2018-2028 TRANSPORTATION ASSET MANAGEMENT PLAN He Rautaki Whakahaere Rawa mō Ngā Ara Kawenga

FOOTPATHS & CYCLEWAYS NGĂ ARA HĪKOI / NGĂ ARA PAHIKARA VOLUME THREE | PUKAPUKA TUATORU



Document Set ID: 7819363 Version: 1, Version Date: 11/09/2018

DOCUMENT CONTROL

Document Name	2018-2028 Transportation Asset Management Plan Volume 3 - Footpaths & Cycleways
Prepared By	Steve Ilkovics, Asset Operations Planning Lead Cristina Gonzalez, Asset Engineer
	Carl Whittleston, Manager Transportation
Approved By	David Langford, Infrastructure Manager

August 2018



CONTENTS

1	•	Intro	duction	5
2		Lifecy	ycle Management Plan	8
	2.1	Asset D	escription	8
	2.1	1.1	Footpaths	8
	2.1	.2	Vehicle Crossings	9
	2.1	.3	Cycle Ways and Pedestrian Access	9
	2.2	Asset Co	ondition	11
	2.3	Asset Re	emaining Lives	12
	2.4	Asset Va	aluation	12
	2.5	Operati	ions and Maintenance	13
	2.6	Renewa	als Plan	15
	2.7	Acquisit	tion and Augmentation Plan	16
	2.8	Disposa	al Plan	23
	2.9	Annual	Work Plan	23

3.	Risk Management Plan	24
3.1	Critical Assets	24
3.2	Risk Assessment	24
3.3	Infrastructure Resilience Approach	24
4.	Financial Summary	25
5.	Improvement and Monitoring Plan	26

3

LIST OF TABLES & FIGURES

List of Tables

Table 1 Asset management document structure	5
Table 2 Footpaths and cycle ways investment KPI summary	6
Table 3 Footpaths and cycle ways O&M KPIs	7
Table 4 Footpaths and cycle ways investment KPIs	7
Table 5 Footpath material classification	8
Table 6 Asset summary	8
Table 7 Cycling and pedestrian network summary	9
Table 8 Condition grading descriptions	11
Table 9 Condition grading by length	11
Table 10 Asset life expectancies	12
Table 11 Asset valuation	12
Table 12 WC124 Cycle path maintenance 2015-18 NLTP	14
Table 13 WC124 Cycle path maintenance 2018-21 NLTP	14
Table 14 Level of service	15
Table 15 WC125 Footpath maintenance and renewal forecast 2018-21 NLTP	16
Table 16 Let's Go implementation 2015-18 NLTP	18
Table 17 Let's Go construction 2015-18 NLTP	19
Table 18 Let's Go State Highways	20
Table 19 WC432 Let's Go promotion, education and advertising 2018-21 NLTP	20
Table 20 WC341 Footpath improvements 2018-21 NLTP	21
Table 21 New footpath construction expenditure forecast	22
Table 22 WC341 Let's Go local road improvements	22
Table 23 Expenditure forecast summary	25
Table 24 Subsidy forecast summary	25

List of Figures

Figure 1 Footpath crossings type v length	9
Figure 2 Cycle way network	10
Figure 3 Materials by age range	12

9



1. INTRODUCTION

This volume provides details of the asset lifecycle management for the **Footpaths and Cycle Ways** asset category of the Transportation AMP. The framework and key elements of the overall asset management plan are outlined in Table 1.

Table 1 Asset management document structure

No.	Document Name	Key Document Contents
1	Long Term Plan (LTP)	 Infrastructure Strategy Strategic Framework Guiding Themes High Level Information for Each Asset Class Council Services High Level Information Levels of Service Financial Plan
2	Asset Management Strategy	General Asset Management Principles and Overview
3	Asset Class General Volumes	 General Information and Glossary about each asset class Executive Summary Introduction Levels of Service Future Demand Risk Management Plan Financial Summary Plan Improvement and Monitoring

Category Lifecycle gement Volumes	eet Life Cycle Management for each asset egory within each asset class Description Condition Remaining Lives Valuation Operations & Maintenance Renewals Acquisition and Augmentation Disposals Annual Work Plan Risk Management Financial Summary Improvement Plan

Purpose and Key issues

4

The purpose of **footpaths** is to provide a safe and effective network, catering for the transportation and recreation purposes of pedestrians (and associated contrivances which are not vehicles).

Pedestrian access ways provide a safe, convenient and defined means for pedestrian movement alongside and linking roadways. (Note: pedestrian access ways connecting roads to parks and reserves are not considered in this volume because they form part of the Parks asset base).

