fallen victim to European man's violence and disease.

No early European explorers observed aboriginal man living in the dense rain forests of central western Tasmania, although there were tantalising possibilities hinted at by Surveyor Calder and George Augustus Robinson. In 1979, the Draft Environmental Statement appended to the Hydro-Electric Commission's proposal for a Lower Gordon development concluded that no archaeological sites occurred within the project area, and included a map which indicated the whole of inland western Tasmania to have been unoccupied.

Caves and Archaeology

With limestone areas of easy access close to the main population centres, there was little incentive for cavers to probe the more remote areas of the island. But, as wilder lands fell to the bulldozer, axe and dam, and the value of wild places became more appreciated, some attention was focussed on the threatened areas. Tasmanian caving was somewhat moribund and the task of checking what might be lost in the South-west fell largely to mainland cavers.

The proposed Lower Gordon development implied flooding large areas of limestone, and spurred a series of trips organised by the Sydney Speleological Society with only limited local assistance. By lilo, canoe, rubber boat, punt and jet boat, parties worked upstream through numerous rapids to examine some of the limestone along the sides of the rivers which form natural highways through the region, but they seldom penetrated far inland. A number of caves were found and some named after the politicians who would decide their fate, occasionally to the consternation of the very conservative Tasmanian caving establishment, who remained aloof and disinterested in the conservation of the region. Increasingly, exploration of caves in the South-west was undertaken by unaffiliated cavers, often unrecorded.

Despite this limited search, the caves are already proving significant sources of archaeological and palaeoenvironmental information. In 1979, David O'Brien and Kevin Kiernan located strong circumstantial evidence of prehistoric man in the form of burnt and split wallaby bones in a cave on the Nelson River. These deposits were apparently of late Pleistocene age. Subsequently, Keith Corbett, and later Kevin Kiernan found surface archaeological sites in the Queen River valley, again within the supposedly unoccupied region. On the assumption that man had not lived in the forests, these sites were regarded as dating from prior to the return of the rainforest some 10,000 years ago, following the late Last Glacial stage. In January 1981, Rhys Jones from the Australian National University, state archaeologist Don Ranson and a party from the Tasmanian National Parks and Wildlife Service found some stone flakes on a terrace of the lower Denison River, and again presumed a Pleistocene age. This find received great publicity as it lay beneath the proposed waters of Gordon-Olga project, the lower Gordon hydro-electric option favoured by the state government.

However, the tools occur in the upper few centimetres of a thick deposit of overbank silts of undoubted postglacial age, and it is the present writer's contention that they are very recent indeed. This implies that man at least visited the western valleys in recent times, despite the dense forests.

The most startling discovery came when a Tasmanian Wilderness Society party of Kevin Kiernan, Bob Brown and Bob Burton re-examined bone-bearing clay deposits in Fraser Cave on the lower Franklin River, which was discovered by Kevin in January, 1977. Far from being a fluvial or pit-fall deposit, as previously presumed, the bones were found to be burnt and split, and associated with an abundance of stone tools. For four years, cavers had walked straight past the evidence! A subsequent small excavation of about one square metre in the 100 square metre plus deposit reached a

depth of 1.4 metres and revealed perhaps about 50,000 stone tools and an equal number of bones. Rhys Jones regards it as the richest limestone cave site in Australia, potentially one of the six most important sites along the western Pacific rim and equal in richness to the classic cave sites of France, which are still revealing fundamental information 100 years after their discovery. Radiocarbon dates are still not available and glib interpretations of age based on the nature of the sediments would be unwise, but it is possible that both Pleistocene and Holocene occupation is indicated.

In the space of a few months, our conception of man in western Tasmania has been upended. While aboriginal man roamed the arid lands of continental Australia, his Tasmanian counterparts were living in the often incredibly dense, dank and wet rainforests of the western river valleys and were faced with a totally different set of problems of adaptation.

Electricity and Politics

News of the archaeological discoveries was initially treated with disbelief by those in favour of flooding the wild western valleys for hydro-electric power, a situation compounded by the need to smokescreen on the site of the Fraser Cave discovery, to ensure against souveniring by rafters (or even deliberate vandalism) until steps could be taken to record and protect the most sensitive parts of the deposit. The situation was given added political significance when Prime Minister Fraser, who had expressed his pleasure at the original naming of Fraser Cave, responded to Kevin Kiernan after the archaeological find, expressing his interest and extending his best wishes for the project. Meanwhile, the Tasmanian Nomenclature Board was having kittens about the name of the cave, with which it did not agree, and the issue was raised on a number of occasions in State Parliament. But caves are obviously only one small part of the issue.

The discoveries undoubtedly have had public impact, with nationally circulated television coverage and press reports as far afield as Britain. Retaliatory response came from the pro-flooding politicians, chambers of commerce and even the retired former state premier 'Electric' Eric Reece, who fought so doggedly to destroy Lake Pedder, to satiate less than four years growth in electricity demand.

In 1979, Tasmania's Hydro-Electric Commission presented the state government with a proposal to dam the Lower Gordon below its junction with the Franklin. This would flood a massive area, including the valley bottoms which pollen from Fraser Cave suggest have been of enormous ecological importance for millennia as rainforest refugia. Flooding would also eliminate the wilderness value of the region and inundate the lower part of south eastern Australia's last major wild river, the Franklin. A second project is proposed later for the upper reaches.

Last year, the state Labor government opted instead for the smaller Gordon-above-Olga dam further upstream on the Gordon River but which would leave the Franklin flowing free (for now) but still flood the stupendous Gordon Splits, Freedom Gate gorge on the lower Denison, the Nicholls Range caves and much more. But the Tasmanian liberal Party and the Upper House of state parliament demand the full HEC backed Gordon-below-Franklin scheme. Among the members of that upper house are affluent farmers who are the descendants of the 'squattocracy', whose actions led to the spectacular act of genocide committed against the original Tasmanians. whose home they overran- The House in which they sit has already rejected the governments legislation.

In May 1981, the government proclaimed a wild river national park over the Franklin River and some adjacent country (including the Frenchmans Cap Park) to emphasize its commitment- This finally links the Cradle Mountain-Lake St Clair National Park to an extended South-west National Park, such that parkland now extends from Precipitous Bluff in the south to Cradle Mountain in the north. It totals around 763,440ha. But as for the Gordon Splits And over 250 square kilometres of the park consists of the surface of hydro-electric storage, which drowned lake Pedder and is probably included to distort the figures.

