

# THE CHRISTCHURCH TRAM EXTENSION- THE STORY SO FAR

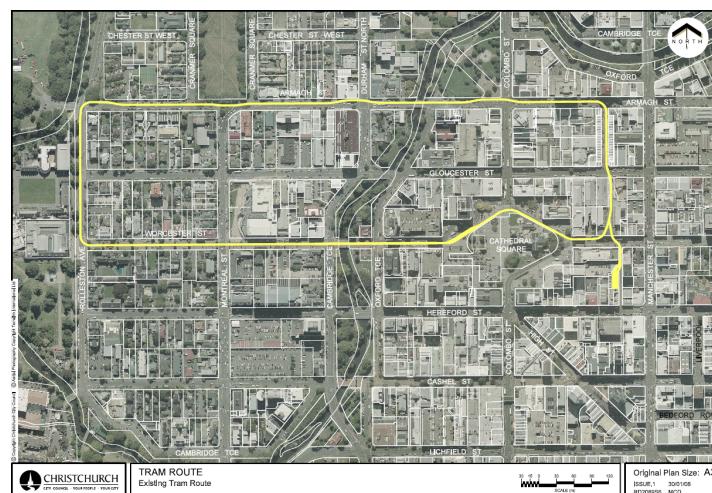
## Introduction

Dave Hinman

This paper traces the sometimes tortuous progress and notes the milestones so far achieved towards extending the present 2.7 km Christchurch Tramway. The perspective is mainly that of the Christchurch City Council, but the support and contribution of ChCh Tramway Ltd (CTL) and the Heritage Tramways Trust (HTT) is acknowledged as well as describing some of the potential impacts on those organisations, should the extension proceed.

## Background – Existing City Tramway

- Existing 2.7 km tram route developed from the Worcester Boulevard Project commenced by the Council in 1990.
- The “Christchurch Tourist Tramway” was constructed 1991-1994 at a cost of \$5.45M and has been operating since Feb 1995.
- Council built the infrastructure, including tram shed, leased vehicles from Heritage Tramways Trust (Ferryroad) and used RFP process to lease the operation to a private operator (initially Shotover Jet).
- Current operator is Wood Scenic Line Ltd, which also leases Port Hills Gondola and has part ownership of Avon River punting operations.
- Council currently has an operating surplus in tram account, and the business is profitable to the operator.
- The tram has achieved its objective of becoming a city “icon”.
- The existing route is well located for visitor attractions and services on the north and west sides of the city centre.
- But, it does not get close to the retail heart (City Mall) or the developing revitalisation areas of High St, Lichfield Lanes, South of Lichfield etc., or such attractions as the R.C. Cathedral, the Music Centre, or AMI Stadium.



## **Milestone 1: City Mall refurbishment the catalyst for the tram extension**

There has been talk of extending the tramway from as early as 1996 when a report to the Council encouraged by hotel interests in Cashel street to extend through part of Cashel mall was emphatically rejected. It was to take another 10 years and another Council project to revive the idea. As part of the Council’s central city revitalisation

initiative, it was decided in 2006 to refurbish the rather dated City Mall, comprising parts of Cashel and High Streets, which had been pedestrianised in 1982. The proposed design included a one way service lane/ movement corridor in both High and Cashel Streets. The design as consulted on during Sept-Oct 2006 included the tram in the Cashel Street service lanes as an option, although it had not been included in the Mall Project budget.

The public response to a public consultation on the proposed design was very interesting: A total of 573 people completed a questionnaire plus general comments and 71 additional written submissions were received. It should be noted that the consultation related to the Mall only - and not the wider tram route extension now proposed.