The key issues related to footpaths and pedestrian access ways are:

- Safety of pedestrians.
- Identifying and prioritising routes for accessibility.
- Urban character and streetscape design.
- Increased public expectations over time creating greater demand for network extension and higher quality footpaths. The aging population is a factor in this.
- Potential improvements in levels of service as a direct result of our Walking and Disability strategies.
- Direct relationship with New Plymouth being one of NZTA's two model walking and cycling communities in New Zealand

1. INTRODUCTION

The purpose of cycle ways is to provide an efficient and safe network of cycle lanes and facilities to encourage the use of cycles as a viable mode of transport.

In 2000, the New Plymouth Cycle Facilities Review, led to adoption of our initial Cycle Strategy in 2003, which was updated and adopted in 2007. This has since been superseded by the Model Communities for Walking and Cycling project (Let's Go).

Key issues relating to cycle ways are:

- Continuity of cycle lanes throughout the cycle ways network as they are quite often disjointed near intersections and carriageway pinch points.
- Cycle ways being obstructed by planter boxes, kerb extensions and vehicles.
- Rural cycling circuits with insufficient width, large size chip seals etc, which can make cycling difficult and hazardous.
- Development of off-road cycle ways as part of a network.
- Provision of appropriate space on specific rural cycling circuits.
- Clearing of detritus from cycle ways.
- Cycling promotion and education including travel planning and skills training.

The purpose of urban road berms is to provide a buffer space between carriageway, drainage, footpaths and property for safety, amenity and drainage. This space is also used for installing utilities and street furniture. Typically rural road berms provide a buffer space between the carriageway shoulder and the property boundary for drainage and enable vehicles to stop safely off the road in emergencies.

Levels of Service

The levels of service and investment KPIs for the operations, maintenance, renewals and minor improvement of the Transportation system are included in Section 6 of the Transportation Strategic Case (General Volume). The investment KPIs are developed from the problem statements and benefits in the Programme Business Cases (PBCs) included in the Appendices of the Transportation Strategic Case (General Volume). The investment KPIs applicable to footpaths and cycle ways are summarised in Table 2.

Table 2 Footpaths and cycle ways investment KPI summary

	Problems		Benefits	In	vestment KPls (PBC for each one)
•	The changing expectations of the community requires a	0	An easy to understand	1.	Network Availability
	reprioritisation of investment to meet the agreed and		and efficient (economically viable)	2.	Customer Satisfaction
	future Level of Service for all transport modes		network for all transport modes	3.	Maintain Travel Time Reliability with
•	Growth in the movement of people and goods on	•	A resilient network A safe network		Increased Activity
	key corridors will result in increasing travel time			4.	Value for Money
	unreliability during peak periods			5.	Response Times
•	Geology, weather and climate activity plus some sub- standard assets results in a			6.	Network Audit of Condition
	high level of full and partial closures of the network			7.	Crashes
	impacting lifelines and economic viability				
0	Driver behaviour, safe system approach and other				
	factors are resulting in a high proportion of Death and				
	Serious Injury crashes for				
	vulnerable road users				

1. INTRODUCTION

The particular measures used to monitor the performance of the footpaths and cycle way assets are shown in Table 3. More details about the measures are included in the Programme Business Cases included in the Transportation Strategic Case (General Volume).

Table 3 Footpaths and cycle ways O&M KPIs

KPI No	КРІ	Baseline Performance	Target Performance
1.2	Annual Cordon Count	TBC	ТВС
2.1	Count of complaints recorded by Contact Centre	33 per annum average 2011/12 – 2016/17	<=40 per annum
2.2	Quality cycle network safe for users (Communitrak Survey) – LoS 6	The average performance between 2005/06 and 2016/17 was 81%	85%
5.1	LoS 5 – respond to requests in reasonable timeframe	Current performance is 95%	Maintain at 95%
6.3	LoS 4 – quality footpath network safe for users	0.9% failed, 90.2% good/ excellent	Less than 1% of footpath length recorded as failed during ratings surveys. More than 90% of footpath length to be in good or excellent condition. Targets to maintain footpaths in safe condition for community.

Related legislation, codes and standards include:

- Pedestrian Planning and design guide NZTA
- NZS 4404: Land development and subdivision Infrastructure

Future Demand

Future demand and growth in the district is addressed in our report <u>Keeping New Plymouth Moving and Growing</u>. This report includes Investment Logic Maps (ILMs) and a series of problem statements, benefits and investment KPIs for growth. These are summarised in the Table 4.

