

Christchurch Northern Corridor Waimakariri Bridge

PROJECT OVERVIEW

13 AUGUST 2018



The Project

The CNC project provides new and improved options for all travel modes: cyclists, pedestrians, private vehicles and freight, and allows for improved public transport.

The new CNC motorway, which includes four - laning on QEII Drive and Cranford Street, will improve access to the central city, industrial hubs on the eastern side of Christchurch, the Lyttelton Port and enable further development in the Belfast area.

A shared pedestrian and cycle path will run the entire length of the CNC. With more options for travellers, traffic congestion will be reduced for both through-traffic on the new motorway and local trips on local roads.

WORK ON THE WAIMAKARIRI BRIDGES STARTS IN LATE AUGUST

As part of the Christchurch Northern Corridor (CNC) project the Waimakariri Bridges will be widened in coming months to provide for a third northbound lane and a planned third southbound lane, which will operate as a high occupancy vehicle (HOV) lane during morning peak.

The widening will take place on the inside of the existing bridges. The NZ Transport Agency is currently investigating the exact location and length of the southbound HOV lane, as well as overall safety. A new cycleway (clip-on) will be constructed on the outside of the southbound bridge.

The bridge widening will start from **Monday 27 August** and will take around 16 months. Provision was made for additional lanes during construction of the bridges in the early 1970's. Because of this, no new permanent

structures need to be built in the Waimakariri River bed although a great deal of manual labour will still occur. This includes drilling more than 11 thousand holes to install steel reinforcing bars to connect the new sections.

While this work is underway, there will be minor to medium impact on traffic. **We will have to regularly close one lane on either the north or the southbound bridge, which we will do during off peak hours only.**

During lifting operations we will have to close the entire southbound bridge. We will then use contraflow traffic control onto the northbound bridge: both northbound and southbound traffic on one bridge. It is during contraflow traffic control that you may experience delays and congestion during off peak hours.

The lifting operations are planned to start in November this year and will happen once or twice a week. In total we will lift 34 beams in place.



REDUCED
COMMUTER
TRAVEL TIME



REDUCED
CONGESTION



IMPROVE
SAFETY



IMPROVE
WALKING
AND CYCLING



SUPPORT
ECONOMIC
GROWTH



The majority of the work will take place in between the two bridges

WHY ARE WE ADDING LANES?

A northbound lane is being added to the Waimakariri Bridge to help with the merge of traffic from Main North Road, the Western Belfast Bypass and Christchurch Northern Corridor at the start of the Northern Motorway.

A separated pedestrian and cycle lane will also be added onto the bridge: it will clip on the east side of the southbound bridge. The shared cycle path addresses safety concerns for cyclists and pedestrians to cross the Waimakariri River.

The NZ Transport Agency is currently investigating the best design for the third southbound lane on the Waimakariri Bridge so that it can safely operate as a high occupancy vehicle (HOV) lane during the morning peak. HOV lanes encourage carpooling and provide an option for buses to use the lane which helps reduce congestion and improve travel times.

CONSTRUCTION + TRAFFIC IMPACT

During most of the work there will be very little construction impact on traffic and nearby residents. Our crews are working in the reserve area in between and underneath the bridges and in part of

the river bed.

There will be a greater impact on traffic when we start work on the existing bridges to place the beams. Our crane will work next to and swing over the southbound bridge therefore we will install a 'contraflow' traffic control: southbound traffic will use one lane on the northbound bridge and then cross over back onto the southbound lanes.