The issue is at a stalemate, and might only be resolved by the Upper House rejecting the supply bills and bringing down the government. The power of the Upper House in Tasmania is such that it would not have to itself go to the people. It might be resolved by the next scheduled state election. In the meantime, inflation cats away at the proposal. The integrated Gordon-Franklin-King development would produce only 340 megawatts for a construction cost of \$1.36 billion. Gordon-below-Franklin alone would produce 180 megawatts for \$550 million- In justification, the HEC have produced figures for general load production, which, if continued for 50 years would imply demand ten times that of present generating capacity.

And in the meantime. the conservationists goal of no more dams in the South-West is temporarily in force.

Postscript – Radiocarbon assay from Fraser Cave

Charcoal from the basal occupation horizon in Fraser Cave has been radiocarbon assayed at 19,000 +/- 1100 BP. To place this in the context of our present understanding of Tasmanian paleoenvironments, driftwood in silts immediately subjacent to outwash gravels of the Dante Glaciation in the central West Coast Range assays at 18,000 +/- 500 BP (ANU 2533) (Kiernan, 1980). This represents the best date so far obtained for the Last Glacial maximum in Tasmania.

On face value, the date from Fraser Cave would imply man being present prior to the onset of full glacial conditions in Tasmania and having to adapt to a sub Antarctic existence. However, the standard deviation on the date is high, and bracketing by two deviations gives a range of 16,800-21,200 BP. If the high standard deviation reflects contamination by younger organic material, its effect would be to produce a younger apparent date, that is the true age may be older than the assay result. Irrespective, Fraser Cave is clearly a Pleistocene site. Until now, literally, a small handful of ice age tools have been known from Tasmania. Fraser Cave contains tens of thousands or probably hundreds of thousands of tools.

Moreover, unlike most Tasmanian sites which indicate general foraging for food resources on the coast, the abundant bone material in Fraser Cave indicates specific targeting of marsupials and macropods in particular. Man probably stayed at the cave for brief periods while moving up and down the Franklin Valley, carrying with him exotic rock for tools, including Darwin Glass, an impactite from the Darwin meteorite crater in the tributary Andrew River Valley. In the little explored karsts of western Tasmania's wild river valleys, the implication is that other sites probably await discovery.

Here follows an extract from Hansard, House of Assembly, Tasmania, 24 May. 1981, pp. 6044. 6045.

extract from Hansard, House of Assembly, Tasmania, 24 May. 1981, pp. 6044. 6045.
2 April. 1981, pp. 6611, 6612.

ASF Newsletter 92 (1981)

NOMENCLATURE – SOUTH-WEST CAVE

Mr SANDERS - My question is directed to the Deputy Premier who I understand is responsible for the administration of the Nomenclature Board.

- (1) Is it a fact that Mr Kevin Kiernan recently discovered an archaeologically significant cave on the Franklin River?
- (2) Is it a fact that in common with Captain Cook, Abel Janszoon Tasman and other Tasmanian explorers, Mr Kevin Kiernan named his discovery after a contemporary existing political figure – to wit, Malcolm Fraser?
- (3) Is it also a fact that the Nomenclature Board has refused to accept the name of "Fraser Cave" because Mr Fraser still holds office?
- (4) If so, why has the Nomenclature Board broken with universally accepted centuries old tradition by refusing the name?

Mr SPEAKER - Is the Deputy Premier in charge of the Nomenclature Board?

Mr BARNARD - No, Mr Speaker, I am not. That question should appropriately be directed to my colleague, the Minister for Lands – I did not listen because I did not realise it was directed to me

Mr SANDERS - Mr Speaker, I originally planned to address it to the Minister for Lands, but I asked who was the minister in charge, and he said it was the Deputy Premier.

Members laughing.

Mr Pearsall - Will the real minister please stand up?

Mr Groom - Does anybody know?

Mr SPEAKER - Order. If the honourable member for Denison requires an informed answer, I suggest he places the question on notice.

Mr LOWE - I suggest that that course be adopted, Mr Speaker.

Members laughing.

Mr SANDERS Mr Speaker

Mr Devine That night off has done you the world of good, Norm

Mr SANDERS Can the Minister for lands advise the House on recent developments in the continuing saga of the Nomenclature Board and Fraser Cave?

Mr LOHREY The continuing saga seems to be more concerned with abstractions than with reality

Mr Pearsall - Are you the Minister for this board? Have you found out?

Mr LOHREY - Yes. When the member asked me the other night

Mr Pearsall - That is nearly as important discovery as the Fraser Cave, in fact.

Mr Gray - Probably more important, if the truth be known.

Mr LOHREY - for some reason I had it in my head that he was talking about the Signs Committee which is looked after by the minister in front of me. The Nomenclature Board does in fact come under my authority. I understand it is the Board's policy not to name features or places after living people. To me, the name 'Fraser' represents everything to which I am opposed. That geological feature is, of course, a very significant one

Mr Cleary - We will call it 'Lohrey Cave'.

Mr Lohrey - and the symbol given to it by the Wilderness Society is not appropriate. I have written to the Board asking for clarification of its policy. As much as I do not like the name I think it is a horrible name - I think the person ...

Mr Gray - I am sure Malcolm does not want to be associated with it, either.

Mr LOHREY - Well, he has written and said that he likes the idea and wants to be kept informed. There is a great big hole in the ground and they have called it 'Fraser'.

Mr Gray - He might be planning to bury you lot down there when you bankrupt the State.

Mr Polley - At least he doesn't go round biting people first thing in the morning.

Mr Gray - Climb back in your tree.

Mr LOHREY Perhaps it is suitable. There are a lot of old bones in it and a lot of dirt; there is not much else in it, except a lot of history. I have asked for clarification of the Board's policy on this matter. It seems to me there are not many explorers left today; there are not many things left to explore. Caves are perhaps the only things left to be found and the people who find them should have the possibility of putting forward what they consider an appropriate name. That has been the historic precedent. The islands and other features around Tasmania were certainly named by early explorers after living people, and the reason for that was of course political patronage. It seems to me we have moved away from that historic tradition perhaps because we have run out of things to find in terms of geological features. Caves seem to me to be the last things which individuals may discover and for that reason I think it should be the right of the discoverer to put forward what he considers to be an appropriate name, even though it might be a shocking name like Fraser. I have written to the board asking for clarification of its policies and we will be holding further discussions along the lines which I have just mentioned.

SELICKS HILL QUARRY CAVE, 5A20.