Table 4 Footpaths and cycle ways investment KPIs

Problems	Benefits	Investment KPIs (PBC for each one)
 Capacity limitations of key and strategic arteri- routes do not meet current demand and will not support future growth. Natural landforms, arterial layout and poor alternative mode permeability are limitin city connectivity. Complex roads and a high number of modal conflict points are drivin high actual and perceiv personal and collective risk. A lack of viable alternative routes durir a major event results ir 	 Improved transport network performance Improved safety outcomes Improved economic outcomes for the district More viable transport choices 	 For each one) Effectiveness Network Availability Improved Infrastructure Quality Improved actual safety Improved safety perception Business investment Transport network supports future growth Increased use of alternative modes Improved community perception Improved alternative mode infrastructure
significant delays and r of transport and utility severance.	<	

Note: All financial forecasts are shown in inflation adjusted dollar values.

2.1 Asset Description 2.1.1 Footpaths

The majority of our footpaths are constructed of concrete or seal, apart from in the CBD where for a higher amenity value we have installed clay pavers, blue stone and interlocking blocks. The classification of footpath construction materials is shown in Table 5.

Table 5 Footpath material classification

Footpath Material - Cl	assification
Concrete	Concrete
Seal	Seal
Interlocking blocks	Other
Slurry seal	Seal
Concrete (Exposed Aggregate)	Other
Blue stone	Other
Asphaltic concrete	Concrete
Clay paver	Other
Metal	Other
Grass	Other
Orange coloured concrete	Concrete

We own just under 529km of footpaths, with a total surface area of approximately 850,000m². We also own the steps, crossings and berms related to footpaths as show in Table 6.

Table 6 Asset summary

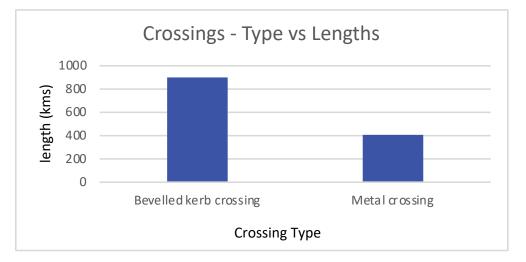
	Material	Quantity (m2)
	Concrete	563,998
Footpaths	Seal	260,283
	Other	20,984
	Concrete	176
Steps	Grass	26
	Seal	51
Crossings	Standard and Heavy	17,739
Berms	Grass	1,340,751

Initially, all concrete footpaths constructed were between 50mm and 75mm thick. Current requirements are that footpaths are constructed to be 100mm thick and 1.5m wide, with a 2% cross-fall. In general, footpaths in residential areas are constructed from concrete while those in commercial areas are constructed from seal or asphalt.

2.1.2 Vehicle Crossings

We provide urban vehicle crossings for vehicles to pass across road reserves from the edge of the carriageway to the property boundary. Vehicle crossings generally form an integral part of the footpath network. The different types of crossings are shown in the graph in Figure 1.

Figure 1 Footpath crossings type v length



Urban Vehicle crossings are installed at the cost of the property owner and may only be installed by an approved contractor. An urban crossing from the roadway to the property boundary will be approved if it allows good vehicle access without detrimentally affecting the road, drainage, or footpath.

Our general strategy is to firstly ensure that vehicle crossings are constructed to our approved standards. We then ensure that the crossing is maintained, generally at the cost of the property owner. We do reseal rural crossings when we seal the adjoining road carriageway, but general maintenance remains the responsibility of the property owner.

2.1.3 Cycle Ways and Pedestrian Access

We promote cycling, walking and public transport as alternative modes of transport in the district to optimise the network and support sustainability, reducing reliance on fossil fuels and limiting carbon emissions. This is coupled with a drive toward a new urbanism, where the urban built environment is focused on people rather than motor vehicles. To support this, we are developing a comprehensive path / cycle way network within and between urban settlements in the district.

Currently, the relative mass difference is weighted in favour of motor vehicles, with cyclists and pedestrians disadvantaged when competing for the same commute space. To alleviate this conflict, we foresee some key components of the ultimate network eventually becoming off road, either as separate cycle ways within the road reserve, or as paths/ walkways within reserves. As such, future management issues will have to be resolved. Existing walk and pathways in reserves are managed in the Parks Asset Management Plan.

Most designated cycle ways are currently in New Plymouth City, demarcated on road carriageways. In some instances, the footpath is designated for shared use with cycles (outside New Plymouth Girls High School and the Shared Pathway network. The Shared Pathway Network is managed by the Parks team.

