

# World War I and forestry in New Zealand

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## Abstract

World War I influenced the course of state forestry in New Zealand by delaying implementation of the recommendations of the Royal Commission on Forestry 1913. New Zealand's first professionally qualified forester was killed during the war, but post-war scholarships provided opportunities and enabled other New Zealanders to take forestry degrees at Edinburgh. Indeed the war also placed L.M. Ellis, who was to really shape the course of state forestry in New Zealand, in a position where he was able to apply successfully for the position of inaugural Director of Forests in 1919.

## Introduction

Since 2014 there have been numerous publications, some re-examining old themes and others considering the Great War in a new light. Given that the main theatres of war were virtually half a world away from New Zealand it may seem rather trite to pose a question about the impact of World War I on forestry in New Zealand. In this paper I hope to demonstrate that this is not the case and that the war actually had a considerable impact on the course of forestry in this country. For convenience these impacts may be considered in terms of delays, deaths and opportunities.

## Delays

The initial impact of the war was to postpone government action on the report of the Royal Commission on Forestry of 1913 (Goulding, 2013; Roche, 2013). Key recommendations were left in limbo, particularly the development of a classification for forest land, introducing an auction/tender system for standing forest across the entire country, conducting a survey of beech forests to investigate regeneration potential, increasing the exotic forest planting rates, and giving the Forestry Branch within the Lands Department responsibility for indigenous as well as plantation forests.

The outbreak of war also further deferred any proper parliamentary discussion of the Royal Commission's recommendations. The danger here was that decisions

about forestry already long delayed would be further postponed, momentum lost, and the rationale for the prescient recommendations of the Royal Commission would become lost amongst competing agendas. Not until 1919 was the government in a position to revisit the recommendations of the Royal Commission Forestry of 1913 and separate forestry from the Lands Department, as well as advertise for a professionally qualified Director of Forests.

## Deaths

At the individual level one of the over 100,000 soldiers who served in the NZ Expeditionary Force (NZEF) was William Archibald Fraser who enlisted in August 1915 and was in the NZ Field Artillery Brigade. Fraser was also one of the 18,000 who made the supreme sacrifice, being killed in action on 3 September 1918. Fraser's death was especially poignant, not only because he was working in the Forestry Branch of the Lands Department, but because he also held a BSc in forestry from the University of Edinburgh making him one of the first (if not the first) New Zealander to hold a forestry degree.

Certainly Fraser was the only forestry professional in the entire public service at what can be seen in retrospect as a critical time in New Zealand when, as in Australia for instance, professionally staffed forestry departments were beginning to emerge separate from Lands Departments. His reasons for taking the forestry degree at Edinburgh are not documented, but there must have been a considerable amount of individual motivation.

Fraser had matriculated from Otago Boys' High School in 1910 and enrolled at the University of Otago where he passed the medical preliminary year in 1911, but transferred to Edinburgh and entered their forestry programme in 1912. Graduating in 1914, he joined the Forestry Branch of the Lands Department as Assistant Forester at Tapanui in Otago. Under the apprenticeship model then in vogue, where his degree training seemed to be woefully under-utilised, his duties included office work, weeding seed beds and clearing fire breaks, as well as some work planting compartments at nearby Dusky Plantation.

Edward Phillips Turner, the Chief Officer of the Department of Forestry in 1919, observed that 'had he lived there is no doubt he would have risen to a high position in the service' (AJHR, C3, 1919, 9). This opinion seems entirely reasonable, as Fraser would surely have risen to have been at least a Conservator of Forests in the post-war State Forest Service.

## Opportunity for a professional forester

The war also placed one man in the right place at the right time. This was L.M. Ellis, a Canadian and a graduate of the Toronto Forestry School under Bernhard Fernow in 1911, who later worked as a forester for Canadian Pacific Railways until 1915. Ellis enlisted in the Canadian Forestry Corps in 1916 and served in France, rising to the rank of Captain. After the war he found employment with the British Forestry Commission as an Advisory Officer for the Board of Agriculture in Scotland. It was at this time that he noticed and applied for the post of Director of Forests in what was to be a newly-established Forestry Department in New Zealand. Ellis was interviewed in London, and indeed his being in the UK in what was a very Imperial affair was essential to his being appointed. Other overseas candidates within and beyond the Empire were never really in contention.

Ellis was to be a more than a fortunate choice, for his professional training and energy was to be critical to the direction of forestry in New Zealand during the 1920s. Added to this, Peter McKelvey (1989) has pointed to lessons Ellis would have taken from French forestry. In addition, Ellis was with the British Forestry Commission at a point when it was planning an

expansive afforestation programme, an endeavour he would later draw on to good use in New Zealand.