Australian Caver 136 (1994)

Chronology of events

DATE	ACTION
Sept 1991	Initial exploration of the cave by members of CEGSA. Non-disclosure Agreement required by Southern Quarries.
Nov 1991	Last entry into the cave.
1992	Ongoing negotiations and contract drafting with Quarry legal representatives.
1993 10 DEC	Attempt to implode the Big Room by Southern Quarries.
11 DEC	State Election.
13 DEC	The caving fraternity holds a press Conference, resulting in the Premier stating that "he would get to the bottom of this".
15 DEC	Mr David Wotton appointed as Minister for Environment, Natural Resources and Development.

- 16 DEC Willunga Shire Council, in which the Quarry operates, meets and votes in favour of the cave after hearing evidence from all parties.
- 6 JAN 1994 Mac McDonald, Grant Gartrell and Alan Jevons from CEGSA and the South Australian Speleological Council meet with Mr Wotton and try to explain what has happened.
- 25 JAN Review of the Facts called by Dep't of the Environment and Natural Resources (DENR)/Dep't Mines and Energy (DME).
Application to List 5A20 on the State Heritage Register made by the South Australian Speleological Council.
- 26 JAN Public Holiday. Terms of Reference released for the Review.
- 27-28 JAN Review held. Ken Grimes and Adrian Moore are the Assessors.
Pat Larkin (ASF) and Armstrong Osborne argue our case at the inquiry.
- 29 JAN ASF Council Meeting, Canberra.
- 10 FEB Questions raised in Parliament by Caroline Pickles, Opposition Spokesperson for the Environment. Mike Elliott, leader of the Democrats and their spokesperson for the environment announces a motion to investigate the issue of Sellicks Hill Quarry Cave by the Joint Parliamentary Standing Committee on Environment, Resources and Development.
- 17 FEB Southern Quarries' solicitors claim that Southern Quarries have been defamed by Grant Gartrell.
- 27 FEB Draft legislation drawn up by the ASF and the Environmental Defenders Office, Sydney – concerning the Mining of Carbonate Rocks – sent to the Minister for DENR.
- 11 MARCH Government announces that " . . . [the] impressive features [are] not exceptional [and] limiting quarry operations is not justified" .
- 14 MARCH The Grimes and Moore reports are released to the public.
- 17 MARCH State Heritage Authority Meeting. Provisional listing and Stop Order placed over the cave.
- 18 MARCH The Minister, Mr Wotton, overrides State Heritage Authority decision of the previous day.
- 21 MARCH ASF engages the firm, Norman Waterhouse, to act on our behalf.
- 23 MARCH Supreme Court action brought against the Minister by the ASF. Brian Hayes Q.C. acts on behalf of the ASF.
- 30/31 MAY Listed for Trial in the Supreme Court of South Australia.

POSTSCRIPT ON SELICKS HILL

SELICKS HILL QUARRY CAVE – COURT CHALLENGE

Miles Pierce

Australian Caver 137 (1994)

The Case mounted by the ASF Inc. and heard by Justice Bollen in the South Australian Supreme Court on 30 and 31 May, as reported in AC No. 136, was decided against the Federation. After considering advice from the QC who represented the ASF, a second opinion from an independent Queens Counsel, plus costs estimates from our solicitors, it was decided not to proceed with an appeal. After negotiations, a settlement has been reached with the Defendants which waives the costs order made against the ASF by Justice Bollen.

It is regrettable that the earlier representations to the South Australian Government and the court challenge were unsuccessful. Avenues to obtain a stay of mining around the cave and require a physical assessment of it now appear to be exhausted. It is hoped, however, that at the least, similar conflicts will be better handled in the future in South Australia and that the Federation's court action has shown the preparedness of cavers to challenge decisions which adversely affect important karst heritage.

MINING AT YESSABAH HALTED

Keir Vaughan-Taylor

Australian Caver 129 (1991)

FRIDAY 16 Nov, Sydney. Three Judges of the Court of Appeal of the Supreme Court have ordered a halt to all mining at Yessabah. The Court unanimously held that the granting of the mining lease to David Mitchell - Melcann Pty Ltd was unlawful because it had not obtained an environmental impact statement.

The case is a landmark decision as mining leases for every mine, even existing mines, are now subject to control by environmental laws. This means that every 21 years or so even existing mines must prepare a new EIS, considering their likely environmental impacts of future operations, in order to justify their continuation. The court also decided that a mine cannot move sideways into undisturbed land without an EIS.

It has been a long fight but we've won. Well done team.

Yessabah was no sooner settled than another quarrying issue arose in southern Tasmania. ASF was contracted to prepare an accurate survey of parts of Exit Cave to determine its relationship to drainage from Benders Quarry. The whole area was eventually included in the Southern Forests World Heritage Area.

Exit Cave threatened by Benders Quarry Extension

Arthur Clarke

Australian Caver 129 (1991)

Current plans to extend Benders Quarry in early December are threatening numerous caves in the Exit Cave catchment area. As the boundaries presented in the Quarry Development Plan have constantly been changing it has been difficult to assess exactly what caves are going to be mined. It seems, however, the proposed extension south into the saddle will mine on three sides of March Fly Pot (IB46) and within 10 metres of the entrance. March Fly Pot includes Pleistocene deposits of extinct macropod fauna, the remains of Thylacines, the extinct Sthenurus, and Macropus giganteus (which has never been previously recorded south of Hobart).

It is expected that caves also consumed by this new extension will include Little Grunt (IB23), Track Cutters Cave (IB211), an important invertebrate fauna site, Fly Wire Cave (IB 101), Exits Nostrils, a drafting cave at the back of the quarry, and a natural arch (IB124), as well as other unnumbered smaller karst features.

A Rhodamine W T trace from Little Grunt has been found in the Eastern Passage of Exit Cave. Fluorescein traces originating from holes in the working area of the quarry have been traced into Bradley-Chesterman Cave, north of the quarry and the Eastern Passage of Exit. These traces were carried out by hydrology consultants for the Dep't of Parks, Wildlife and Heritage.

Further to this dye tracing, on the 20th of November Rolan Eberhard, Ian Houshold, Vera Wong and Stefan Eberhard discovered a major passage (of at least 1 km), leading from Little Grunt to a rock fall. The main conduit route is an average of two metres wide (railway tunnel type). This find will make Little Grunt the second longest cave in the Ida Bay Area. The passage contains 6 large dripping avens and a flowing stream along much of the main conduit route. There is also 800 metres of side passage which runs back towards the quarry, almost parallel to the main conduit, which is heavily decorated and heavily silted with several other passages also silted.