The total area of network available to cyclists and pedestrians is shown in Table 7.

Table 7 Cycling and pedestrian network summary

Facility	Length (m)
On road cycle lanes	38,730
Street to street access ways	8,810
Main shared pathways	25,100
Off road tracks and pathways	69,190

The designated cycle way network is shown on the map in Figure 2.

Figure 2 Cycle way network



The data presented in this AMP on the quantity and type of the assets is classed as grade **B** – **Reliable** due to our well maintained and updated asset inventory in RAMM.



2.2 Asset Condition

We assess the condition of all footpaths during ratings surveys conducted on the roading network. The overall condition rating is determined by identifying the faults (settlement, bumps, depressions, cracks, scabbing, patches, vegetation, multiple breaks etc.) within the rated lengths of footpath. Where a section of footpath within a longer assessed section is deemed to be in extremely poor condition, the entire section is designated as 'failed'.

The condition rating used for footpaths are shown in Table 8.

Table 8 Condition grading descriptions

Rating	ng Category Description							
0	Not Known							
1	Excellent	Excellent Condition						
2	Good	Good Condition – minor defects only						
3	Average	Average Condition – maintenance required to return to acceptable level of service						
4	Poor	Poor Condition – consider renewal						
5	Very Poor	Very Poor Condition – approaching unserviceable						

The condition of the footpath assets based on the latest condition assessments is shown in Table 9.

Table 9 Condition grading by length

Condition Rating	Length (m)	% by condition	Failed Length (m)
0	1,568	0.30%	0
1	55,663	10.53%	60
2	421,323	79.69%	3,469
3	45,434	8.59%	1,227
4	2,763	0.52%	202
5	5 96		37
(blank)	1,848	0.35%	25
Total	528,695		5,020

As shown in the Table 9, 90.2% of the network is in excellent or good condition while just under 1% of the footpath network is classified as 'failed'. The footpath condition assessment includes the associated steps and crossings.

We assess the condition of cycle lanes that form part of pavement assets at the same time as we assess the pavement surface. Results are recorded in the overall Pavement condition assessment (see Volume 1 – Pavements).

The data on the condition of the assets presented in this AMP is classed as grade **B** – **Reliable** due to regular condition inspections with updated results recorded in the RAMM asset inventory.

2.3 Asset Remaining Lives

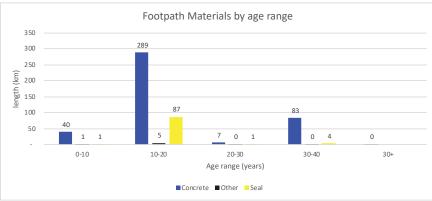
The expected lives of the different footpath construction materials are listed in the table below.

Table 10 Asset life expectancies

Material	Life expectancy (years)
Asphaltic concrete (AC)	50
Blue stone	100
Clay paver	80
Concrete	80
Interlocking blocks	50
Seal	25
Slurry seal	12

The graph in Figure 3 shows an analysis of the age of the footpath assets (including steps and crossings) by construction material.

Figure 3 Materials by age range



The remaining lives and ages of the cycle lanes that are part of pavement assets are the same for Pavements (see Volume 1 – Pavements).

The data on the age of assets presented in this AMP is classed as grade **B** – **Reliable** due to RAMM being regularly maintained and up to date.

Document Set ID: 7819363 Version: 1, Version Date: 11/09/2018

2.4 Asset Valuation

As at 30 June 2016, the value of the footpath assets (including the associated steps, berms and crossings) is as shown in Table 11.

Table 11 Asset valuation

Category	Gross Current Replacement Cost (GCRC) (\$)	Annual Depreciation (\$)	Optimised Depreciated Replacement Cost (ODRC) (\$)
Footpaths, Steps, Berms & Crossings	69,905,118	908,690	39,303,403

The value of the cycle lanes that form part of the pavement surfaces is included in the Pavement Surface Value section of Volume 1 – Pavements. Not categorized as transportation assets, the values for off-road cycling facilities are included in the Parks AMP.

Values are from the 2016 statutory valuation. The data accuracy and confidence level is rated as **A**. The detailed valuation was conducted by internal staff and was peer reviewed and endorsed by Beca Consultants.

2.5 Operations and Maintenance

Our overall maintenance strategy for footpath and cycle ways is to retain the integrity of the footpath and to promptly repair defects that are hazardous. For example, we may replace panels of concrete or patch sections of seal or asphaltic concrete, or carry out minor relaying of cobbles and pavers to prevent the defect from tripping a pedestrian.

