feature: uncommon exotic species Stand up the real Anzac Lone Pine of Gallipoli

Mike Wilcox and David Spencer

Abstract

The native pine of Gallipoli is Turkish red pine (*Pinus brutia*). After World War I Sergeant Keith McDowell brought back a cone from the famous Lone Pine, from which four trees were later planted at war memorials in Victoria, Australia, in 1933-34. These are *Pinus brutia*. However, most ANZAC pine trees planted in Australia and New Zealand to commemorate men lost in the Gallipoli campaign, and in particular the Lone Pine Ridge, are Aleppo pine (*Pinus halepensis*) which does not grow naturally in Gallipoli but is found near the Mediterranean coast in Spain, France, Italy, Croatia, Greece, Israel, Syria, Turkey, Libya, Tunisia, Algeria and Morocco. The origin of these P. *halepensis* trees is attributed to a cone collected by an Australian soldier from the Turkish trenches off a tree branch, probably brought in from a woodlot or hedgerow planted on the Gallipoli Peninsula. Two of the most prominent ANZAC pines in New Zealand are radiata pine (*Pinus radiata*), and one is a Canary Island pine (*Pinus canariensis*). Whilst there are several in Australia, the only authentic *Pinus brutia* in New Zealand from the Gallipoli Lone Pine seems to be the one at the Paeroa Golf Course very likely derived from the cone Sergeant McDowell brought back with him to Australia, and as such must rank as one of the most historic trees in the country.

Introduction

The First World War campaign in Gallipoli was one of the darkest events in New Zealand and Australian military history. Our Anzac troops were all but annihilated, and to this day the battles are commemorated on Anzac Day. There are numerous war memorials in Australia and New Zealand in remembrance of those who died there, and there is also a most impressive cemetery in Gallipoli itself, revered as a sacred shrine by the Turkish people as well as by Australians and New Zealanders (Figure 1 and 2). The Gallipoli campaign was a costly failure. Of the 7500 New Zealand casualties at Gallipoli, there were 2721 dead - one in four of those who landed. However, while the Gallipoli campaign is reputed to have had little or no significant effect on the outcome of World War I, the joint defence of the Anzac perimeter has provided a strong sentimental underpinning to the relationship between Australia and New Zealand and to this day 'Anzac' has become a lasting label for trans-Tasman cooperation and friendship.

Figure 1. Anzac Cove, Gallipoli, Turkey; the prominent rock is known as the Sphinx.



Gallipoli is in Thrace, the European part of Turkey where it is called (in Turkish) Gelibolu Yarimadas or the Gallipoli Peninsula. The southern part of the Gallipoli Peninsula is covered by forests of Turkish red pine (*Pinus*) *brutia*) and maquis scrub, and this area, scene of the tragic Gallipoli campaign of World War I, was declared a national park in 1973. Half a million Turkish, British, French, Australian and New Zealand soldiers lost there lives here in 1915, and their graves and war memorials are reminder of this sad chapter in history.

Numerous commemorative pine trees have been planted in Australia and New Zealand supposedly derived from pine cones brought back by soldiers from Gallipoli. They include radiata pine (*Pinus radiata*), stone pine (*Pinus pinea*), Canary Island pine (*Pinus canariensis*), Aleppo pine (*Pinus halepensis*), and Turkish red pine (*Pinus brutia*).

Figure 2. New Zealand and Atatürk Memorial, Chunuk Bair, Gallipoli; the trees are Turkish red pine (Pinus brutia), native to the area.



The Turkish Connection

Seeds reputedly from the original Lone Pine (see below) were used to grow a pine in the grounds of the Lone Pine Cemetery at Gallipoli that contains 1167 burials from all periods of the Gallipoli campaign. The memorial commemorates 4228 missing Australians who served on the peninsula between 25 April and 20 December 1915 and 708 New Zealanders who died before the August offensive. Of this number (4936), 1212 died at sea, mainly on hospital

<u>feature</u>

ships and transports and were buried there. The New Zealand names are on the memorial itself, a large 'pylon' of Ulgaredere stone with large crosses set in relief on each face. The Australians are listed on walls in front of the pylon. Consequently, the sea around Gallipoli is a mass grave. As to the pine tree (Fig. 3), it has been referred to as an Aleppo pine (Wright 2003) but is actually a stone pine (*Pinus pinea*), which is not native to Gallipoli itself, but is frequent in the Aegean region of Turkey. It was planted in the 1920s.