This is a clear indication that Exit cave is affected by Benders Quarry, and that no scope exists for either extension or continued operation of the quarry. The mine extension is due to occur following the acceptance of the Environmental Management Plan. Negotiations are occurring between speleologists and the government.

For further information contact Arthur Clarke. (002) 282099 (list of politicians to contact omitted here)

MINING COURT RECOGNISES HIDDEN TREASURES IN NORTHERN W.A.

(edited from a more comprehensive article)

Jay Anderson

Australian Caver 155 (2001)

Halfway up the Western Australian Coast, 1200 kilometres north of Perth, is the Cape Range peninsula, also called the North West Cape peninsula. Encompassing an area bounded by the Ningaloo Reef (that stretches along the coast about 260 kms) to the west and the Exmouth Gulf to the east, it is a breathtaking place of world heritage significance. The Peninsula is listed on the Register of the National Estate. Additionally, a report by the Department of Environmental Protection found that the Peninsula had the necessary values for it to be nominated for World Heritage Listing. A significant portion of the eastern foothills of the Cape Range has been recommended to be included in the Cape Range National Park.

Why is the Cape Range so important?

The fossil records, the flora, the geology and the above-ground and below-ground fauna have all contributed to an extensive and increasing knowledge of our past. One of the attributes of the Cape Range, which make it so special, is its subterranean fauna. Caves and mesocaverns provide the habitat for subterranean fauna of great rarity and variability: troglobites, stygofauna, spiders, millipedes and molluscs. It is this special region of “karst” that has the interest of speleologists in Australia and other professionals around the world.

The cave fauna of Cape Range has only been studied extensively over the last decade, especially by WA Museum staff in conjunction with members of ASF caving groups from throughout Australia, and shed new light on the country that we live in. A recent discovery in a water-filled cave at Cape Range has been compared to finding a living dinosaur! This small aquatic animal is believed to have been living on earth since the time of the dinosaurs and was truly an exciting discovery.

Despite the fragility and acknowledged importance of the karst and reef systems, the area is under pressure from tourism, oil and gas industries, mining and other human activities. Only a small part of the karst system lies within the National Park. This area is also of interest to the mining industry for extraction of the limestone that forms the karst system.

In 1995, in response to competing land use interests, the State government accepted a controversial dual-purpose policy, brokered between the Department of Minerals and Energy and the Department of Conservation and Land Management. This policy allowed the State government to propose the setting aside of a significant area of the south-eastern foothills of Cape Range as a ‘section 5(h) reserve’ for the apparently inconsistent purposes of conservation and limestone mining. The area is currently under pastoral leasehold, with compensation to the leaseholder for the excision of the 5(h) reserve remaining unresolved.

Objection to the proposed mine and leases

During 1999, Finesky Holdings Pty Ltd applied for a grant of 10 mining leases over 8,250 hectares of Cape Range, covering approximately 80% of the proposed “5 (h)” reserve area, and over which the company holds mining exploration licenses. They intended to convert the existing exploration leases into mining Leases.

Among others, the Western Australian Speleological Group (WASG) and the Speleological Research Group Western Australia (SRGWA) objected on behalf of the Australian Speleological Federation (Inc) (ASF), with legal representation provided by the Environmental Defender’s Office. ASF Conservation Commission WA Co-convenors, Rauleigh Webb and Ric Brown coordinated a response from the groups.

The Hearing

The environmental attributes of the Cape Range Peninsula, and in particular the value of its subterranean fauna, were considered at a hearing in the Perth Mining Warden’s Court over 8 days during August and September 1999. There were 8 grounds for objection:

- The unnecessary size of the 10 combined mining leases;
- The visual impact of a mine within the proposed Mining Lease;
- The potential impact on the karst aquifer within the proposed Mining Lease;
- The potential impact on the karst within the proposed Mining Lease;
- The potential Impact on the caves within the proposed Mining Lease;
- The potential impact on the cave fauna within the proposed Mining Lease;
- The potential Impact on the proposed listing of the Cape Range peninsula on the World Heritage List; and
- In all of the circumstances it is in the public interest that the application should not be granted.

All our witnesses recommended an alternative site at Rough Range to the south of Cape Range. Some of the witnesses were:

- Elery Hamilton Smith provided details of why the Cape Range should be placed on the World Heritage List, how that process is conducted and why the granting of the mining lease would impact on the listing.
- Andy Spate provided geomorphology information to the Warden particularly relating to micro and meso-caves of Cape Range Karst.
- Bill Humphreys provided details of the unique nature of the cave fauna at Cape Range and how any mining activity may adversely impact the fauna.
- Stefan Eberhard covered the impacts of pollutants on cave fauna – in particular the impacts of quarry activities on the Ida Bay karst.
- Kate Morse provided information on the anthropological and archaeological significance of the Cape – with respect to Aboriginal occupation and artefacts, rockshelters, middens and evidence of the earliest of human decorative traditions.
- Darren Brooks provided further information on the caves of the Cape Range and the particular area under submission, in reference to his “Cave Survey Report”.

The Warden’s decision and recommendations

On 9th February 2001 the Mining Warden Graeme Calder recommended that limestone mining should not occur over 99.98% of an area in the Cape Range Peninsula covered by mining lease applications because of its extraordinary subterranean fauna and world heritage values. In relation to the environmental values of the area, Warden Calder found that the area applied for *“is located within a unique karst system which is outstanding on a world scale in terms of its location, geological structure, subterranean fauna inhabitants, both aquatic and non-aquatic, and its integrity ... in its present state, were the Cape Range karst system to be nominated by the state of Western Australia for World Heritage listing, it would be listed.”*

It was clear that the Warden accepted the evidence of several experts called by the ASF, indicating that granting the proposed mine would have a significant impact on the karst system and the subterranean fauna. The Warden recommended that, if it was considered acceptable by the EPA for the proposed mine to operate in the 5(h) reserve, then his recommendation was qualified as follows:

- A mining lease should only be granted for the area presently proposed to be mined (thus rejecting 99.98% of the area applied for).
- The mining lease should only cover an area that is necessary for the proponent to conduct an efficient mining operation.
- This small mining lease should only be granted if the EPA finds that the proposal to mine is environmentally acceptable.
- EPA assessment of the proposal to mine should be made (contrary to present policy) before the Minister makes his decision.
- If it is found that the mine should not be sited where it is presently proposed, then the applicant should not put the mine in any other site within the lease area without going through the process again.
- The Minister for Mines should take advice from the Department of Minerals and Energy and the EPA before making a decision about the mine site, if the Minister is minded to grant a mining lease large enough to move the mine to an alternative site.