Service delivery is performed under the urban general maintenance contract. The major work activities are:

- General Maintenance retain the integrity of the footpath by carrying out repairs such as patching of failed areas, levelling, tree root damage, sunken trenches, cracked areas, etc.
- Damage Repairs carry out footpath repairs where the damage is attributed to others and can be recovered (e.g. building contractors).
- Pre-seal Patching pre-resealing maintenance work on sealed footpaths, including patching and smoothing, typically on a 16 to 17 year cycle to match the resealing operation.

Note: The operation and maintenance of cycle lanes forming part of the pavement assets is included in Volume 1 – Pavements.



We have installed a number of combined walk/cycle paths and facilities as part of the 'Let's Go' programme that now require operation, maintenance and minor components of renewal. The approved 15-18 NLTP values for work category 124 – Cycle path maintenance are shown in Table 12.

Table 12 WC124 Cycle path maintenance 2015-18 NLTP

Year	Requested allocation	Approved allocation (NZTA only)								
	Total cost (\$)	Total cost for approval (\$)	FAR (%)	NZTA share (\$)	Funding source: National (\$)					
2015/16	25,000	0	52	0	0					
2016/17	25,000	13,525	51	6,898	6,898					
2017/18	25,000	25,000	51	12,750	12,750					
Totals	75,000	38,525	51	19,648	19,648					

To ensure these assets are maintained in a safe and fit-for-purpose condition we will need to continue to maintain cycle paths at a similar level to that requested in the 2015-18 NLTP. The proposed 2018-21 NLTP values and the 10-year forecast for cycle path maintenance are shown in the table below.

Table 13 WC124 Cycle path maintenance 2018-21 NLTP

	2018-21 NLTP									
\$000	18/19	19/20	20/21	21/22	22/23	23/24	24/25	25/26	26/27	27/28
Cycle path maintenance	25	26	26	27	27	28	29	29	30	31
NZTA Share FAR (51%)	13	13	13	14	14	14	15	15	15	16

Note: Footpath maintenance is included in WC125 in section 2.6 Renewals.

The overall Opex forecast for transportation activities including operation and maintenance is included in the Transportation Strategic Case (General Volume).

2.6 Renewals Plan

Whilst on a purely financial basis the use of concrete is the most cost effective on a wholeof-life basis, in some circumstances there are other non-financial drivers. Other factors to consider include the level of desired amenity and appearance, and the location and growth of tree roots. As such, we recommend that footpath renewals are specified on the following basis:

- High amenity areas such as CBDs Bluestone, Clay Pavers or Concrete with 4kg of black oxide and exposed aggregate.
- Areas around trees where future growth could displace footpath construction Asphalt
- All other areas concrete with a broom finish.

Note: We have produced an internal report discussing the advantages of using concrete instead of materials such as slurry, chip seal, AC, etc. This can be accessed on ECM 7108907.

Renewals for concrete footpaths are typically performed under the Urban General Maintenance Contract and resealing of sealed footpaths under a separate contract.

The works activities for concrete and sealed footpaths are:

- Footpath Renewals replace the footpath including excavation and renewal of the footpath structure itself.
- Contract Reseals reseal footpaths on a cyclic basis to retain the asset's integrity and
 restore a good surface finish. The level of service provided includes the progressive
 resurfacing or renewal of chip seal footpaths with slurry coat seals, achieving a better
 quality of surface for footpath users. In CBD areas, the surfacing could be done with
 hot mix in order to achieve a long lasting, high amenity result.

We develop our renewals programme using the data obtained from regular condition inspections. Following an annual data review, we produce an annual programme based on the overall expenditure levels defined in the renewal strategy in ECM 7108907 - Asphaltic Concrete and Chipseal Footpath Resurfacing Options. This document sets the required annual expenditure for footpath maintenance and renewal at approximately \$560k per annum. This will allow approximately 10,000m² per year (1.2%) to be renewed, which is sufficient to meet defined levels of service for footpath condition and to progressively phase out sealed and slurry footpath surfaces.

Table 14 Level of service

LOS#	Description	Baseline	Target
6.3	LoS 4 – quality footpath network safe for users	0.9% failed, 90.2% good/ excellent	Less than 1% of footpath length recorded as failed during ratings surveys. More than 90% of footpath length to be in good or excellent condition. Targets to maintain footpaths in safe condition for community.

Renewal of footpath vehicle crossings is included as part of the footpath renewals programme. While vehicle crossings technically belong to the property owner they serve, it is often very difficult or impossible to get the owner to fund the crossing during renewal of the adjacent footpath. Failing to renew the vehicle crossing could have a detrimental effect on the newly formed footpath or create a low amenity match if the vehicle crossing is in a poor condition or non-matching material. Therefore, we include provision to renew vehicle crossings when renewing footpaths.