### **On the question of traffic/ private vehicles in the Mall?**

For High Street :

67% of the 557 who responded *disagreed* with reintroduction of traffic (21% *agreed*, 12% *were neutral*) For business and property owners (55) 44% *agreed*, 39% *disagreed* and 18% *were neutral*

For Cashel Street:

70% of the 555 who responded *disagreed* with private vehicles being allowed (18% *agreed for other than 11am-3pm*, 12% *agreed at all times*) For business and property owners (55) 53 % *agreed* and 47% *disagreed*

### **And the tram?**

***Q. “The extension of the tram is not funded as part of this project, however do you think that the tram route should be extended through City Mall?”***

63% of all those who responded *favoured* the tram (537). This included:

63% of shoppers (312)  
74% workers (90)  
67% residents (51)  
23% school pupils (26)

73% of business/property owners (55)  
64% visiting café/restaurant (185)  
44% students (82)

In contrast only 16% (of 533) thought there should be a more modern form of transport (like the shuttle) through the City Mall area.

This broad support for the tram has been interpreted as indicating that the tram is seen as an acceptable compromise by those both for and against having a road with private vehicles – tram would create more movement – slow and safe, bring more people, than at present.

**However – not all were convinced including the then City Mall project manager:**

“Hi Dave,

You will notice I have taken off the outside people.

For the Council Seminar on the 6th December, if the Tram is to be recommended, in order to lay the tracks, then the costs and viability will need to be addressed.

I'm a fan of the Tram and think it would be great down the Mall but it is really too much like a heart decision. It will probably result in no traffic going down the Mall (because it goes the "wrong way", people say that doesn't matter but from Colombo St people will "drive" down the Mall out of interest, from Oxford Tce that is unlikely ) and will not be a vehicle for bringing people into the area. The inner city will probably grow off the back of a decent transport mechanism not a museum one. Bit harsh but I think that is the reality.... The options to go before the Exec Team and Council will need to highlight all aspects of the decision and I'm obviously not convinced that the Tram is viable.

This is going to need some serious effort if it is to be more than just an emotional decision."

## **Milestone 2 - Council Decision 14 December 2006**

This followed a report back on the outcome of the consultation, with some adjustments made to the design. The decision included:

*(a) Adopt the overall (City mall) concept design and grant approval.. to proceed to detailed design and construction phase*

*(d) Approve the installation of a concrete base which is able to support a possible future extension of the tram, during the construction of the first section*

*(f) Authorise a study into the viability of expanding the tram in the Central City that would service both tourists and Christchurch residents, with an initial report to the Council by June 2007.*

## **The Tram Study**

The study was awarded to Maunsell Ltd, through a tender process. Maunsell brought in expertise from Melbourne in addition to its local professional staff. Its findings were presented to a Council seminar on 21 August 2007. The study made the following findings and recommendations:

### **a) Roles of the Tram**

The current tram service is highly focused as a tourist attraction. A limited number of residents hold annual passes. An expansion of the existing route could achieve the following:

- Assist with the rejuvenation of the central city by bringing more movement and people.
- Attract additional tourists - perceived value of a lengthened trip.
- Expand the existing tourism experience by incorporating new attractions.
- Create a route to attract locals to use service as extension of existing mobility services in the central city e.g. buses, free shuttle.
- Create a core route with potential as future light rail services loop.

### **b) Criteria for Route Selection**

- |                                  |  |
|----------------------------------|--|
| 1. Promotion of tourism          | 8. Consistency with future dev.        |
| 2. Continuance of Historic theme | 9. Access to additional tram storage   |
| 3. Constructability              | 10. Mobility around the City           |
| 4. Infrastructure Cost           | 11. Future compatibility for commuting |
| 5. Operational Practicality      |  |
| 6. Safety                        |  |
| 7. Impact on traffic and parking |  |

### c) Routes Identified

Three preferred routes were selected as having the strongest correlation with the route selection criteria.

- All are variations of an anti-clockwise core loop along Oxford Terrace, Cashel Street and High Street
- All use the existing track from behind the Cathedral to Oxford Tce
- All are serviced by the busy Cathedral Square stop
- All can operate either with the existing route as a “figure of 8” or independently
- The route alignment has been designed to fit in with the refurbishment of City Mall (Cashel & High Street).