Speaking on behalf of the Western Australian Speleological Group, Jay Anderson said *“We are pleased that the World Heritage value of the area has been recognised. The acknowledgment by the Warden has significance in the protection of the extraordinary karst system that is contained in the Cape Range Peninsula. The Warden’s recommendations are quite favourable towards continuing to protect the area. We hope that the EPA will now find that the quarry proposal is environmentally unacceptable.”*

The Australian Speleological Federation President, Peter Berrill commented *“that although we are happy with Mining Warden Calder’s decision in so far that he has accepted the evidence presented by the Federation’s expert witnesses which recognises ‘that the entire area of Cape Range has significant environmental values worthy of World Heritage listing’, we are disappointed in his recommendation to the Minister that, ‘a small quarry might be developed’”*. Mr Berrill stated further *“I can’t justify this decision when he has stated that even a small quarry has the potential to irreversibly impact on the karst systems, destroying the unique subterranean fauna, resulting in a negative factor to be taken into account during World Heritage assessment. In light of this I call upon the Minister not to grant any mining lease in the Cape Range area.”*

Environmental Impact Assessment (EIA)

During late July 2001, the E.P.A. published the "E.R.M.P. Draft E.P.A. Guidelines: proposed limestone quarry located 35km south of Exmouth near Learmonth, Cape Range (Learmonth Limestone Pty Ltd)". The ASF, WASG and SRGWA made submissions regarding the draft guidelines, which were some of the most comprehensive developed for the assessment of karst in W.A. Some aspects were not included in the Guidelines:

- The potential destruction of unknown karst features, including caves, that occur on the site.
- The leaching of water into the water table, through microcavems and mesocaverns.
- The impact of water with high sediment levels on cave fauna and caves.
- The Run-off of high quantities of water (in a storm event) into caves/cracks in the quarry and the potential pollution of the karst system and water table by blasting residues, sedimentation or spillages that infiltrate into the ground.

Some of the areas suggested for inclusion in the Guidelines were:

1. Develop a plan for what is to occur when a cave or karst feature is intersected during mining activities. Procedures need to be developed where speleologists assess the karst features as soon as they are entered by mining activities.
2. Develop procedures to assess/manage the impact of sediment and large quantities of water on karst features, cave fauna, and the water table.
3. Develop a comprehensive quarry rehabilitation plan that includes the management of karst features.
4. Ensure that experienced speleologists or karst management consultants are employed to assess each environmental issue.

Conclusion

The Warden's recommendation highlights some very important issues regarding the Cape Range of Western Australia. His decision makes a careful distinction between the role of the Mining Warden's Court and the WA State government mining policy in determining the appropriateness of mining activities in relation to conservation goals. It highlights the uncertainty that the creation of dual-purpose reserves presents for industry and the community.

It is known from past fauna studies that there is a large variety of troglobitic fauna in the Cape Range area. Preliminary information regarding the fauna collected from drill holes placed on the proposed mining lease indicates several possible new species. The Fauna Report indicated that there are several new genus and species of troglobitic fauna identified. One species had not been previously found in the Cape Range or elsewhere, while another is a new family record for Australia. It will be interesting to see what the Proponent does with these results.

The proponent released their environmental review document for public submission, and the speleological groups made further comments in a formal submission. However, it is the Minister for Mines who has the final decision regarding the granting of the mining leases. W.A. Speleological Groups encourage all Australian Speleological Group members to share the information regarding this issue with their friends and families. We recommended that individuals write letters to Government Ministers and send submissions regarding the Cape Range Issues.

Finally, the ASF and the WA speleological groups really appreciate the huge amounts of work that was undertaken by the lawyers of the Environmental Defenders Office and their staff in the preparation and execution of this case. It was hoped that the new government in Western Australia would adopt the recommendation of the Mining Warden against the grant of mining leases in Cape Range, and examine the nearby Rough Range as a suitable alternative for a strategic limestone reserve.

Whatever the outcome of this case the A.S.F. will need to continue to:

- oppose limestone mining on the Cape Range peninsula
- call for the Government to remove the strategic limestone mining purpose from the proposed 5(h) reserve
- enlarge the Cape Range National Park
- advocate for and nominate the Cape Range peninsula for World Heritage Listing.

Endnote: as of November 2006 there has been no final decision made by a State Minister, and this issue of mining at Cape Range has not been resolved.

3. Smaller Conservation Issues

There were many reports of conservation issues that were handled without resort to the Courts or even the media, especially as environmental awareness and stronger legislative provisions arrived from the 1980s onwards and Ministers and bureaucrats became less adversarial and antagonistic. Victoria in particular had a number of notable successes which received little publicity. ASF Newsletter often ran a Conservation Action column to publicise these less-heralded examples.

Conservation Action

ASF Newsletter 54 (1971)

SOUTH AUSTRALIAN CONSERVATION REPORT by Grant Gartrell

Recently I was pleased to represent CEGSA as part of a delegation from the South Australian Mountain Activities Federation (SAMAF) who were received by the State Minister for Conservation, Mr Broomhill, only recently appointed. The purpose of the visit was to acquaint Mr Broomhill with some of the more urgent conservation desires of bodies belonging to SAMAF and to seek his co-operation.

Mr Broomhill gave the impression of being sincere and sympathetic. Government resources are limited and conflicting interests are encountered. It is not sufficient to merely ask that caves be conserved – to get anywhere we must present him with a strong case which will enable him to argue in the parliamentary market place. On this occasion the submission took the form of literature produced by the Group, including Caves of the Nullarbor and Mullamullang Cave Expeditions 1966 as well as some papers outlining the problems of cave conservation. The next steps will be to prepare three distinct cases:

1. Overall legislation to prevent caves being used as rubbish dumps. – This will be facilitated if caves occur in water catchment areas or in association with underground water resources.
2. Perhaps even more urgent, we must arrange our known caves into some order of priority according to scenic, scientific and recreational importance. We need to present the Minister with an ordered list showing location, reason for protection, proposed means of protection including physical (gates etc.)
3. We have a responsibility to promote the preparation and distribution of educational material in the cause of cave conservation and to foster practical means by offering to fence or gate caves that are causing landowners trouble.