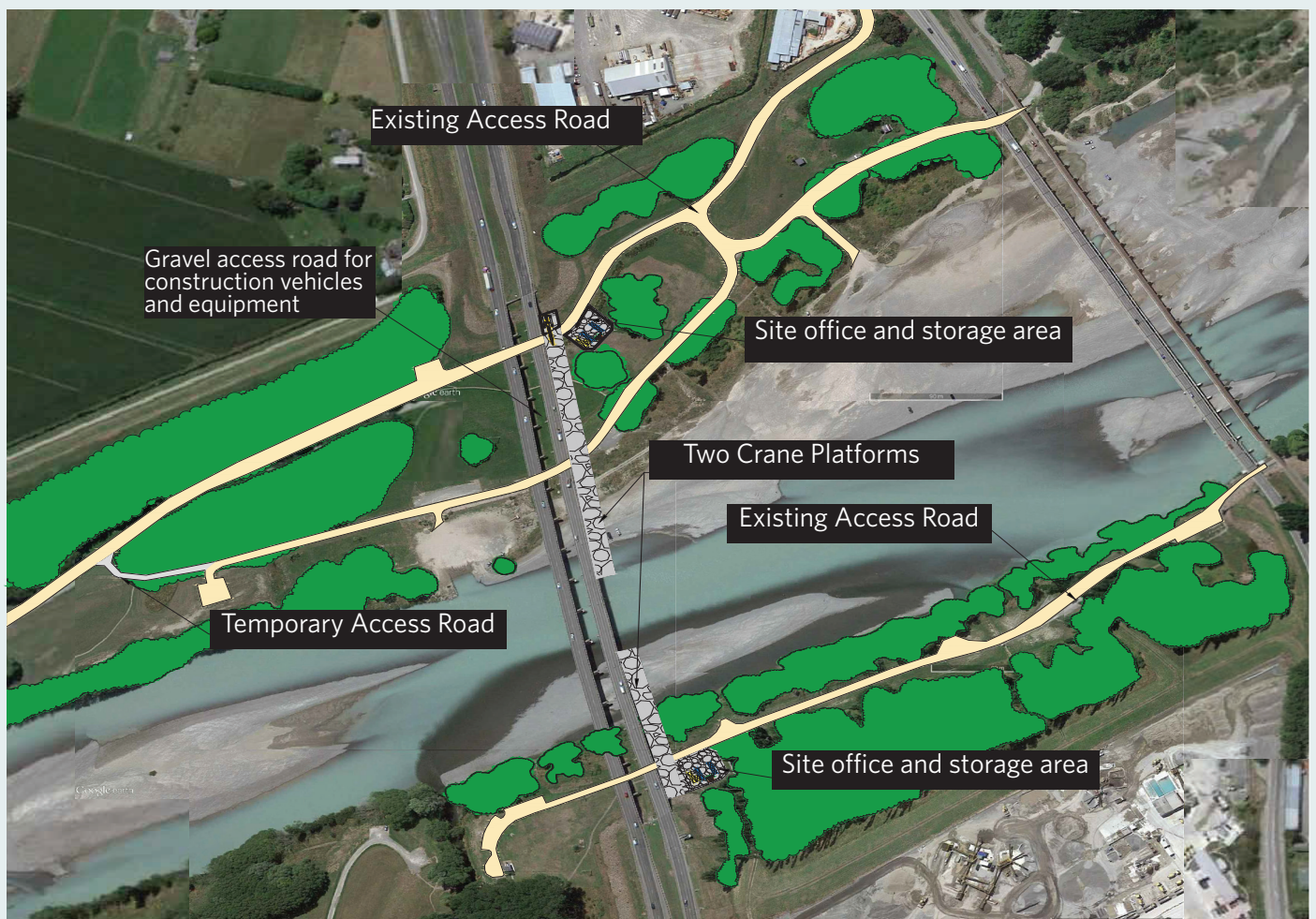
The lifting work and associated contraflow will happen later this year (scheduled for November) during off peak hours and at night to minimise the traffic impact. We will keep you updated on this closer to the time when we start our lifting operations.

To increase the safety of our crew working right underneath the bridge deck, we will close the right hand lane on the bridges at times.

River users and recreational users of the Waimakariri River Regional Park will have a temporary access road to reach the boat ramp.

Please be mindful of our crane platforms in part of the riverbed and on the reserve. Our work area will be fenced off and we'll have effective traffic controls in place.

Some parts of the shared walking and cycling track on the reserve, close to our site office and crane platforms, will be temporary closed. We will advise on the diversion with local signage at the reserve.



On the eastside of the southbound bridge two working platforms will be constructed on either side of the river so the crane can lift and place the new beams.

FAQ: FREQUENTLY ASKED QUESTION

Q: Why does the project include operating a High Occupancy Vehicle (HOV) lane on the CNC?

A: An HOV lane southbound in the morning peak is part of the widening of the Waimakariri Bridge. The NZ Transport Agency recognises that a robust long-term transport solution must include changed driver behaviour to increase vehicle occupancy and make better use of infrastructure. The current investigations are looking at the operational and safety impacts of the HOV proposal.

Q: Could the southbound bridge over the Waimakariri River be widened in the future rather than as part of the CNC project now?