The recent GPS signaled a change to the previously NZTA policy not to subsidised footpath maintenance and renewal. The 2018-21 NLTP now has an additional WC125 for this purpose with a standard FAR rating.

The 10-year Capex forecast for footpath renewals is shown in Table 15.

Table 15 WC125 Footpath maintenance and renewal forecast 2018-21 NLTP

	2018-21 NLTP									
\$000	18/19	19/20	20/21	21/22	22/23	23/24	24/25	25/26	26/27	27/28
Vehicle crossing renewals (RD1010)	23	24	24	25	25	26	26	27	28	29
Footpath maintenance and renewal (RD1011)	563	579	589	602	615	627	645	660	677	694
Total	586	603	613	627	641	653	671	687	704	723
NZTA Share FAR (51%)	299	307	313	320	327	333	342	351	359	369

Note: Renewal of cycle lanes is included in the Sealed Pavement Renewals programme Volume 1 – Pavements.

2.7 Acquisition and Augmentation Plan Acquisitions

New assets installed by developers to serve new domestic and non-domestic developments are usually vested in us. Assets are built to the NZS4404: 2010 – Land Development and Subdivision Standard. Our specific requirements are defined in the New Plymouth District Council (NPDC) and South Taranaki District Council (STDC) adopted standard for Land Development and Subdivision Infrastructure, which is based on NZS 4404:2010 with local amendments. We assume full responsibility for any assets vested with us, and include them included in our operations, maintenance and future renewal plans.

Level of Service - Subsidised

Our current provision of cycle ways is more characteristic of a service than a dedicated alternative mode of transport. Information about cycle ways asset types and activities are spread across other volumes of the Transportation AMP. Examples of these are:

- Cycle lanes formed as part of pavements (local roads and state highways).
- Markings part of the pavement markings.
- Signs part of traffic services.

As part of our Cycle Strategy and Implementation Plan, we have developed off-road cycle ways to enable cyclists to avoid roads and to provide more enjoyable routes within urban areas. We will continue to develop these in the future, possibly within reserves and drainage easements that exist for reasons other than transportation.

The drive towards more sustainable transport has led to an NZTA review of funding for any cycling related infrastructure and management. The draft Government Policy Statement (GPS) 2014 highlights the Government's desire to focus walking and cycling funding on safety and efficiency.

In addition, because New Plymouth is one of two model communities for walking and cycling in New Zealand, we have previously received additional NZTA funding. This programme of initiatives is managed under the 'Let's Go' brand.

In 2007, we adopted a Cycling Strategy that identified a number of priorities for action. These have been or will be undertaken into the future, including:

- Cycle route network improvements.
- Recreational route improvements as embodied in the extension of the coastal walkway to Bell Block.
- Further initiatives to encourage cycle use.

We will also continue the 'Let's Go' Model Communities project to fulfil the aspirations of our Cycling Strategy, continuing with work to date and focusing on making the many small improvements identified in the Cycling Strategy. We will also hold discussions with developers regarding provision of walking and cycling facilities to assist with the expansion of this programme; for example in the Area Q and Area N subdivisions.

The 2015-18 NLTP contained three components for the Let's Go programme in work category 452 – Cycling facilities.



i) Let's Go Implementation

Educating and encouraging residents of New Plymouth to use alternative active modes of transport for commuting to work or school creates safer shared roads and pathways and ultimately leads to healthier lifestyles.

Activities included cycle skills training, walk/cycle route map production, support to advocacy groups, design and implementation of school and workplace travel plans. Active transport safety initiatives will increase the road capacity during the peak hour periods of the day. Approved 2015-18 NLTP investment is shown in Table 16.

Table 16 Let's Go implementation 2015-18 NLTP

Year	Re	quested allocation	on	Approved allocation (NZTA only)					
	Total cost (\$)	Tolls (\$)	Other supplementary funding (\$)	Total cost for approval (\$)	FAR (%)	NZTA share (\$)	Funding source: National (\$)		
2015/16	325,772	0	0	325,772	52	169,401	169,401		
2016/17	327,157	0	0	327,157	51	166,850	166,850		
2017/18	427,071	0	0	427,071	51	217,806	217,806		
Totals	1080,000	0	0	1080,000	51.3	554,057	554,057		

ii) Let's Go Construction – Local Roads

As part of our cycling strategy we have identified 500 sections of the roading network that do not have cycle facilities. Since 2010 the Model Communities Programme has been implemented very successfully with Stages 1 and 2 completed. This project is for Stage 3 of the Model Communities Project and includes making improvements to the cycle ways and walkways throughout New Plymouth to fulfil the aspirations of our Cycling Strategy. The project will carry on with the work to date and focus on the many small improvements that have been identified in the Cycling Strategy. Discussions with developers to provide walking and cycling facilities will assist with the expansion of this programme, for example in the Area Q and Area N subdivisions. Approved 2015-18 NLTP investment is shown in Table 17.