### d) Consultant’s Conclusions on Viability

- Currently 160,000+ tourist tickets p.a. (hop on/off for up to 2 days)
- Currently 6000 local annual passes (linked to Gondola). Change in charging regime may be needed to achieve greater local use. Slow speed and ease of access seen as issues by some.
- Tourist nos. may grow by up to 4% p.a. with extension
- Visitor spend due to *growth* may grow by \$350,000 p.a
- Most significant economic benefit is to the new area served by tram with many more thousands of people visiting per annum
- Tram now an internationally recognised icon of Christchurch – new areas served by tram would benefit from image, publicity, tourist photography, etc – not easily quantifiable
- No analysis of impact of any increase in local use. Spending by locals using the tram may also increase along the tram route, but not necessarily their net central city spend.
- On going costs to Council not identified in the study
- For current route, annual licence fee paid by operator more than covers Council’s costs, other than costs of capital, now spread across total borrowings
- Operating costs for tram co. will increase with longer route, (including requirement for extra trams and storage). Without a significant increase in patronage, an increase in Council licence fees may not be viable.

### **Milestone 3 - 31 August 07 – rail exposed in High St prior to lifting and commencement of new concrete base laying.**



A sample had earlier been removed and tested for suitability of reuse. This was found to be possible, though cleaning and grinding would be needed. However because of uncertainties about the quality of the concrete - “no reinforcing”! and levels issues, it was deemed necessary to remove the existing tracks and start again. A very strong concrete base, heavily reinforced has been built and cobbled over in High Street.





#### **Milestone 4 - Council Decision 27 September 2007**

This followed the informal August 21 seminar, where the Consultant's findings were presented.

*"That the Council:*

*(a) Acknowledge the potential for extending the tram route to incorporate Oxford Tce, City Mall (Cashel & High Sts) Colombo St and Cathedral Square, joining the existing line behind the Cathedral*

*(b) Acknowledge the merits of the tram either continuing along High to Manchester to Cashel Sts or turning across the reserve to the west of the Holiday Inn Hotel and request a further report on which of these options should be recommended*

*(c) Authorise further work on the route details, cost estimates and funding options with a view to progressing the proposal through the 2009-19 LTCCP*

*(d) "Future proof" for the extension of the tram by:*

*(i) Confirming the general route ... for future planning and investigative purposes*

*(ii) Approving the design and construction of the strengthened concrete base for the later stages of the mall reconstruction (i.e. Cashel St) in addition to High St (already approved)."*

## Next Stage of Tram Study

To progress the September resolution, a staff project team was established across relevant Council units, options/preferences were identified for the detailed location of tram tracks around the whole route, and tested by a traffic safety audit of the options, which considered impact of/on other potential vehicles and pedestrians, checking that alignments would be practical from an operational viewpoint, and checking of location/impact of underground services in vicinity of track locations. A rough order of costs for the various options showed a range from \$4.0 - \$5.3M.

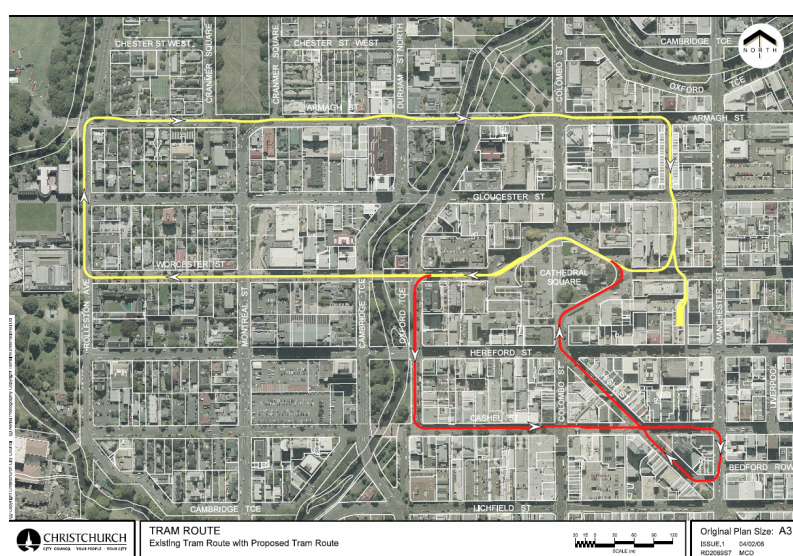
The Safety Audit report concluded: “ *All safety issues raised in this report can be minimised or eliminated by careful design and appropriate tramway operating procedures*”