STREAM CAVE and HEREFORD CAVE by Trevor Maddock

Serious concern has been expressed about the future of these two caves in the farming country of south east South Australia. Hereford Cave has been completely blocked up with dead cows, sheep, wire and racks, while Stream Cave is in similar danger. Stream Cave is unique in being the only cave in the state with a running stream and it epitomizes the danger of groundwater pollution in a region with very little surface drainage. As well Stream Cave may have biological significance; although in no great numbers, bats have been sighted and in 1966 one was banded.

4. Looking after what we have

OPEN LETTER TO KUBLA HELPERS

Bob Woolhouse, Northern Caverneers

Australian Caver 108 (1985)

(Particularly to Andrew Pavey, Nicholas White and Jim Campbell, who have offered to make notices, maps and markers. Up to now, Norm Poulter is the only person we've needed to call on in this respect.)

Dear Andrew et al.,

As you know, we were experimenting with felt-pen notices on A4 paper laminated in plastic, to test audience reaction and find exactly what we needed for permanent notices. Where possible we tried to judge the success of the system by having cavers unfamiliar with the route attempting to lead us through. Much to our surprise, we found that many parts we thought were obvious and not worth marking, were in fact not obvious at all. Our rerouting over flowstone between pitches 2 and 3 (see diagram) is marked with flagging tape, and gives no trouble. However, without both precise instructions and markers, pitch 3 goes into a muddy area and misses the Waiting Room completely. Ken Boland decided (quite correctly) that Khyber Pass was about to develop into an overhang like that on pitch 3, and traversed up to the left into an impossible position well above The Traverse. Ken will be interested to hear that the marker he fixed at the true start of The Traverse was seen by the next visitor, but the crack of The Traverse was not recognised as a route. Apparently, a descending traverse was made towards the sandbags which were visible half way down the Steps. This was described as "rather hairy". It's a slow business drilling to fix markers, and we still haven't got any partway along the Traverse. Someone suggested hammering in masonry nails. These give an unpleasant vibration to the fingers

holding them and eventually the rock splits and the nail drops out. The present system is to drill a 3mm hole about a cm deep and use a 4mm fluted aluminium nail. Ordinary adhesive tape reflectors stuck to aluminium strip were tried, but Norm's reflective discs (with a hole in the centre for the nail) had a better visibility. Also being white, they are indistinguishable on photos (but not to the naked eye) from reflective calcite crystals.

We had hoped that the authority to issue permits, which was given to Mole Creek NPWS for the ASF Conference period, would be quietly allowed to continue indefinitely. When it was suddenly withdrawn, I took the opportunity to write a carefully phrased letter to the Director to the effect that N.C. were prepared to continue with the work in Kubla and requested help with some of our problems. In a helpful reply we were given an open permit for 1985 and offered the services of the Operation Officer in Hobart in making and laminating notices. We also have the loan of Mole Creek's cordless drill, although the service is so hard up it can't buy us masonry drill bits in the size we use.

We may have set a useful precedent in that the Director is allowing an ASF member club to control conservation measures in a restricted access cave. It is very important, however, that the NPWS not the club, should control the issue of permits.

Coming back to the notices, The Service Operations Officer (Tony Blanks) turned out to be very co-operative. He photocopied my sectional sketch of Kubla and double laminated a copy (his suggestion to make it stiffer) which I intend fixing with a brief explanatory notice at the upper entrance to the cave.

After a lot of messing about, we now know what we are trying to do, and we would be able to offer specific projects for which a club or group could take responsibility. For example, no complete survey exists for the whole cave and the plan in "Vertical Caves Guide – Tasmania" is positively misleading.

Finally, thanks everybody

WEEBUBBIE – A CHRISTMAS CLEANUP

Norm Poulter, SRGWA.

Australian Caver 108 (1985)

Weebubbie Cave 6N2, a declared water reserve (19713) and aboriginal site is one of the most widely known of the Nullarbor caves and has had a couple of cleanups over its history as a water reserve for the nearby Eucla Roadhouse. The last was apparently in 1978 involving members of the Western Australian Museum.

Sometime between late 1982 and December 1984, the pump and active piping was removed from the cave when the roadhouse sank a bore closer to their complex, thus leaving a view of the main lake free of unsightly pipe.

However – there are lots of unsightly pipes, drums, timbers and other associated junk about 5-10m below the surface of the lake in full view of the cave's many visitors. This junk is a relic of previous generations of administrators of the Eucla roadhouse. There is apparently no provision in the terms of the water reserve agreement that compels the roadhouse management to clean their junk from the cave.

Since May, when members of WASG deposited visitors' books in several Nullarbor caves, Weebubbie has had 147 visitors (May-Sept. 1985), an enormous number by Nullarbor standards. Despite the number of visitors there is surprisingly little fresh rubbish in the dry part of the cave – but rubbish there is and everyone knows that rubbish breeds rubbish.

SRGWA is co-ordinating a cleanup of the cave over the Christmas, New Year period (Dec.28 - Jan.4) in an effort to remove all the rubbish from the cave, both wet and dry. Negotiations are in progress with the Water Authority of W.A., the cave managers, for the loan of equipment to make it easier to haul junk out of the doline.

The SRGWA Navy in the form of Norm Poulter's 5m Canadian canoe will be assisting in salvage operations (top that VSA).

In order to accomplish the cleanup, SRG is calling for volunteers including dry cavers, snorkellers and SCUBA divers to assist and for those wishing to participate to contact Norm at 18 Hammersley Ave, Morley 6062 (H 09 2762495 W 09 380 2770) before the end of November. It will be a great chance to socialize and go canoeing on the spectacular Weebubbie Lake.

Would You Like to Ride in my Nullarbor Canoe?

4. Working for better management of our caves and karst

In 1972 ASF organised the world's first Conference on Cave Tourism and Management, continuing to organise 6 similar gatherings until the formation of the Australasian Cave and Karst Management Association in 1987. In some places caves were still in danger of being damaged or destroyed, but where they were relatively safe in protected areas we became increasingly involved in providing advice to public land managers throughout Australia, either by way of submission or as experts in the field of cave and karst management: at Cutta Cutta, Yallingup, Nullarbor, Jenolan, Tantanoola, Naracoorte and the NSW Central West. World Heritage listing was eventually obtained for several karst areas, at least partly due to work by ASF and our members.