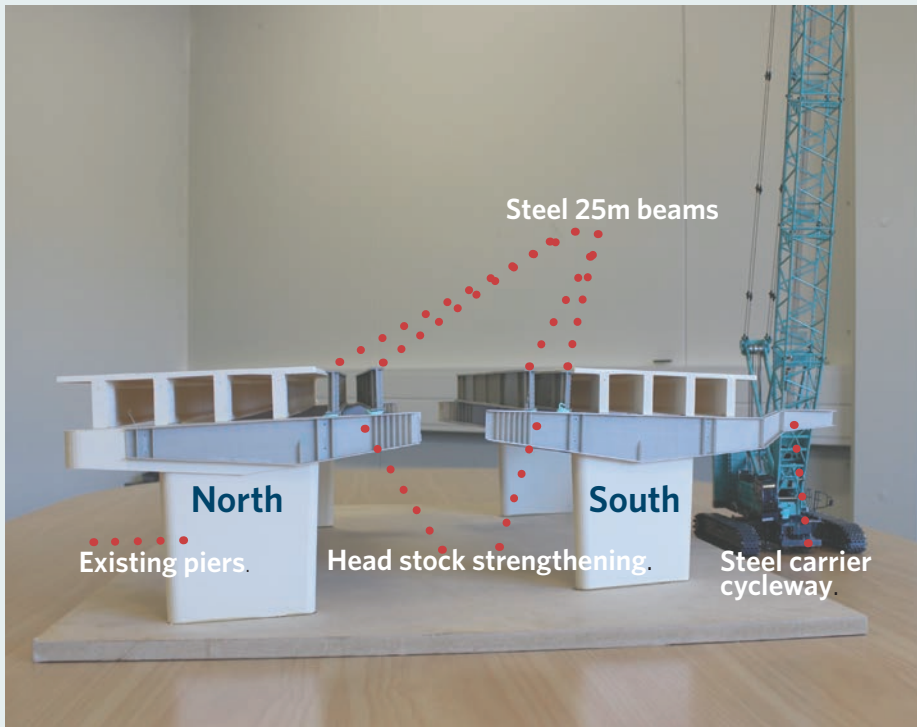
A: Yes this work could be done separately later, but our assessment shows this would be significantly more expensive. The CNC will have staff and equipment on site for the northbound widening which can also be used for a southbound widening. That means doing the work as part of the CNC project will be more cost effective, minimising impacts on the river and minimising disruption to users.

Q: Will cycle improvements be included across the Waimakariri River?

A: The CNC project includes an off-road cycle facility between Cranford Street and the Empire Road off-ramp. And with the clip-on cycleway on the bridge, it will include a path across the river. We are continuing to investigate how to connect the cycleway onto the bridge and to the existing road network on the north and south side of the bridge.

Q: How will public transport benefit from the CNC project?

A: The construction of the CNC will result in significantly reduced traffic volumes on Main North Road. This means there is an opportunity for the Christchurch City Council to make changes to Main North Road to further enhance public transport along the route, extending bus lanes, and making changes to intersection configurations. These changes will result in improved public transport journey times along Main North Road which is likely to make public transport more attractive. It is also an option for buses to use the HOV lane.



Our bridge model shows the crane and the bridges with the steel strengthening on the piers and the new beams. The new steel carriers for the clip-on cycleway are shown on the right.



During our work we will have a temporary access road in the reserve to reach the boat ramp.



When we are working underneath and in between the two bridges we will have to close part of the walking track on the park.

HOW ARE WE DOING THE WORK?

The order of work is as follows:

- site establishment, installing a site office and fencing off a storage area in the reserve
- building two platforms on either side of the river on the reserve and partly in the riverbed for the crane to drive and stand on
- head stock/pier strengthening with new steel channels: labourers working in between the (16) bridge spans on small suspended scaffold platforms
- installing the new steel bridge spans. The 25m spans are constructed offsite and are placed on the strengthened head stocks with a crane
- stitch and connect: joining the new and existing parts of the deck together takes place on the bridge. Steel bars will lock the existing sections of the bridge to the new
- work complete, site disestablishment, tidy up.

NEED MORE INFORMATION?

- › If not on our mailing list yet, please sign up for our project updates at www.nzta.govt.nz/cnc or by emailing us at info@cncalliance.co.nz with Waimakariri Bridge in the subject line.
- › Our updates and traffic notices on the bridge work will also be shared by the Waimakariri District Council: www.waimakariri.govt.nz
- › Visit us during office hours. Our project site office is located at 145 Winters Road in Mairehau.
- › Urgent question? Call us on 0800 262 200.



You can call us on **0800 262 200** or email us at info@cncalliance.co.nz or visit our office at 145 Winters Road, accessed only from QEII Drive.