CANTERBURY STATE HIGHWAY PLAN & FORECAST

KEY TRANSPORT ISSUES

Transit, along with local and central government are working together to achieve a sustainable land transport system in new ways.

Transit will work closely with regional and district councils to ensure that any substantial upgrading in the next 10 to 20 years is properly considered and planned, in order to relieve congestion and support regional growth strategies. This requires agreement on amendments to road and public transport plans and shared funding responsibilities for both local and national infrastructure and services.

Planning activities such as Canterbury's Regional Land Transport Strategy, Long-Term Council Community Plans, and Transit's State Highway Forecast all help in this process.

In meeting the objectives of the NZTS and LTMA the key regional transport issues for the Canterbury region include:

- > Road safety
- Congestion: traffic on the main arterial routes within Christchurch City is increasing by 4 percent each year. Journeys during peak periods are regularly taking 15-20 minutes longer than during off-peak periods
- Ongoing residential development on the outskirts of Christchurch. The Greater Christchurch Urban Development Strategy has implications for transport and for the social, economic and cultural wellbeing of the Christchurch community, including integrating other forms of transport with the road network
- Ongoing commercial development to the west of Christchurch, around SH1 and SH73
- Dairy activity in south Canterbury centered on the Clandeboye Dairy Factory
- › Access to the Ports of Lyttleton and Timaru
- Continuing tourism development around Kaikoura, south Canterbury and the Mackenzie Country

- Provision of passing opportunities on SH1, north of Kaikoura and south of Ashburton
- > Significant heavy vehicle growth on SH1
- High car ownership and use in Christchurch and Canterbury.

How we plan to address these key issues

While there is a significant emphasis for Transit in Canterbury on maintaining the existing state highway network, there are a number of activities prioritised in the 10-year State Highway Forecast to reduce congestion, improve road safety, and improve the route security and efficiency of routes into and out of Canterbury.

A further priority is managing the connections between state highways and local roads, as well as access to state highways from adjacent land, to support the strategic long distance travel function of key arterial roads.

Large improvement projects (with construction costs of more than \$3.4M) have been indicated for 10 years while projects with construction costs of less than \$3.4M are proposed over the next three years and are shown in the table. The locations of Canterbury projects in the 10-year forecast are shown on the map.

Travel Demand Management

The highest priority for the Canterbury region is the implementation of measures to support a Travel Demand Strategy outlined in the Regional Land Transport Strategy. Travel Demand Management (TDM) is a combination of activities that together seek to reduce the rate of traffic growth by measures such as encouraging the use of alternative modes.

Transit intends to implement TDM through infrastructure improvements for public transport on state highways that coincide with core public transport routes, such as Main North Rd. Transit will continue to work with Environment Canterbury and Christchurch City Council to further the development of the Christchurch Travel Demand Management Strategy.

Access to the North

Further project investigation and scoping will be undertaken on improving access on northern approaches to Christchurch. Specific activities include a four-lane arterial to link the Northern Motorway with QE2 Drive, QE2 four-laning and the Western Bypass of Belfast, (Christchurch Northern Links Study).

Access and Mobility around Christchurch

The duplication and extension of the Christchurch Southern Motorway (SH73) south of the city and the four-laning of the Western Corridor (SH1) between Sawyers Arms and Waterloo Road will ensure efficient travel along these key routes.

Road Safety - Secure and Efficient Transport Corridors

Transit has identified a number of activities to improve the safety and efficiency of sections of state highway, including intersections. Proposed improvements are aimed at reducing congestion and contributing towards more efficient transport corridors. Further work on the management or removal of roadside hazards will continue.

Passing Opportunities

Limited passing opportunities in some parts of the region's road network lead to driver frustration and crashes. Transit plans to progress further passing lanes on SH1 between north of Kaikoura and south of Ashburton.

Walking and Cycling

Walking and cycling activities identified for Canterbury include Christchurch City Cycle Lane Safety Improvements and investigations into options for improving cycle safety at "pinch points" around Canterbury.

Stock Effluent Disposal Facilities

As part of a national programme to provide a safe and convenient network of stock effluent disposal facilities we propose to progress the Pareora Stock Effluent Disposal Facility, south of Timaru, and the Kaikoura Stock Effluent Disposal Facility, both on SH1.

Strategic Studies

We are proposing to undertake a number of strategic studies for the Canterbury region, to improve our long-term planning and assist good decision-making.

The lack of alternative access to and through the West Coast means that SH73 is of great strategic importance to the West Coast economy. A strategic study looking at route security is to be undertaken. A strategic study for Mingha Bluff to Rough Creek on SH73 will also be undertaken to identify state highway improvements at reasonable cost.

Maintenance and Operations

The safe operation of the state highway network is a key function for Transit. Processes are in place to manage traffic efficiently, provide consistent and reliable information for road users, undertake maintenance work on the highway in the safest and least disruptive way, monitor locations where crashes occur and, where appropriate, take corrective action.

The state highway network is a \$15 billion transport infrastructure asset that demands sophisticated and effective management. Transit has systems in place to do this, ranging from infrastructure and traffic databases to natural features inventories, long-term deterioration modelling tools, and annual condition data collection supported by advanced contract delivery methods and regular performance reporting.

Further, improvements to the way traffic is managed at incidents and in congested urban areas are being investigated and implemented.

Maintenance activities make up the majority of the forecast expenditure in the Canterbury. In addition to preserving the highway network and undertaking maintenance and improvements to meet future levels of service, we propose to:

- Vundertake 32km of resurfacing, including 1km with low noise surfacing
- > Strengthen 5km of state highway
- Improve the availability of road condition information to road users at critical points on the network using electronic variable message signs, as already in place on SH7 (Lewis Pass and Rahu Saddle)

- > Introduce thermal mapping of the inland network to better predict where ice will occur
- Introduce more road weather stations to improve road condition predictions and maintenance team responses to ice and snow, and continue to trial the use of the de-icer calcium magnesium acetate
- Continue risk analysis of rock falls and river erosion and prioritise work accordingly
- Strengthen a number of bridges on the network to reduce their vulnerability in the event of a severe earthquake
- Continue to maintain and improve the coastal defences of SH1, north and south of Kaikoura
- Work with the Department of Conservation to ensure that maintenance work within New Zealand's national parks represents world best practice
- Continue with a programme of improvements to tunnels to more closely meet international standards.