In addition related Council projects (eg proposals for controlling traffic on Oxford Tee) were identified for co-ordination, discussions commenced with ChCh Tramway Ltd about additional vehicles and storage and a further report was prepared for presentation to Council at its Annual Plan meeting on 4 March 2008.

### **Milestone 5 - Council Decision 4 March 2008**

At its meeting on 4 March 2008, the Council decided to:-

- a) Adopt for consultation a proposed tram extension via Oxford Terrace, Cashel Mall, Cashel Street, Manchester Street, High Street, High Street Mall, Colombo Street and Cathedral Square*
- b) Undertake a Special Consultative Procedure to vary the City Pedestrian Mall Special order to allow for the operation of trams through the mall*  
*and*
- (c) To include \$550,000 in the draft 2008-09 Annual Plan to meet the cost of including tram rails in the current redevelopment of City Mall.*



## **The Submissions**

Both the general route of the extension and the change to the City Mall Special Order were open for submission until 21 April (as part of the Annual Plan process). Hearings followed in May, with a decision to be made by the Council at its Annual Plan meeting on 25 June.

Apart from the issue of Council housing rentals (332 received), there were more submissions on the tram than on any other matter. Of 144 submissions received about the tram (mall and/or extension) 120 were in support (83%). 16 submitters (including CTL supported by HTT) appeared at the hearing.

Submitters on the tram raised the following issues and concerns:

- Anecdotal evidence that many visitors do not find/go south of Cathedral Square – tram will assist Mall etc recognition and retail. Supporters believe the tram will be great for south of Cathedral Square.
- Cycle and pedestrian safety – including requests for cycle access through the mall.
- Traffic congestion issues (eg in Cathedral Sq, Manchester St).
- Costs, priority of tram cf. other needs, tourist tram v. commuter line.
- Extent of route - other options, line doesn't go far enough.
- In particular the Manchester St loop seen as an issue, and led to a number of alternative suggestions - several of which proposed extending the line further along High Street! Options included destinations such as Lichfield Lanes, the RC Cathedral & Music Centre, Turners & Growers (Urban Winery) and even to AMI Stadium and beyond!

The staff report to Council illustrated these proposals and showed some of the attractions in the area.