Figure 3. The stone pine (Pinus pinea) at Lone Pine Cemetery, Gallipoli.



The Australian Connection

The Lone Pine Memorial (Figure 3) is the principal Australian memorial on Gallipoli. It is built directly over the trenches wrested from the Turks at the Battle of Lone Pine between 6 and 9 August 1915, and takes its name from the pine tree that stood in this area of the battlefield on 25 April but was soon shot to pieces. Although the Lone Pine was destroyed in the fighting, it lives on today in Australia, which is where the Legacy Lone Pine story begins. As far as we know two Australian soldiers souvenired pine cones from the ridge that found their way back to Australia.

Inverell and Canberra: Lance Corporal Benjamin Smith of the 3rd Battalion whose brother was killed in the battle for Lone Pine Ridge sent a cone home to his mother, Mrs McMullen at Inverell in New South Wales. Mrs McMullen kept the cone for 13 years until 1928 before planting the seeds. She grew two seedlings, one of which she presented to the town of Inverell and the other to the Parks and Gardens section of the Department of the Interior in Canberra.

The Duke of Gloucester planted this second tree from Benjamin Smith's cone at the Australian War Memorial in Canberra on 24 October 1934. It is an Aleppo pine (*Pinus halepensis*) and today it stands over 20 metres in height (Figure 4). It bears the following inscription (Figure 5):

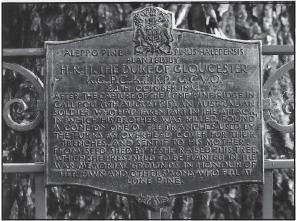
"After the capture of the Lone Pine ridge in Gallipoli (6 August 1915), an Australian soldier who had taken part in the attack, in which his brother was killed, found a cone on one of the branches used by the Turks as overhead cover for their trenches, and sent it to his mother. From seed shed by it she raised the tree, which she presented to be planted in the War Memorial grounds in honour of her own and others' sons who fell at Lone Pine".

According to a reference in Carlyon (2001) and information from a Turkish historian given to Stephen Midgley, pine logs and branches were used to shore up and cover the Turkish trenches, and that these came from various woodlots and hedgerows on the Peninsula, or possibly brought in from Constantinople. We think it is likely that it is from such branches that the cone of *Pinus halepensis* was collected and eventually found its way back to Australia (and later New Zealand), and into our history.

Figure 4. **Pinus halepensis,** *Australian War Memorial, Canberra, Australia.*



Figure 5. The plaque beside the Aleppo pine (Pinus halepensis), Australian War Memorial. Canberra.



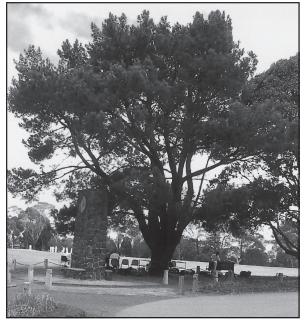
In 1990 two trees were taken back to Gallipoli with war veterans who attended the memorial service to mark the 75th anniversary of the battle of Lone Pine. Since the 1980s

many trees have been grown by both seed and grafting techniques from material collected from the tree at the Australian War Memorial. These have been disseminated to many organisations including RSL branches and clubs, schools and other interested organisations. Yarralumla Nursery now propagates a number of trees from seed collected from the tree at the Australian War Memorial. These are generally available throughout the year and are free of charge to RSL branches, schools and other organisations who would like to use them for ceremonial purposes. Seed is also available on request.

Melbourne and Warrnambool, Victoria: During the withdrawal from Gallipoli, a soldier, Sergeant Keith McDowell, picked up a pine cone from the original Lone Pine and placed it in his haversack as a souvenir. Sergeant McDowell carried the cone for the remainder of the war and when he returned to Australia, gave it to his aunt, Mrs Emma Gray of Grassmere near Warrnambool, Victoria. "Here Aunty, you've got a green thumb, see if you can grow something out of this," the late Mrs Gray's son Alexander recalled. But it wasn't until some 12 years later that Mrs Gray planted the few seeds from the cone, four of which sprouted and grew into little trees. One was planted in Wattle Park, Melbourne in 1933 (Fig. 6), another at the Shrine of Remembrance in Melbourne, another (on 18th June 1933) at the Soldiers Memorial Hall at The Sisters near Terang just north-east of Warrnambool, and the fourth, on 23 January, 1934, in the Warrnambool Botanic Gardens.