On arriving in this country in 1920, Ellis completed a report on 'The Forest Conditions of New Zealand' in which he laid out requirements for trained technical forestry officials and the need for local university training in forestry. In the absence of professionally qualified foresters, Ellis was fortunate to be able to recruit to the fledgling State Forest Service established in the aftermath of his report three New Zealanders for whom the war provided an opportunity to retrain in forestry – C.M. Smith, Frank Foster and Robert Steele.

## Opportunity for New Zealanders in forestry

For men in the NZEF the end of the war provided unprecedented educational opportunities. Some 60 scholarships were made available in April 1919 for selected men to undertake university study in the UK. Smith, Foster and Steele opted to study forestry but their reasons for so doing are not recorded. They would not return to New Zealand until 1922, by which time they had been absent from the country for a not inconsiderable seven to eight years. They were to study at Edinburgh. The reasons for this choice are not documented and Fraser may have unwittingly paved the way. Other British forestry courses, such as the Diploma of Forestry at Oxford, would in any case have likely required an Oxford undergraduate degree in natural sciences.

Smith and Foster would contribute in significant ways to forestry in New Zealand. Cecil McLean Smith, always 'C.M.', began his forestry career as a



Frank Foster



C.M. Smith

Forest Ranger in Invercargill. Prior to World War I he completed a BA at the University of Otago in 1913 and was on the staff of Otago Boys' High School. C.M. enlisted on 8 May 1915 in the Otago Infantry Battalion and later served in Egypt and on the Western Front in the 4th Machine Gun Company, finishing the war as a Temporary Captain.

Over the next decade he rose quickly through the ranks – Forest Assistant in Invercargill in 1925, Conservator of Forests Nelson in 1926 and Chief Inspector of Forests in 1930. He was one of the foundation members of the New Zealand Institute of Forestry (NZIF) (Kennedy, 1961). C.M. was an erudite writer on forestry (e.g. Smith, 1937, 1948), although his career was not without controversy. In 1950, after unsuccessfully applying for the position of Deputy Director of Forests, he left the Forest Service to become head of the Botany Division of DSIR.

Frank Foster ultimately held senior positions in the State Forest Service and its successor the New Zealand Forest Service. He was working as a Customs Officer in Wellington and had completed a BA part-time when he enlisted on 11 August 1914, serving as a Staff Sergeant in the NZ Medical Corps. Joining the State Forest Service in 1922 as Forest Ranger in Wellington, by 1925 he was a Forest Assistant in Wellington on £315 p.a., transferred to Auckland in 1926, and as early as 1928 was serving as Acting Conservator of Forests and from 1930 as Conservator of Forests in Nelson.

In 1944, he shifted to head office as Working Plans and Silvicultural Officer and the next year became Inspector in Charge of the Management Division, a position he held until his retirement in 1950. Foster was a calm and sensible presence in the head office of the Service. Thereafter he enjoyed a second career as a Forestry Liaison Officer with the Soil Conservation and Rivers Control Council until the year before his death in 1963 (Anon, 1964). He was an inaugural member of the NZIF and its first secretary.

Robert Steele was a school teacher before the war. He enlisted in 1914 and left with the main body in October serving at Gallipoli and on the Western Front as a Lieutenant in the Machine Gun Company. On gaining qualifications in agriculture and forestry from Edinburgh he joined the newly-formed State Forest Service as a Forest Ranger in Nelson in 1922, and by 1925 was promoted to Forest Assistant. In 1926, Steele spent six months on a staff exchange with the Forestry Commission in NSW. But in early 1928, after an unsuccessful application for a Conservator of Forests position and possibly feeling his career was lagging compared to Frank Foster and C.M., he resigned to take up a vacancy with the Department of Agriculture in Tasmania. The move did not, however, prevent him from becoming one of the inaugural members of the NZIF.

There is another man who secured a forestry scholarship about whom less is known as he did not return to New Zealand and secure employment in the

State Forest Service – Matene Te Heu Heu. In February 1916, Te Heu Heu departed New Zealand as a Sergeant in the Third Maori Contingent. His occupation was described as 'law'. He had enlisted in August 1915 and later served as a Second Lieutenant in the NZ Army Service Corps.

A further name can be added to this list, Charles Foweraker, who had served in the Canterbury Regiment from 1916 and who started his career as a school teacher. He completed an MA in botany and when hostilities broke out was a Demonstrator in Biology at Canterbury University College. Foweraker initially opted for further study in botany at Cambridge University. Amongst the Cambridge botanists whose courses he would attend was the famous ecologist Arthur Tansley. Foweraker, however, changed to the Diploma of Forestry shortly after his arrival in Cambridge. He returned without having actually sat his examinations but with detailed notes on forestry theory and practice.

Dr Charles Chilton, the Rector of Canterbury University College, was a keen advocate for the establishment of forestry teaching in Christchurch. T.W. Adams, the noted tree planter, had left a sizeable endowment to the college for this purpose in 1919 (McKelvey, 1991). This combination of circumstances may explain Foweraker's change of programme. Back at the university in 1920, he delivered a series of public lectures on forestry. These had a botanical orientation but included silviculture, forest utilisation, and forestry in New Zealand and abroad (Anon, 1921).