NULLARBOR KARST STUDY

Adrian Davey

ASF Newsletter 81 (1978)

The Federation is currently undertaking a study of karst management on the Nullarbor for the W.A. Department of Conservation and Environment. The objectives of the study are to identify the caves and karst features on the Nullarbor which should receive specific kinds of management, and to suggest ways of co-ordinating conservation, recreation, tourism, and land management of the area.

The first phase of the study, involving field reconnaissance and an initial report, is well under way. A group of six ASF personnel recently spent a fortnight out on the Nullarbor, accompanied by representatives of the W.A. Department of Conservation and Environment, W.A. National Parks Authority, and the W.A. Museum. The first report is due to be submitted to the Department in October.

The ASF personnel associated with the study at present are Nicholas White and Elery Hamilton-Smith in Melbourne; Ian Lewis, Jim Cundy, and Kevin Mott in Adelaide; Ken Lance, Kerry Williamson, and Bob Shoosmith in Perth; and John Dunkley and Adrian Davey in Canberra. Adrian is co-ordinator of the project

Phase II of the project will be a Development Study of Weebubbie Cave. Fieldwork for this part of the study will be undertaken in conjunction with the Perth conference this summer. There will need to be an even wider group of people contributing to this part of the operation, including civil and electrical engineers, surveyors, divers, biologists, and planners. The final report is due in about April 1979.

As well as the Development study, it is likely that we will organise several work parties to clean several of the Nullarbor Caves, and undertake minor protective measures. If you can help, please mention the fact when you register for the conference field trips on the Nullarbor.

NULLARBOR WORLD HERITAGE NOMINATION – PROPOSAL FOR ASF SPONSORSHIP

(Adrian Davey)

ASF Newsletter 103 (1984)

Introduction

1. The Nullarbor Plain is one of the largest karst areas in the world and is arguably the most significant of all Australian karst areas at the International level, on account of unusual features arising from its semi-arid setting.
2. Many of the natural features of the Nullarbor Plain area are of outstanding international interest.
3. The Nullarbor area has a rich cultural heritage, especially Aboriginal.
4. The caves of the Nullarbor Plain offer outstanding cave exploration challenges (especially diving) of a character very different from caves anywhere else in the world.
5. The Nullarbor Plain in the sense of a vast and supposedly flat treeless landscape is as much a part of the Australian consciousness and folklore as Ayers Rock or the Great Barrier Reef.
6. The geological and environmental entity comprising the karst area, the flora and fauna and the cultural features of the Eucla Basin clearly fit the criteria for world heritage areas as outlined under the convention.

Basis for World Heritage Proposal

7. The property: The area to be nominated for listing on the world heritage register will be defined on geomorphological and ecological grounds as the entire onshore Eucla Basin.
8. Land use: The nomination will be made on the basis that the following land uses may continue within the area, subject to appropriate controls at sensitive sites: grazing, communications, transportation, car-touring, tourism accommodation and servicing, outdoor recreation including cave exploration, nature conservation, cultural features conservation, petroleum and mineral exploration, meteorological observation, survey and navigation and groundwater utilisation.
9. Land tenure and management: It is desirable for there to be active resource management of the entire area. This may encompass arrangements under the following land tenures: pastoral lease, special lease or other ownership of service centres, homesteads, communications installations etc., Aboriginal land, national park, wildlife or nature reserve, conservation park, or similar, or specially managed Crown land. management arrangements for the lands of whatever tenure or use must provide for: landscape protection and management, maintenance/restoration of range condition, conservation of important natural and cultural features, fire management, appropriate tourism and recreation. and proper maintenance of access and structures and disposal of wastes.
10. Management co-ordination: It is desirable for the Commonwealth to provide some mechanism for co-ordinating the management of different land tenures and uses within the two states concerned, but it is envisaged that all direct management would be the responsibility of the state.
11. Management plans: The nomination will propose that an overall co-operative management plan be prepared for the entire area and that the detail be carried into effect via formal management planning instruments appropriate to the tenure of individual areas.

Nomination Procedure

12. Nomination of a property under the world heritage convention must come from the national government concerned. Protocol in Australia is that the Commonwealth only acts on the recommendation of the relevant state(s).
13. ASF has a special interest in one very important aspect of the proposed nomination and has wide experience of the area. It is proposed that ASF draft a detailed nomination and formally sponsor the initiative. ASF would then ask the two state governments to support the proposal and seek Commonwealth action to make the eventual nomination.
14. The states and/or the Commonwealth may considerably supplement the content of an ASF draft nomination. Nevertheless, it is highly appropriate that ASF sponsor the initial proposal. The state governments and appropriate Commonwealth authorities will be consulted during the process of preparing the ASF draft to make sure the preliminary submission has wide support.

Recommendations

15. That ASF formally adopt the proposal to seek world heritage nomination for the Nullarbor karst area, in recognition of its outstanding international significance.
16. That the executive be authorised to approve a final nomination for submission on behalf of ASF to the two state governments and the commonwealth and to take appropriate action to advance the proposal.
17. That member societies be asked to cooperate in preparing the submission as much as possible.
18. That the submission be compiled and edited by someone working in consultation with the executive.

Postscript: In 1992 ASF members were involved in a Study of the Nullarbor region for the Commonwealth Government as part of the World Heritage nomination process. The nomination foundered for lack of the trilateral support required from the three governments involved, but is now being resurrected.

Jenolan Caves included in World Heritage listing of Blue Mountains

Australian Caver 153 (2000)

After its Executive Bureau had twice rejected the nomination, the World Heritage Committee meeting in Cairns on 29 November (2000) accepted the nomination of Greater Blue Mountains to the list. Jenolan Caves is included, not for its cave values as such, but because its karst is an integral part of the diversity of the Blue Mountains which was the key determinant.

It is now 15 years since we (ASF) first raised the issue with the then responsible authority, the NSW Department of Sport, Recreation and Tourism. World Heritage was not exactly flavour of the month at the time – the Director and other bureaucrats in Sydney were in no hurry to take that suggestion on board. Perhaps they envisaged F111s swooping around the Grand Arch the way they did down the Franklin.

In March 1988 we managed to get it as the very first goal for management action when the current Management Plan was drawn up. ASF has had statutory representation on Jenolan Caves Reserve Trust for the last decade – a Trust that has shown itself to be somewhat more enlightened than the old school of bureaucrats.

There will no doubt be debates about what practical advantage there can be for World Heritage listing. Although Jenolan is a relatively small part of the 1 million hectares listed, its significance certainly outweighs its size.