In 1964 Legatee Tom Griffiths, then President of Warrnambool Legacy, put forward the idea that more seedlings should be raised in the Jubilee Year of Gallipoli from the established trees with the object of planting memorial trees throughout Australia in memory of those who fell in action at Lone Pine in 1915. Melbourne Legacy undertook the propagation and distribution of seedlings. With the assistance of the Shrine of Remembrance Trustees, permission was granted by the Melbourne City Parks and Gardens Curator to harvest a limited number of cones from the 24th Battalion tree at the Shrine and these were gathered by the Forests Commission and after the necessary preparatory treatment were planted in the Commission's nursery at Macedon. Approximately 150 seedlings were raised from these cones by Dr Grose, Director of Silviculture. Melbourne Legacy's Commemoration Committee was responsible for the collection, propagation, presentation and dedication of Lone Pines from the 24th Battalion tree at the Shrine of Remembrance.

On the 14th September 1989 further seedlings were collected with the hope of raising 1000 trees from the seeds. This could not have been done without the invaluable assistance of the Department of Natural Resources and Dr Peter May at the Victorian College of Agriculture and Horticulture in Richmond, Victoria. Thus Legacy is helping to keep the memory of the Gallipoli "Lone Pine" alive - its spirit lives on today. Presentations are made to schools, ex-service organisations and interested bodies by Legacy Clubs in the hope that they will be cherished as a *Figure 6. The Turkish red pine* (**Pinus brutia**) *tree, planted in 1933, at Wattle Park, Melbourne, Australia.*



symbol of Australian nationhood and of its pride, devotion, courage, selflessness and sense of service to others.

All these trees are Turkish red pine (*Pinus brutia*) - the common pine of Gallipoli, and not Aleppo pine (Pinus halepensis) as has commonly been mention in the records.

Traralgon, Victoria: In Traralgon in the Gippsland Valley, there is a *Pinus brutia* tree growing in a park with a plaque commemorating the First World War.

The New Zealand Connection

Waikumete Cemetery, Waitakere City, Auckland: In Waikumete Cemetery, Waitakere City, near the crematorium, is a pine tree beside which is a plaque stating that the tree was reputedly descended from Gallipoli, Turkey. It is a Canary Island pine (*P. canariensis*) of which there are several handsome specimens of narrow conical form and thick bark at Waikumete (Figure 6). Its Gallipoli provenance would seem highly questionable - or at least inappropriate - as the common pine there is *Pinus brutia*. It is presently 55 cm DBH and 11 m tall. The inscription (Figure 7) reads: "The Lone Pine- This tree, a descendent of the Gallipoli Lone Pine, was planted by Western Suburbs RSA in remembrance of the fallen. 20th August 1961".

Auckland War Memorial Museum: A commemorative pine tree - a radiata pine (*Pinus radiata*)- was planted by Lt Col. Cyril Bassett VC on Anzac Day, 1950, in front of the Museum, where it still stands (Blackley 1997). It is peculiar, moribund tree (Figure 8). The tree is said to have been grown from a seedling taken from Lone Pine Ridge at Gallipoli. As the tree is obviously not going to survive very much longer, a new tree - an Aleppo pine (*Pinus halepensis* from Motuihe Island - was planted near it on 27 August 2003 (Cameron 2003).

feature



Figure 7. The commemorative Canary Island pine (Pinus canariensis), Waikumete Cemetery, Auckland, New Zealand.

Figure 9. The radiata pine (**Pinus radiata**) *in front of the Auckland War Memorial Museum.*



Paeroa: A tree was planted by J. Jensen at Primrose Hill, Paeroa, near the War Memorial on a hill above the town. The seeds were reputed to have come from the Melbourne Botanic Gardens from a tree which was a progeny of the Gallipoli Lone Pine, said to be *Pinus halepensis*, which grew close to Brighton Beach, Anzac Cove. Another tree was planted on a local Paeroa Golf Course (Burstall & Sale 1984). The Primrose Hill tree is not there now, but the one on the golf course is still alive and well - a gnarled veteran - and it is *Pinus brutia*, not *Pinus halepensis* (Figure 10). Figure 8. The plaque beside the Waikumete Canary Island pine.