Table 17 Let's Go construction 2015-18 NLTP

Year	Re	quested allocation	on	Approved allocation (NZTA only)					
	Total cost (\$)	Tolls (\$)	Other supplementary funding (\$)	Total cost for approval (\$)	FAR (%)	NZTA share (\$)	Funding source: National (\$)		
2015/16	12,000	0	0	12,000	52	6,240	6,240		
2016/17	145,841	0	0	145,841	51	74,379	74,379		
2017/18	367,159	0	0	367,159	51	187,251	187,251		
Totals	525,000	0	0	525,000	51.3	267,870	267,870		

iii) Let's Go Construction – State Highways

We are also working with NZTA to provide improved cycling facilities on the local state highway network within New Plymouth. Recent projects such as SH3 Coronation Avenue and State Highway pedestrian crossing improvements have proved to be successful. Approved 2015-18 NLTP investment is shown in Table 18.

Table 18 Let's Go State Highways

Year	Requested allocation			Approved allocation (NZTA only)					
	Total cost (\$)	Tolls (\$)	Other supplementary funding (\$)	Total cost for approval (\$)	FAR (%)	NZTA share (\$)	Funding source: National (\$)		
2015/16	4,618	0	0	4,618	100	4,618	4,618		
2016/17	34,300	0	0	34,300	100	34,300	34,300		
2017/18	108,082	0	0	108,082	100	108,082	108,082		
Totals	147,000	0	0	147,000	100	147,000	147,000		

The proposed 2018-21 NLTP values and the 10-year forecast for expenditure for the Let's Go Programme of activity is shown in Table 19. This will enable ongoing development of cycling facilities to meet the long term aims of the Let's Go Programme.

Table 19 WC432 Let's Go promotion, education and advertising 2018-21 NLTP

	2018-21 NLTP									
\$000	18/19	19/20	20/21	21/22	22/23	23/24	24/25	25/26	26/27	27/28
Let's Go Implementation – Education and Encouragement – NZTA work category 432 (Promotion, education and advertising) – Submitted as part of STDC application as Taranaki wide (RD1035)	184	189	193	197	201	205	211	216	221	227
NZTA Share FAR (58%)	107	110	112	114	117	119	122	125	128	132

Coastal Walkway Extension: Tiromoana Crescent, Bell Block to Waitara

We have proposed extending the existing Coastal walkway from Tiromoana Crescent, Bell Block through Area Q and past the Airport all the way through to the Waitara Township (Marine Park). This is part of the overall strategy for extending the walkway to increase access and coastal linkages and has benefits for commuting, recreation and visitor attraction. We propose construction of the new section of walkway over the two years from 2019/20 to 2020/21, at a total estimated cost of \$8.5m. In addition to the walkway, we will install other features such as landscaping, gates, fences and seating. The estimated cost for the walkway improvement only is \$4.0m and will be included in the low cost/low risk programme as shown in Table 20.

Table 20 WC341 Footpath improvements 2018-21 NLTP

	2018-21 NLTP									
\$000	18/19	19/20	20/21	21/22	22/23	23/24	24/25	25/26	26/27	27/28
Extend existing Coastal walkway from Tiromoana Crescent, Bell Block through Area Q, past the Airport through to the Waitara (RD2024)	-	1,680	6,867	-	-	-	-	-	-	-
Walking/Cycling improvements proportion (WC 341)	-	2,000	2,000	-	-	-	-	-	-	-
NZTA Share FAR (51%)	-	1,000	1,000	-	-	-	-	-	-	-

Level of Service - Unsubsidised

There are a number of locations throughout the district with no existing footpaths. We have a programme to construct new footpaths based on a number of factors, including the road hierarchy, speed environment of the adjacent road, and the proximity of pedestrian traffic generators. Other factors include the presence or lack of kerbs and channels in the street, and the presence or lack of a stormwater system needed to dispose of run-off. The priority rating and timing of these works generally depend on the Stormwater Works Programme developed by our Water and Waste team. The 10-year Capex forecast for the construction of new footpaths is shown in Table 21.

