Main trunk lines

South Island main trunk

The South Island’s main trunk line was completed in the late 1870s. Christchurch was connected to Timaru in 1876 and to Dunedin two years later, cutting travel time between Christchurch and Dunedin to around 11 hours. The final section between Dunedin and Invercargill was opened, amid much fanfare, in January 1879. More than six decades later, in 1945, the main trunk line was extended north to Picton.

North Island main trunk

The central North Island posed greater challenges to rail-builders than the South Island’s eastern plains. A main trunk railway between Auckland and Wellington was discussed from the 1860s, but progress was slow. By 1880 Auckland’s southern line reached Te Awamutu, and there were isolated sections of line between Wellington and Wairarapa, and in Taranaki, Manawatū and Hawke’s Bay. Further progress was blocked by rugged mountains, dense forests and the Māori stronghold of Te Rohe Pōtae (the King Country).

Despite these challenges, exploratory survey work began in 1882. Two years later a Parliamentary committee opted for a central route rather than western or eastern alternatives. The government also reached a crucial agreement with Ngāti Maniapoto leaders to open up the King Country to the railway.

On 15 April 1885 politicians and Māori leaders ceremonially ‘turned the first sod’ of the central section by the Puniu River, near Te Awamutu. It would take 23 years to complete the 680-kilometre North Island main trunk (NIMT). Progress was slow in the 1890s, but work intensified after 1900.

Working on the line

Life was hard for the men who built the North Island main trunk line. The work was dangerous and their makeshift shantytowns offered few comforts. G. G. Stewart, then a railways cadet but later the publicity manager, visited Raurimu in the winter of 1908 and found that ‘[c]ontinuous heavy rain, with occasional hail, sleet and snow, much fog, miry clay, and a tangled bed of wild underground knitting together the forest giants, made a tough job for the workers.’

The Raurimu spiral and viaducts

By 1904 the northern and southern sections had reached Taumarunui and Taihape. South of Taumarunui, the steep climb up to the
Waimarino plateau was accomplished via the famous Raurimu spiral, which featured two tunnels, three horseshoe curves and a complete circle. Towering steel viaducts bridged deep ravines at Makatote, Hāpuawhenua, Mangaweka, Makōhine and elsewhere.

Closing the gap

By May 1908 only the 24-kilometre gap between Makatote and Ōhakune remained. The Public Works Department rushed to complete the line by August so a Parliament Special train could carry MPs to Auckland to greet the US Navy’s visiting Great White Fleet – a journey of more than 20 hours.

The opening of the NIMT

The NIMT was formally opened on 6 November 1908, when Prime Minister Sir Joseph Ward drove home the final spike at Manganuioiteao. In December the government took control of the private Wellington and Manawatu Railway Company, whose line then became part of the NIMT.

From February 1909 regular express trains linked Auckland and Wellington in 18 hours.

The NIMT’s importance

The completion of the NIMT was a major landmark in New Zealand’s history. It fostered economic and population growth in the North Island, opening up Pākehā access to the Māori-dominated interior, and accelerating the destruction of the great forests that once covered much of the island. For most New Zealanders, the NIMT was a proud symbol of progress, ushering in a golden age of rail transport in the first half of the 20th century.

NIMT electrification

The NIMT was a steam railway until the 1950s (apart from the Wellington–Paekākāriki section, which was electrified in 1940). The electrification of the whole NIMT was proposed in the late 1940s, in response to post-war coal shortages, but the government opted instead for diesel propulsion. The idea was revived during the oil shocks of the 1970s, and electrification of the central section between Hamilton and Palmerston North was approved in 1980.

This project involved the erection of more than 10,000 concrete poles. Many tunnels had to be ‘daylighted’ or opened up by having the covering earth removed. Others needed their floors lowered to accommodate overhead wires. The electrification was completed in 1988, at a cost of around $250 million. Diesel trains continue to operate on the Auckland–Hamilton and Palmerston North–Wellington sections.

Footnotes

Biographies

Robert West Holmes, 1856–1936
Turning the first sod, South Island main trunk line (1st of 2)

Railway events drew crowds in 19th-century New Zealand, as they represented progress and development. The building of new lines was marked by 'first sod' and 'last spike' ceremonies. Here, people gather as the first sod is turned for the Christchurch–Timaru section of the South Island main trunk line, around 1865.

About this item
Alexander Turnbull Library
Reference: 1/2-020116; F

Permission of the Alexander Turnbull Library, National Library of New Zealand, Te Puna Mātauranga o Aotearoa, must be obtained before any re-use of this image.

How to cite this page: Neill Atkinson. 'Railways', Te Ara - the Encyclopedia of New Zealand, updated 30-Jul-10. URL: http://www.TeAra.govt.nz/en/railways/2/1/1