We can therefore assume that the Primrose Hill trees was also *P. brutia*. The Paeroa Golf Course tree could well be a genuine descendant of the Lone Pine from Sgt McDowell's original cone, derived from one of the 1933-34 trees planted in Melbourne and Warrnambool, though there is no tree from McDowell's original seeds recorded as planted in the Melbourne Botanic Gardens.

Figure 10. Turkish red pine (Pinus brutia), Paeroa Golf Course, planted in 1957 - possibly New Zealand's only descendant of the Lone Pine of Gallipoli, from the cone brought back by Sgt Keith McDowell after WW I.



Te Puke: A small pine tree behind the RSA club rooms, Oxford Street, Te Puke, is *Pinus halepensis*.

Te Mata Peak, Havelock North: There is a lone radiata pine (*Pinus radiata*) high up on Te Mata Peak, Havelock North (Figure 10). It is a remarkable tree, with a dbh of 2 m, height of 17 m, and a crown spread of 22 m. It has a healthy, dense crown supported by a framework of c. 20 large, vertical branches. The inscription is shown in Figure 11. As described below, the original tree planted was evidently a *Pinus brutia* from the Lone Pine descendant in Melbourne. However, it must have died and been replaced with a radiata pine.

Local information on the tree (from the Internet) describes it as follows:

"On the upper slopes of Te Mata Peak, Havelock

North, Hawkes Bay on a ridge just to the south of the summit lookout, there stands a lone Aleppo pine tree *Pinus halepensis*. It is well established, with very dark green foliage and bark coarse and grey in colour. The lower branches reach almost to the ground in places and the prevailing winds have given the tree a distinctive easterly bent. Largely untended as it grew, the tree has developed more than one main trunk, giving it a rather bushy appearance. From a distance the tree appears as a distinctive black blob on the ridge and can be seen from almost every place on the Heretaunga Plains with a view of the Te Mata summit.

"That pine is a 'grandchild' of a tree that once stood upon the approaches to 'Plateau 400' in Gallipoli, the scene of a major diversionary offensive launched by the 1st Australian Infantry Division on 6 August 1915. The Turks had cut down all but one of the pines that had clothed the slopes, and so the ridge became known as Lone Pine Ridge. (In three days of fighting there the Australians lost more than 2000 men and the Turks losses were estimated at 7000. Seven Victoria Crosses were awarded). While the Australians launched their feint against Lone Pine Ridge, Frederick (Mick) Howard of Hastings and his mates of the Ruahine Regiment (part of the Wellington Regiment) started moving on up toward to the summit of nearby Chunuk Bair. The attack, aimed at capturing Chunuk Bair, was initially successful, but unfortunately the objective was lost to a Turk counterattack after the Wellingtons were relieved in place. When the allies were forced to retreat the Wellingtons got their unmarked graves where 760 comrades fell.

"Frederick (Mick) Howard of the Ruahine Regiment also survived the war, and sometime afterward while holidaying in Wellington with his wife he met an Australian named Jack Marshall, also a Gallipoli veteran. They met on a tram, and naturally with their shared experiences struck up a conversation, which stemmed into lasting friendship. The two corresponded regularly, and on one occasion Jack sent Mick a pine cone taken from the "Lone Pine" tree at the Melbourne Shrine of Remembrance. Mick Howard arranged with a Mr Mackenzie, then the gardener at Cornwall Park, to have seeds propagated from the cone. One tree was subsequently planted by Mick at Te Mata and another at the Cemetery on Puketapu Hill at Taradale. According to Mick Howard's grandson, Paul Howard of Wellington, 'My Grandfather wanted to plant a tree on Te Mata as the terrain was so representative of Gallipoli,' he says. 'It is no coincidence that the view from the summit is not too dissimilar to the view he and his comrades would have had for the 36 hours the Wellingtons stood virtually alone and with no support on Chunuk Bair. The main difference being the earth is clear there of the blood that soaked the trenches in which the Hawke's Bay and other Wellington Regiment men and boys fought and mostly died in those hours.

