

Specifications for Auckland's Trains



Security features

- An onboard CCTV camera system will operate continuously in all cars, providing images to the driver from any of the 16 cameras inside and outside the train
- Emergency call points throughout the train will allow passengers to communicate directly with the train crew in the event of an incident
- All doors feature obstacle detection so that if something becomes jammed in the door it will open and re-close

Technical features

- 155 tonnes (weight of 3 cars, fully loaded)
- Overall length: 72m (3 cars)
- Power supply: 25kV AC overhead supply
- 12 doors (4 per car) with 1.45m open width
- Maximum acceleration rate: 1m/s/s
- Maximum braking rate: 1m/s/s



Auckland's electric trains will result in a major improvement to the level of passenger service on the suburban rail network.

Features and benefits

- 57 electric trains comprising 2 motor cars and 1 trailer car
- Each train has 232 seats plus standing room
- The trains are environmentally friendly, energy-efficient, quieter, and produce no air pollution
- Ensuring passengers are comfortable and safe is a key objective in the design



Operating features

- The maximum operating speed is 110km/hr
- To provide improvements to efficiency each train has regenerative braking, allowing energy to be produced by the train and fed back into the 25kV supply - a recovery of up to 20% of the energy used
- Noise reduction: the 25kV power supply means the trains are very quiet both externally and internally – an important consideration for people living and working near the rail network
- Sliding doors provide a good weather and sound proof seal

- There's no air pollution because the trains are electric and there are no exhaust fumes
- Each train has 232 seats plus standing room
- Fresh, modern décor and non-slip flooring
- The trains have wider doors making passenger flow on and off the trains easier and faster
- The central carriage is at platform level making it easier for wheelchairs, prams or bikes. Automatic ramps mean a better transition between the platform and the train

- Open gangways between cars allow movement from one end of the train to the other
- Space under seats for storage
- All doors have obstacle detection systems so they automatically open and re-close if something is trapped in the door
- State-of-the-art air-conditioning and double glazing to ensure the train interior is comfortable for passengers and crew through the range of Auckland's weather conditions
- International best practice passenger information systems ensure that both audio and visual information is easy to understand

Once the full fleet is in service, combined with timetable improvements, the trains will get passengers to their destinations quicker. They will be able to shave approximately 10 minutes off travel from Papakura to Britomart.