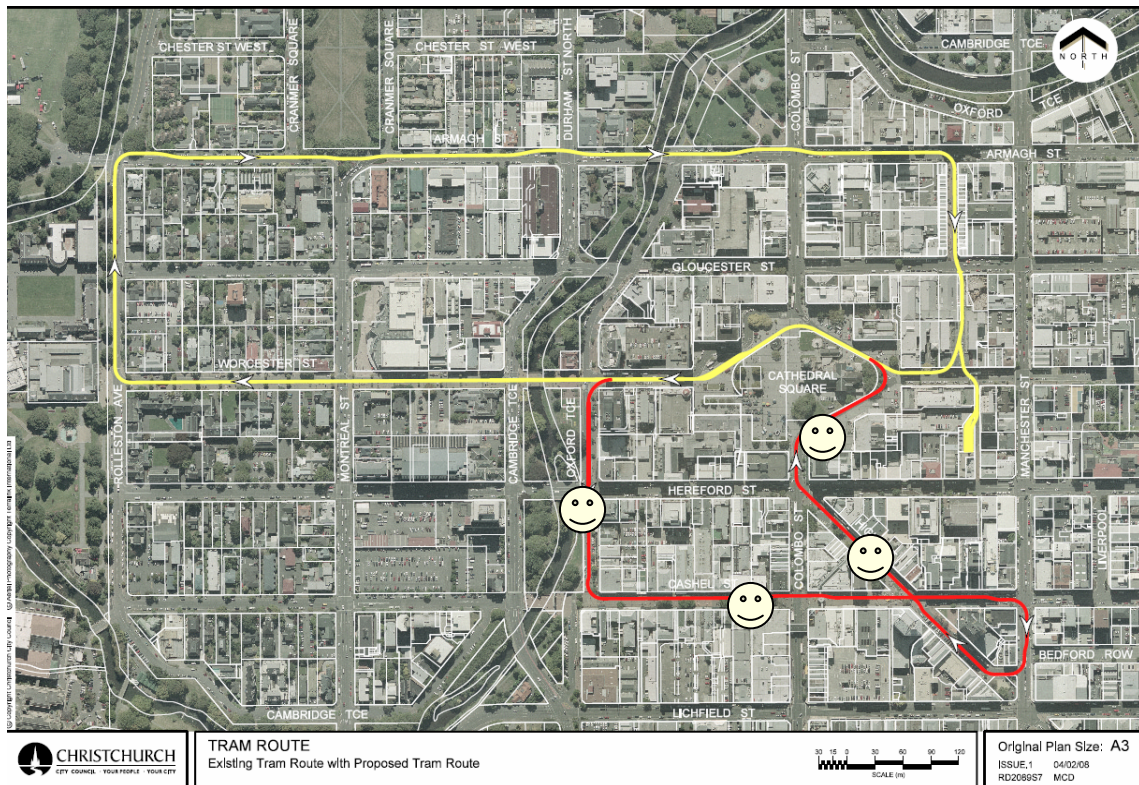
## **Milestone 6 - Council Decision 25 June 2008**

After considering the 49 page staff report summarising the submissions and recommending options for consideration, the Council:

- *Confirmed Special Order to allow trams in Mall (note: subject to 1 month right of appeal).*
- *Agreed to include installing rails in Mall and to negotiate removal of Cashel air bridge.*
- *Confirmed (subject to funding) Oxford Tce and Cathedral Sq. alignments.*
- *Requested further work on options taking the tram further along High St including feasibility of using existing double track still in situ, with a final recommended route, with costings to be reported back for 2009/19 LTCCP (i.e. by the end of this year).*

No appeal was lodged. Following an extensive search, assisted by CTL, new RI 60 grooved rail was ordered from Yarra Trams, Melbourne, and was due to be shipped on July 30. It is anticipated that the rails will begin to appear in Cashel street from mid- August. That will become **Milestone 7.**





## So what issues still remain to be resolved ?

### How far to go? Destination?

The Council has initially expressed a preference for going either as far as the old High Street Post Office (Tuam Street) or as far as Barbadoes St, to the Polytechnic, Music Centre and Cathedral. There is also some landowner pressure to go via a site in Lichfield Street being developed as a mixed use residential area (Lichfield Park).

### Re-use Of Existing Rails?

There is existing double track in High Street largely intact for three street blocks from Cashel – Madras (set in concrete when installed in 1931). Gaps can be “patched” using rail retrieved from the Mall. There would be significant cost savings if this track can be re-used in situ – it could even be the key to the extension going this far. There are issues still to be resolved re engineering certification of the strength of the old (non reinforced) concrete, cleaning and possible grinding, and possibly most significantly, determining levels in relation to drainage, the side channels having been renewed since tram days.

### Double track v. Single Track?

The present circuit is all single track – if double in High Street this would focus the tram in this street and it is seen as having both advantages and disadvantages. The retailers in High Street are keen to retain on street parking so whether single or double, the tram would need to be in the traffic lane. High Street is a quiet street.