"The true story of the lone pine upon Te Mata is largely unknown or forgotten. Some say, or would like to believe, that the tree on Te Mata was put there by/at the behest of a prominent Hawkes Bay family in honour of one of their family lost at Gallipoli. This is entirely untrue - the tree was planted by the quite unpretentious Frederick (Mick) Howard Figure 11: The Te Mata Peak Anzac pine - a lonesome, gnarled old radiata pine.

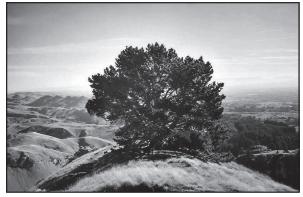


Figure 12. The sign beside the Te Mata Peak tree.



of Hastings to honour all those who served in that Great War, and in particular for all those Hawkes Bay lads who so gallantly fought and died.

Today the proud old tree stands watch over the plains, sad and lonely, a veteran and a remnant of a much older stand. On the ANZAC memorial at Chunuk Bair these words appear, engraved in stone: 'From the Uttermost Ends of the Earth'. Those too are fitting words to describe the Lone Pine upon the ridge of Te Mata. Far from 'home', and alone she sings, 'At the going down of the sun, and in the morning, I will remember them...' Lest we Forget."

Wanganui: There is an Aleppo pine (Pinus halepensis) tree at the cenotaph in Queens Park, Wanganui (Figure 12) that has commonly been thought to be a descendant of the Gallipoli Lone Pine (Lawless 1986). It was planted to commemorate the 50th Anniversary of the landing at Gallipoli in the First World War. As pointed out by Colin Ogle, the original 'Lone Pine' was a Turkish (or Calabrian) pine (Pinus brutia) on Plateau 400, a Turkish position at Gallipoli. The site was a scene of fierce fighting between Anzac and Turkish troops in August 1915 and the tree was reputedly destroyed in the battle. Popular belief is that a Gallipoli veteran brought a cone or seed from this tree back to Wanganui and the Queens Park tree was the result. As it is an Aleppo pine, Ogle rightly contends that the Queens Park pine could not be from Gallipoli, but may well have originated from some other theatre of battle in WWI. It is also the only large tree of Aleppo pine in Wanganui and

feature

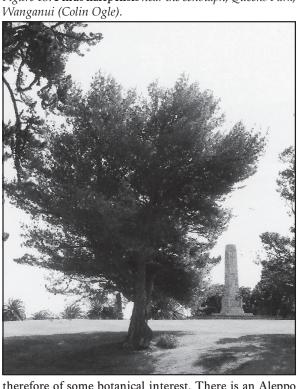


Figure 13. Pinus halepensis near the cenotaph, Queens Park,

therefore of some botanical interest. There is an Aleppo pine (25 m x 60 cm) at Jim & Diana Howard's property "Westoe Woodland Garden", Marton, planted in the late 1960s, which also has Gallipoli connections.

Taradale: The cemetery at Taradale in Puketapu Road has an associated Lone Pine war memorial (a handsome monument in black granite, installed in 1999) near which are two commemorative Aleppo pine (Pinus halepensis) trees. One is an old tree, on record as having been planted in 1951. It is most likely to be a descendant of Benjamin Smith's pine cone. The other is a small tree, planted in 1999 or soon after, following consecration of the memorial.

Stratford: There is a commemorative Lone Pine in King Edward Park, Stratford, likewise an Aleppo pine.

Notes on Pinus halepensis and Pinus brutia

Pinus halepensis Mill

Aleppo pine, halepçam. Mediterranean coast: Morocco, Tunisia, Libya, Spain, France, Italy, Greece, Yugoslavia, Israel, Jordan, Turkey (possibly an ancient introduction). Cones reddish brown when mature, stalked, hanging down (Figure 13), scales with raised umbo. Twigs snap readily. Bark smooth and grey on young branches and shoots. Open habit. Yellowish-green needles, fine, in 2s, shorter and narrower than in P. brutia. The oleoresin is 95% alpha-pinene. There are some old trees on Motuihe Island, Hauraki Gulf (Figure 14), Auckland, where it has naturalised, and numerous examples at Point Resolution, Parnell, Auckland. It is commonly cultivated in Western Australia.