NHT PROJECT COMPLETED IN NSW CENTRAL WEST

Australian Caver 153, 2000

Late in 1998 the Federation received on behalf of the NSW Speleological Council, a grant to raise awareness of karst and karst-adapted vegetation in the central west of New South Wales, update documentation of all karst features, and to prepare a Regional Karst Management Strategy in consultation with other agencies.

Chris Dunne did a great deal of administrative work in 1998 and 1999, tightening the original application, liaising with government agencies and managing the project until his departure for Brisbane. Since then it has been brought to completion by a management team chaired by John Dunkley and including David Bennett and Evalt Crabb. Documentation was conducted by OS and HCG, the key field team including Bruce Howlett and Denis Marsh (OSS), and the driving force behind it was Peter Dykes, who conceived and coordinated it from beginning to end.

9 clubs and 65 members assisted in this mammoth task, visiting 22 karst areas and increasing the number of known karst features from 46 to 548. Hundreds of trees were planted, fences erected, community workshops conducted and other land management agencies consulted. The 104-page main report lists 51 recommendations for management action to protect the karst, caves and remnant vegetation, and to improve water quality. An interesting conclusion is that the 255 dolines in the region are probably the most significant karst feature and require much better management. Detailing all karst features in the region, a supplementary report to the funding body will be used as the basis for a future volume in the new Australian Karst Index series.

Only 97 of the features are caves but the work by so many clubs and individuals demonstrates that speleologists are prepared to put time and effort into the conservation and sound management of all karst features. Copies of the Report will be available to all participating clubs and a summary may be prepared for future publication.

CAVER IMPACTS CONFERENCE

Clare Buswell

Australian Caver 128 (1991)

In June of this year I attended a conference organized by the NSW Speleo Council and the Australasian Cave and Karst Management Association, titled Caver Impacts on Caves. The conference was well attended by around eighty people mostly from NSW but there were representatives from South Australian ASF affiliated organisations and from the VSA. Cave Management was represented by Andy Spate, NPWS, Ernst Holland, Jenolan Caves. A number of papers were presented in the morning with the afternoon session being given over to workshops on cave management. The aim of the conference was for cavers and managers of caves to highlight some of the different ways in which both perceive karst, our impacts upon it and to set about finding some solutions to minimise those impacts.

Andy Spate presented a paper co-authored with Elery Hamilton-Smith which reviewed the literature on human impacts in caves. The paper is comprehensive and aims to present a broad perspective on the impacts of human use and possible solutions to those impacts. The users range from biologists to rock hounds and the solutions to dealing with impacts ranged from hardening the environment in order to reduce the impact of visitors to exporting the demand [to go caving] to other countries. The paper concludes on a positive note in that, in Australia we have the opportunity to avoid the British experience where, "... no cave now exists which has a human sized entrance and undisturbed biology or sediments ...". We should make use of our national organization to develop a Low Impact Caving Ethic and make it widely available to member societies, equipment shops, land managers.

Martin Scott from SUSS presented the cavers points of view by trying to answer the question: why do we all go caving. His answer revolved around finding out what is there and to document and publish it.

Nick White from the Victorian Speleological Federation presented an overview of the current karst management and speleological issues in Victoria. The reasons that management practices have been successful is due to the importance

of having strong governmental support for karst management over a long period of time, the close involvement of the VSA in the development of those management strategies and having only one government department which looks after karst, the Dep't of Conservation, Forest and Lands. This has resulted in most of the Victorian caves being in Reserves, and those that are not are required to be managed as if they were. In 1986 there was a major cataloguing and classification (using the Worboys system) of all known Victorian caves. This document, Management of Victorian Caves and Karst, has formed the basis of current management practices.

Ernst Holland presented a management view and in the afternoon workshops set in motion some ideas to get the caving fraternity to measure the impact they are having on the caves they visit. Some examples of the type of experiments that are going to occur are: Changes in air / water flow; humidity levels; soil compaction in passages; monitoring visitation levels via visitors books and electronic people meters; photographic monitoring; monitoring speleothem breakage; mud/clastic sediment transfer and track marking, does it lessen impact? These experiments are to occur over the next year with another conference being convened to discuss the results.

One of the most important recent legislative moves to protect Karst was also launched at the conference by the Minister for the Environment, Mr. Tim Moore. The Legislation was originally introduced into the NSW Parliament as an amendment to two Acts, the National Parks and Wildlife Service Act and the Wilderness Act. On the second reading of the legislation in early July, the two amendments were amalgamated and the legislation is now known as the National Parks and Wildlife Service Karst Conservation Amendment Bill, 1991, No. 2.

At present, the only way the Service could conserve a significant limestone cave area was to obtain title to the land above and rely on the Common Law principle that title to a parcel of land extends "to the centre of the earth". The aim of the legislation is to establish underground National Parks and Wilderness Areas at a certain depth under the surface land, by allowing the NPWS and the Wilderness Service to acquire, through purchase, the underground area. In effect, strata titling.

The current process of declaring a reserve around the immediate entrance does not protect the catchment areas. In order to protect the catchments of seepage flows and the chemistry of seepage waters, the protection of surface areas, via conservation agreements or wilderness declarations, to areas larger than the immediate entrance is to occur.

The legislation is currently on public display and comments on it should be in to the Minister by the middle of September.

5. Unusual Cave Conservation Cases

Almost the first conservation action undertaken by ASF was a protest about the use of caves for establishing records for staying underground. In time we came to frown on underground camping for any purpose except in the most exceptional circumstances.

NEWS FROM THE NORTHERN TERRITORY

Anon

ASF Newsletter 17 (1962)

The present attempt by three people (originally four) to break the recently-set world record for staying underground has received much publicity. Unfortunately, newspapers gave the impression that the members of the party are recognised speleologists, but this is not so. Only one of the party, leader Bill Penman, has ever been in a cave previously. They have chosen one of the hottest, humid and most unpleasant caves in the world – the Sixteen Mile at Katherine – for the endurance test.

Re PENMAN AND RECORDS

Gordon Bain (editor)

ASF Newsletter 21 (1963)

The attempt by Bill Penman to gain a world cave-sitting record has gained considerable attention both within and without ASF in the last year. It recently came to the attention of the Executive that Penman was about to attempt another similar venture in the 16-Mile cave. In view of the many protests received from those who have seen the fantastic desecration of the cave during the last attempt, it was decided that we would write to Mr Penman suggesting he

desist from this latest attempt, as well as to make protest to the relevant authorities in the Territory. It was felt that we cannot stand silent when all principles of cave conservation are being so flagrantly violated as in this case.