Maunsell Limited

10th Floor, Eagle Technology House, 135 Victoria Street, Te Aro, Wellington 6011, New Zealand
P O Box 27277, Marion Square, Wellington 6141, New Zealand
T +64 4 382 2999 F +64 4 382 2998 www.maunsell.com

Angus Gabara
Rail Strategy Project Leader
Greater Wellington Regional Council
PO Box 11646
Manners St
Wellington 6142

2 February 2009

Dear Angus

Comments on the "Submission from the Raumati Public Transport Action Group on the Maunsell Report concerning the Kapiti Railway Stations Concept Design"

The Raumati Public Transport Action Group made a submission on the Kapiti Railway Stations Concept Design, Scoping Report; Maunsell Ltd, 8 April 2008.

Maunsell has reviewed the submission and does not accept the Action Group's assertion that the findings of our report are flawed. We provide the following specific comments.

- Maunsell was commissioned by Greater Wellington Regional Council.
- Maunsell's brief for this report was to prepare a preliminary appraisal of the options for the
 development of stations along the Kapiti Coast, considering technical aspects. The study
 was advised by a Project Reference Group that involved Tranz Metro Wellington,
 ONTRACK, New Zealand Transport Agency (formerly Land Transport New Zealand and
 Transit New Zealand), Kapiti Coast District Council and Greater Wellington Regional
 Council. The report was not developed specifically as a discussion document.
- The study identified that the Paraparaumu and Waikanae Station Upgrades are necessary to implement the electrification extension programme and consequently these were recommended at the start of the Proposed Implementation Programme.
- The reasons for the preference to construct Lindale Station ahead of Raumati Station as provided in the Executive summary are
 - o Raumati has a smaller catchment than Lindale
 - Lindale Station will relieve pressure for car parks at Paraparaumu Station
 - Lindale station does not require motorists to cross or use the congested State Highway 1 and Kapiti Rd routes
 - Car park availability is more limited at Raumati
 - The optimal location of the Raumati Station is affected by the location of the Western Link Rd.
 - Raumati Station will increase the travel time for Paraparaumu Station users whereas Lindale Station will not

The Station Choice Model in the study identified that the Lindale Station would attract
greater patronage than Raumati Station. Scenario 2 has increased patronage over
Scenario 3 would have 113 more AM peak hour boardings than Scenario 3, as prorated to
the 2012 year

Scenario Description	Estimated Train Boarding in the AM peak hour	Total Population	Train boardings per population	Estimated Train Boarding in the AM peak hour 2012 YEAR
1 - Upgraded Stations at Waikanae and Paraparaumu, 2010	938	39,951	2.3%	982
2 - Upgraded Stations at Waikanae and Paraparaumu plus new Lindale Station, 2012	1,110	41,845	2.7%	1,110
3 - Upgraded Stations at Waikanae and Paraparaumu plus new Raumati Station, 2018	1,048	43,970	2.4%	997
4 - Upgraded Stations at Waikanae and Paraparaumu plus new Raumati Station and Lindale Station, 2018	1,177	43,970	2.7%	1,120

- Maunsell neither assumed nor stated that decisions about the Western Link Rd must delay construction of the Raumati Station. We noted that the Raumati Station would be "Affected by final location of Western Link Rd"
- The optimal timing for the Raumati Station would be at a time when the saving in time and cost for potential Raumati Station users exceeds the time and costs associated with the delay of the passengers to the north of Raumati Station. If the potential 177 peak hour users save 0.4km travel (the difference from the centroid of Raumati to the two stations) at say 30km per hour and the time to travel to the Raumati Station site on the train (2.5 mins). The generalised cost would be 584 minutes @ \$5.36 per hour plus 71km @ \$0.196/km, a total of \$66 saving for the morning peak hour for Raumati Station users. This saving is offset by delaying the 785 train passengers from north of Raumati by 2 minutes each, equating to 1,570 minutes delay. The generalised cost of this delay would be 1,570 minutes @ \$5.36 per hour, a total of \$140 for the morning peak hour. In summation the Raumati Station would add \$74 cost to the AM peak hour cost for Kapiti rail users. Earlier model runs with GWRC's Wellington Transport Strategy Model have also indicated a negative benefit to the region's overall transport cost associated with the inclusion of the Raumati Station at this time.
- There are already express services operating and so the mitigation proposed to offset the
 inclusion of the Raumati Station is already in place. Without having some services not stop
 at Raumati the delay time would apply to all passengers north of Raumati. It is noted that
 the rail track configuration into Wellington does not readily allow express services to
 overtake stopping services.

• The mesh block data from the 2006 census indicated that there was no significant correlation between the proximity to the existing stations and train usage in the Raumati, Paraparaumu and Waikanae areas. The following table shows that in the Paraparaumu and Waikanae areas the uptake of train usage is 7-10% irrespective of proximity to a station. We note that the submission refers their comments in this area to a draft report. Maunsell does not believe that statements in earlier drafts of reports were taken into consideration by the Committee. We note that Paekakariki differs significantly from the rest of Kapiti with an uptake of 22% and is a model for high public transport uptake

Mesh block	Population travelling by train	Total Population working away from home	%	
Waikanae Beach	95	1215		
Waikanae Park	59	650	9	
Waikanae West	77	1041	7	
Waikanae East	59	768	8 9 10	
Paraparaumu North	114	1344		
Paraparaumu South	198	1896		
Paraparaumu Central	318	3117	10	
Raumati Beach	147	1776	8	
Raumati South	129	1668	8	
Paekakariki	165	764	22	