In 1925, Foweraker would be appointed to a newly-founded forestry school at Canterbury (McKelvey, 1999). Along with Frank Hutchinson (and Hugh Corbin in Auckland) he played an important role in forestry education in New Zealand, and from 1925 until its closure in 1934 the school trained the first cohort of New Zealand forestry graduates. The complicated politics of the federal University of New Zealand had delivered two under-funded and under-resourced forestry establishments. Hugh Corbin at Auckland was Professor of Forestry (1925–1930) but had no dedicated staff.

## Conclusion

The war delayed government action on state forestry in New Zealand until 1919–1920. The only professionally qualified New Zealand forester was killed on active service. Yet in the aftermath of the conflict NZEF scholarships enabled some men to gain forestry degrees at Edinburgh and on graduation gain employment in the State Forest Service. I do not intend to make an invidious comparison between lives and say that Fraser's death was offset by the hiring of Smith, Foster and Steele, but rather would observe that his demise reduced the cohort of trained foresters, and one with some experience to boot, available to Ellis.

Perhaps more importantly to the actual trajectory of forestry in New Zealand, the war placed Canadian L.M. Ellis in the UK, which was crucial because the



appointments process was carried out via the New Zealand High Commission in London. Applicants from further afield had little prospect of being appointed. The group of foresters that Ellis was able to hire, although small in number were technically well trained, energetic, committed to their profession and confident about what they could deliver. Faced with the enormity of the task of implementing state forestry and few in number they were not deterred, and over the course of the 1920s and early 1930s they emphatically changed the character of forest management in New Zealand.

The final words can rest with C.M., Foster and Steele. The presence of a number of New Zealand forestry professionals in the State Forest Service from 1922 helped in other ways by ensuring that there was no simple division between expatriate Brits (except for the Norwegian Arnold Hansson and Ellis himself) with forestry degrees leading the service and unqualified New Zealanders with practical experience in support roles to the detriment of the esprit de corps of the organisation as whole.

## References

- Anon, 1921. Scientific Forestry. *N.Z. Building Progress*, 16: 210–211.
- Anon, 1964. Obituary: Francis W. Foster. *New Zealand Journal of Forestry*, 9: 228–229.
- Department of Forestry. *Appendices to the Journals of the House of Representatives*, C3, 1919. Wellington, NZ.
- Ellis, L.M. 1920. Forest Conditions in New Zealand and Proposals for a New Zealand Forest Policy. *Appendices to the Journals of the House of Representatives*, C3a.
- Foster, Francis William. WWI 3/123, WWII 2/18/704, AABK 18805 W5562 0130981. Wellington, NZ: Archives NZ.
- Foweraker, Charles Ethelbert. WW1 15514, AABK 18805 W5537 004712. Wellington, NZ: Archives NZ.
- Fraser, William Archibald, 1911. *University of Edinburgh, Graduation in Science, Curriculum Schedule*. Edinburgh, Scotland: Centre for Research Collections, Edinburgh University Library.
- Fraser, William Archibald. WW1 2/2416 – Army AABK 18805 W5537 00042292. Wellington, NZ: Archives NZ.
- Goulding, C. 2013. The New Zealand 1913 Royal Commission on Forestry. *New Zealand Journal of Forestry*, 58(1): 3–6.
- Kennedy, Dave. 1961. Obituary: C.M. Smith (1892–1961). *New Zealand Journal of Forestry*, 8: 517.
- McKelvey, P. 1989. MacIntosh Ellis in France. *New Zealand Journal of Forestry*, 34: 15–18.
- McKelvey, P. 1991. Thomas William Adams 1842–1919 – Early Farm Forester. *New Zealand Journal of Forestry*, 36: 23–25.
- McKelvey, P. 1999. Earlier Professional Schools of Forestry in New Zealand. *New Zealand Journal of Forestry*, 43: 30–34.
- Roche, M. 2013. The Royal Commission on Forestry 1913 Viewed from 2013. *New Zealand Journal of Forestry*, 58(1): 7–12.
- Smith, C.M. 1937. The Use of Exotic Species in Forestry. *New Zealand Journal of Forestry*, 49: 62–77.
- Smith, C.M. 1948. Planned Regeneration of New Zealand Indigenous Forests. *New Zealand National Review*, 31(8): 103–113.
- Smith, Cecil McLean. WWI 8/2802, WWII 805722, AABK 18805 W5922 0358206. Wellington, NZ: Archives NZ.
- Steele, Robert Blackwood. WW1 12/604 AABK 18805 W5922 0108813. Wellington, NZ: Archives NZ.
- Te Heu Heu, Matene. WW1 16/894a AABK 18805 W5553 0112868. Wellington, NZ: Archives NZ.

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