Figure 14: The Lone Pine Memorial, Taradale Cemetery (Barry Keating).



Figure 15: The two Pinus halepensis trees at the Taradale Cemetery- right (back), the 1951 tree; right (front), the 1999 tree (Barry Keating).



Pinus brutia Tenore

Kizilçam, Turkish red pine, Calabrian pine, Calabrian cluster pine. Very important in south-western Turkey. Also Crete and Cyprus, and Iraq. Sensitive to frost. Coastal Mediterranean and Aegean. Winter rainfall zone. Cones erect or ascending, sessile or with a very short peduncle, never deflexed (Figure 15). Buds non-resinous, with recurved reddish-brown scales (Franks 1999). Open crown. Needles in 2s, with some in 3s. The oleoresin contains mostly alpha pinene (60-80%), with beta-pine (12-14%), and delta-3-carene up to 11%. In the Marmaris region of Turkey in particular, a honey is produced from the exudate of scale insects feeding on the branches. It is the most important type of commercial forest honey. The scale insect is Monophlebus hellenicus (syn. Marchalina hellenica) [Homoptera: Coccoidea: Margarodidae]. It blackens the bark of both P. brutia and P. halepensis. Bees feed on the honeydew that it secretes. In a study in the Antalya region, mid-altitude populations have better growth and straightness, even when

Figure 16. Cones of **Pinus halepensis,** *Turkey; note the long peduncles and downward orientation on the branches.*



planted at lower or higher altitudes. It occupies 3.1 million ha in Turkey (Figure 16). New Zealand's best specimen seems to be the tree in the Christchurch Botanic Gardens, and there are others in Eastwoodhill Arboretum, Gisborne, and two impressive specimens in the grounds Scion (the former Forest Research Institute) near the Whakarewarewa School, Rotorua.

Figure 18. Cones of **Pinus brutia**, *Turkey; they are more or less* sessile and held horizontally or somewhat erect on the branches.



Figure 19. Natural forest of Pinus brutia, Antalya, Turkey.



Figure 17. **Pinus halepensis** on cliffs at Motuihe Island, Hauraki Gulf, Auckland, New Zealand.



Acknowledgements

Lachlan Andrews (Melbourne) and Roger Arnold (Canberra) kindly assisted with information and photographs. Colin Ogle (Wanganui) and Chris Ecroyd (Rotorua) supplied information on the Aleppo pine in Wanganui, Barry Keating (Napier) and Eric Kelly (Taradale & Districts RSA) helped with the Taradale tree, and Cliff Lawrence (Stratford) helped with the Stratford tree. Some information on the Lone Pine was obtained from Internet sources.

Authors' addresses

Mike Wilcox, 9 Scott Avenue, Mangere Bridge, Manukau City, Auckland 2022, New Zealand. Email: mike.wilcox@xtra.co.nz

David Spencer, Ensis Genetics, a Joint Venture between CSIRO and SCION (NZ), PO Box E4008, Kingston, ACT 2604, Australia. Email:David.Spencer@ensisjv.com

References

- Blackley, L. 1997. Auckland War Memorial Museum: an architectural history. Auckland War Memorial Museum.
- Burstall, S. W.; Sale, E. V. 1984. *Great trees of New Zealand*. A. H. & A. W. Reed Ltd, Wellington.
- Cameron, E. K. 2003. Aleppo pine planted in the Domain. Auckland Botanical Society News-sheet, October 2003.
- Carlyon, L.A. 2001. *Gallipoli*. Pan Macmillan Australia Pty Ltd.
- Lawless, P. 1986. A walker's guide to Wanganui City. The Whanganui Historical Society.
- Franks, M. 1999. Pinus brutia. Curtis's Botanical Magazine 16(3):173-184.
- Richardson, S. D. 2000. Forestry, people and places. Selected writings from five decades. Business Media Services Ltd, Rotorua, New Zealand.
- Wright, Tony 2003. Turn right at Istanbul: a walk on the Gallipoli Peninsula. Allen & Unwin, Crows Nest, NSW, Australia.