- The catchment areas determined for each station are shown in Appendix E of the report, copy attached. The catchment for Lindale is presumed to include sections of Waikanae with access along the Western Link Road. The assessed populations in the catchment areas in 2018 are Lindale Station 16,446 and Raumati Station 8,791.
- Principles of equitable access were considered in the analysis. Lindale had a greater
 catchment population than Raumati and consequently this was one point in the preference
 to construct Lindale prior to Raumati. It is also noted that most of the Raumati area is closer
 to the Paraparaumu Station than the Paraparaumu North/ Beach and Waikanae Beach
 areas to their respective rail station access. Lindale Station would improve access for these
 communities.
- Car and bus parking at Raumati is likely to be on the western side of the road requiring a
 pedestrian transfer across SH1. The Lindale station has land alongside the rail corridor
 making any transfer distances shorter. GWRC have a significantly larger land holding at
 Lindale than Raumati resulting in more land available at Lindale for parking than at
 Raumati. The larger land holding at Lindale is consistent with the larger catchment area at
 Lindale.
- The assessed Lindale Station catchment is north of Raumati, there was no assumption that Raumati residents would travel past Paraparaumu Station to catch the train at Lindale. It was assumed that the Raumati residents would continue to use the park and ride at Paraparaumu Station. The pressure on the Park and Ride facility at Paraparaumu Station would be relieved by the Lindale facility and consequently provide better service for the Raumati community until Raumati Station is constructed.
- Raumati Station (southern option) is below an area with signs of active slope movement
 that may add substantial difficulty to the development of the site. This risk is not present at
 the other sites. The Raumati Station site shares geotechnical issues of settlement,
 groundwater and liquefaction with the other sites.

 At the time of the preparation of our report the updated data was not to hand. We have subsequently completed initial runs with updated population values for scenario 4. The Station Choice Model shows a minor increase (32 peak hour passengers) as a result of the additional population increases. We note that the current economic turmoil may affect the population predictions further making the updated data out of date.

Station Choice

Station Catchment Area	Population	New Estimation	Original Estimation	Difference	New Estimation	Original Estimation
Waikanae Station	9,436	233	185	48	18%	16%
Lindale Station	17,252	399	386	13	31%	33%
Paraparaumu Station	10,699	347	343	4	27%	29%
Raumati Station	10,790	209	177	32	16%	15%
Paekakariki Station	1,825	86	86	0	7%	7%
Total	50,002	1274	1177	97	100%	100%

• Appendix 3 of the submission provides some observed data at the corner of Matai Rd and Poplar Ave between 7.45am and 8am on a number of weekday mornings. The No 74 bus through the intersection at this time connects with the 8am train that arrives in Wgtn at 8:51am. Earlier buses connect with trains that arrive in Wgtn at 7.27, 7.52, 8.08 and 8.32. Observations would give a more complete picture if they also covered these services and observed the service on Raumati Road as well. The car survey is also incomplete as the observer's position was too far from the SH1 intersection to identify the direction of all the turning traffic, it is possible that the delays associated with right turns onto SH1 may have masked the true proportion of traffic turning left, cars turning left were less likely to be delayed and therefore may not have been counted. We note that it was reported that 2 out of 14 cars (14%) turned north. The census data identified 8% of the population of Raumati South working away from home travelled to work by train. The 14% statistic of traffic turning north is not, by itself, inconsistent with the census figure of 8% travelling by train.

Thank you for the opportunity to provide comment on the submission.

Yours sincerely

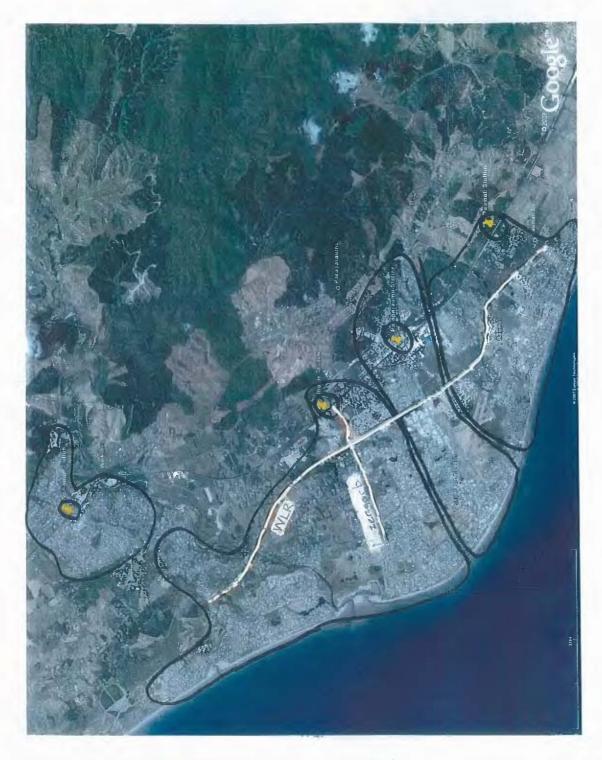
Steven Knowles Technical Director

steven.knowles@maunsell.com

Mobile: +64 21 510 315 Direct Dial: +64 4 382 2984 Direct Fax: +64 4 382 2998

cc: Alan Burford Adam Ashford

Attachment D - Proposed Station Catchment Areas



1 of 1 (representation of catchment areas discussed at workshop).