Table 21 New footpath construction expenditure forecast

\$000	18/19	19/20	20/21	21/22	22/23	23/24	24/25	25/26	26/27	27/28
New footpath construction	-	103	210	215	220	225	230	235	241	247

Growth

New footpaths and cycle way assets will be constructed as part of any new pavement construction described in Volume One – Pavements.

The Let's Go project will carry on with the work to date and focus on the many small improvements that have been identified in the Cycling Strategy. Discussions with developers to provide walking and cycling facilities will assist with the expansion of this programme, for example in the Area Q and Area N subdivisions. The proposed 2018-21 NLTP expenditure is shown in Table 22.

Table 22 WC341 Let's Go local road improvements

	2018-21 NLTP									
\$000	18/19	19/20	20/21	21/22	22/23	23/24	24/25	25/26	26/27	27/28
Let's Go Implementation – Construction Local Roads – NZTA work category 341 (Low Cost/Low Risk) (RD1014)	207	674	600	494	505	517	529	542	555	569
NZTA Share FAR (51%)	105	344	306	252	258	264	270	276	283	290

2.8 Disposal Plan

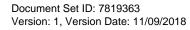
Disposal is the retirement or sale of assets when they become surplus or superseded by new or improved systems. Assets may become surplus to requirements for any of the following reasons:

- Under-utilisation
- Obsolescence
- Provision exceeds required level of service
- Replacement before end of predicted economic life
- Uneconomic to upgrade or operate
- Policy changes
- Service provided by other means (e.g. private sector involvement)
- Potential risk of ownership (financial, environmental, legal, social)

We do not anticipate any assets disposals over the period of this AMP.

2.9 Annual Work Plan

Our renewals programme has been produced based on the selection methods described in section 2.6 and is stored in ECM at <u>Transportation Renewals Programmes.</u>





3. RISK MANAGEMENT PLAN

3.1 Critical Assets

Footpaths and cycle ways are not critical to the transportation network and have not been assigned any criticality ratings.

3.2 Risk Assessment

Our Risk Management Framework and details of key risks for Transportation assets are included in Section 14 of the Transportation Strategic Case (General Volume) and section 7 of the Asset Management Strategy.

3.3 Infrastructure Resilience Approach

We have allocated budgets for reinstating access to any footpaths or cycle ways adversely affected by minor events such as weather conditions, land instability or natural hazards. Any significant events causing major loss of access will be dealt with separately.



4. FINANCIAL SUMMARY

A summary of the expenditure forecasts included in this volume is shown in Table 23.

Table 23 Expenditure forecast summary

Footpaths and Cycle Ways Expenditure Forecast (\$000)												
Activity	18/19	19/20	20/21	21/22	22/23	23/24	24/25	25/26	26/27	27/28	Total	
Maintenance	25	26	26	27	27	28	29	29	30	31	278	
Renewals	586	603	613	627	641	653	671	687	704	723	6,508	
Service Level	184	1,972	7,270	412	421	430	441	451	462	474	12,517	
Growth	207	674	600	494	505	517	529	542	555	569	5,192	
Total	1,002	3,275	8,509	1,560	1,594	1,628	1,670	1,709	1,751	1,797	24,495	

A summary of the NZTA contribution forecasts included in this volume is shown in Table24.

Table 24 Subsidy forecast summary

Footpaths and Cycle Ways Subsidy Forecast (\$000)												
Activity	18/19	19/20	20/21	21/22	22/23	23/24	24/25	25/26	26/27	27/28	Total	
Maintenance	13	13	13	14	14	14	15	15	15	16	142	
Renewals	299	307	313	320	327	333	342	351	359	369	3,320	
Service Level	107	1,110	1,112	114	117	119	122	125	128	132	3,186	
Growth	105	344	306	252	258	264	270	276	283	290	2,648	
Total	524	1,774	1,744	700	716	730	749	767	785	807	9,296	

Full details about overall transportation operational expenditure are included in the Transportation Strategic Case (General Volume).

5. IMPROVEMENT AND MONITORING PLAN

Our general Asset Management Maturity Improvement Plan is included in the Asset Management Strategy.

There are no specific areas of improvement identified for footpaths and cycle way assets.



2018-2028 TRANSPORTATION ASSET MANAGEMENT PLAN He Rautaki Whakahaere Rawa mō Ngā Ara Kawenga

FOOTPATHS & CYCLEWAYS Ngā ara hīkoi / Ngā ara pahikara

VOLUME THREE | PUKAPUKA TUATORU