### Operational issues

The existing ChCh tram fleet is set up for single ended operation, while this could be overcome with some vehicles, lack of a turning circle would make it very difficult for trailers and also tram 178 which only has passenger doors on one side and forward facing seats.



The further extension options will require a safety audit + underground services check, as done for the line to date. The existence of concrete tracks in High Street will have deterred the installation of potentially conflicting services. The whole extension will need to be signed off by LTNZ as part of the safety approvals process.

With the tracks in the traffic lane tram stops may be an issue, as NZ Traffic Regulations no longer provide for motor vehicles to stop for trams to pickup or drop off passengers. Previously (Armagh St) the line was taken into the side of the road but there is now a very active cycle lobby opposed to this as there have been quite a number of cycle spills in that street which also contains cycle lanes. It may be feasible to take the stop out to the tram, although a recent trial of “bus boarders” on a busy road and bus route was not received favourably by the motoring public.

Accessible access - the disabled community have asked for a further lift or ramp in the Mall, and a further one may be needed for the High Street area.

### **Other Design Issues**

There has been a review of concrete base, and designs developed for a single pour, Melbourne style, aided by a recent visit to Melbourne by some of the design team to see track relaying in action. While rail for the mall has been sourced from Yarra trams, the source (and rail type) has yet to be confirmed for the balance of the route, including special work.

### **Council decisions still to be made**

These include determining the final route, which could include staging, a further round of consultation once the route is agreed, a decision on how much and when the Council is prepared to fund the project, and the need to agree how this relates to longer term light rail ambitions.

### **Issues for CTL**

The Company is keen to see the line extended, and has been very supportive including participation in public consultation, technical advice etc. But there is a concern that the Council may now be wanting to go too far too fast - they were comfortable with Manchester loop option as about the right length for first stage. While all the way to the Cathedral looks great in the long term the Company’s preference would be for an intermediate stage which could remain as a short working e.g. to Tuam Street.

The process of decision making has been somewhat ponderous and uncertain, very dependent on Council politics and potentially changing priorities. This remains the case as beyond the Mall no funding has been agreed, and won’t be until June next year, at a time of economic uncertainty when there will be strong community pressure to hold or reduce costs. This makes planning and preparation for the extension difficult, when the timing of its completion is still an unknown.

There is a Council expectation that the Company will provide additional trams and tram storage - from CTL’s perspective that needs to be traded off against improving the tenure of lease (currently expires in 2015 with no right of renewal) and may be a difficult ask if the expanded length of the extension requires even more trams and greater mileage without proven additional patronage.

While CTL is desirous to retain and add to the fleet of local heritage trams to continue the current historic theme and retain the “point of difference” from other attractions,

there is a reality of cost and time considerations – its likely to be cheaper and quicker to get W's from Melbourne or other complete and operable cars from elsewhere. CTL is willing to consider a joint venture with the HTT.

### **Issues for HTT**

The HTT/ THS is also strongly supportive of the extension but there are issues similar to those of CTL concerning timing uncertainties. There is also a strong desire to continue to provide local trams but there issues of providing tram types suitable to CTL's needs, which may mean locating additional tram bodies (when most have now gone or are beyond restoration), and then sourcing funds for restoration. There are also difficulties of managing major projects to meet the time frames likely to be needed, on a voluntary basis.

The HTT is keen to explore joint venturing with CTL.

### **Conclusion**

As has been the situation many times over the past two years the tram extension project is again at an interesting stage – rails are going into the Mall but it may still just be longer term “future proofing”! Work is in progress to inform a decision on the extent of the route – there are some very interesting opportunities in High Street, but there is some risk of going “too far too quickly”. Nothing is yet certain - Council will be under pressure to reduce spending next year, given tight economic conditions - not all projects are going to get the green light? Will the tram? - we will have to wait and see!

Dave Hinman

31 July 2008