



1 Tubes in the trench with swept bends accounting for changes in direction. 2 Filling in the trenches after extension is complete.

LAMSON PNEUMATIC TUBE EXTENSION

Harrison Grierson for Bay of Plenty District Health Board

Project Location: Tauranga



As the Bay of Plenty DHB's preferred Civil Engineers, Harrison Grierson was engaged to play a key role in designing a life-saving pipeline linking critical services to a new building at Tauranga Hospital.

The Lamson pneumatic transport system is a lifeline in many hospitals. It links critical care units with vital services by transporting drugs, scripts and blood plasma around the network using a series of tubes, blowers and diverters, controlled by scanners and a central computer system.

The Tauranga Hospital project involved developing the longest subterranean Lamson tube network in New Zealand. At 330m long, it superseded the previous record holder by over 300m.

Harrison Grierson was primarily responsible for the key technical issues of route selection, pipe material and protection, and developing a staging plan to minimise impact on the hospital. Being the first project to use this scale of buried duct, we needed to consider all options, eliminate risks, and do everything we could to ensure a successful outcome.

This involved a careful route selection to negotiate the complex array of existing buried services. An extensive assessment of various construction options and materials followed to identify the ideal carrier tube material.

A comprehensive, high standard, quality assurance programme ensured that the best environment was provided to minimise any risks to the tubes, and ensured that Lamson (NZ) Ltd had the confidence in the end product to provide guarantees to the BOPDHB for the performance of their system.

This was the ultimate outcome and we are proud of our role in this life saving project.

Judging & Copyright Statement

This project is an entrant in the 2016 INNOVATE NZ Awards of Excellence competition. The winners will be celebrated at our Awards Gala Dinner on Saturday, 12th August 2017 in Taupo.

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