

# RAUTAKI Ā-HANGANGA

INFRASTRUCTURE STRATEGY



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**Our infrastructure supports positive environmental, social, cultural and economic outcomes for our communities now and in the future.**

Our vision for the District is for Matamata-Piako to be the place of choice for lifestyle, opportunities and home. How we manage and deliver our infrastructure and services play an important part in how we can achieve this vision.

Our Community outcomes: Infrastructure Strategy Focus Areas				
<p><b>Connected Infrastructure</b></p>  <p>Our infrastructure and services are fit for purpose and affordable, now and in the future</p>	<p><b>Economic Opportunities</b></p>  <p>Our infrastructure supports economic recovery and development</p>	<p><b>Healthy Communities</b></p>  <p>Our infrastructure supports community wellbeing</p>	<p><b>Environmental Sustainability</b></p>  <p>Our infrastructure activities support positive environmental outcomes</p>	<p><b>Vibrant Cultural Values</b></p>  <p>Our infrastructure enables vibrant communities that promote cultural inclusivity</p>

## About the Strategy

This Infrastructure Strategy (Strategy) sets out the requirements for long term management of our assets to ensure that they continue to deliver on levels of service over the next 30 years. It has been prepared based on the assumptions identified in Section 4 and should be read in conjunction with the Financial Strategy in Section 2.

### This Infrastructure Strategy identifies:

- Significant infrastructure issues for the local authority over the period covered by the Strategy; and
- Options and associated expenditures for managing these issues over the period covered by the Strategy, considering factors that impact on the nature and cost of infrastructure provision; and
- The key planned projects to deliver the infrastructure to renew or replace existing assets and to enable growth.

As the demand for additional or improved infrastructure increases, and existing assets reach the end of their useful lives, it is important that Council as the asset owner has a strategy in place for the planned replacement, improvement and investment in infrastructure assets. We also need to ensure our infrastructure assets are resilient to the effects of climate change, such as increased frequency and severity of flooding and drought events in our District. This will ensure our community and customers can be assured that they will continue to receive the agreed level of service in the future.

## Matamata-Piako - Where are we today?

### Background

The district is located in the heart of the North Island, within easy commute to Auckland, Hamilton and Tauranga. Our District continues to experience moderate population growth, and this is forecast to continue over the next 30 years<sup>1</sup>.

Increases in population, dwellings and rating units, as described in Section 5 of the LTP, all have implications for the infrastructure services. This can affect the capacity of our assets to deliver services to the community and the timing of capital projects. In our roading activity plan, for example, important factors such as population growth generally leads to an increase in the volume of traffic in the network placing increasing pressure on our assets. It is therefore essential that we ensure our asset management is robust and sustainable. We maintain detailed Asset Management Plans (AMPs) for all our infrastructure assets which has informed this Strategy.

In addition to population growth, the demographic profile of our District is changing with a shift towards an older population. This has flow on effects for the affordability of rates as less people are in the workforce. We therefore need to balance making sure our infrastructure assets provide an appropriate level of service whilst keeping rates affordable. Further details about how we aim to keep our rates affordable while providing quality service and infrastructure are described in Section 2 of the LTP.

Since the global outbreak of Covid-19 in early 2020, people are encouraged to vacation in their own backyard, while international tourism lays dormant for the foreseeable future. This means that our customer profile for some of our assets, such as parks and open spaces, town centre revitalisations and local roads and transportation networks are changing. We recognise the role our amenity infrastructure and community facilities play in attracting visitors to our towns, and in doing so support the efforts toward economic recovery and development. To make Matamata-Piako The Place of Choice, we acknowledge that we may have to increase some of our levels of service to continue to attract people to come and live here and visit. This is reflected in this strategy and the decisions required for certain asset groups.

Being an inland District, the impacts of climate change on our communities are evidenced by the increased frequency and severity of severe weather events such as droughts and floods. It is our role to manage our infrastructure in a way that minimises or mitigates the risk associated with these extreme weather events and protects our communities.

Environmental standards and innovation in technology continue to evolve. We recognise our role as kaitiaki over the Matamata-Piako rohe and its environs. How we manage our infrastructure has a direct impact on our environment, and we strive to achieve positive environmental outcomes and are looking for ways to minimise the negative effects of our activities.

Council has an important role to play in supporting the local economy by providing infrastructure and facilities for both residents and visitors to enjoy. The geographic, demographic, social, economic, historic factors and special features of the District all impact on the delivery of our infrastructure assets. More information on the context in which we operate can be found in Section 6 of the LTP.

This Strategy covers the water supply, wastewater treatment and discharge, stormwater, roads and footpaths, and parks and community facilities assets as set out in the table on the following page.

Our District has good road links, including a network of state highways and local roads, to the main centres and ports of Hamilton, Rotorua and Tauranga, as well as easy access to Auckland.

The district is located in central Waikato, bounded in the east by the Kaimai Ranges and in the west by older ranges, in between is the Hauraki Plains. The District's three main rivers - Waihou, Waitoa and Piako - have moved back and forth across the Hauraki Plains, depositing shingle and silt, creating wetland areas, and helping to create the present landscape of flat alluvial plains and peat swamp.

<sup>1</sup> Infometrics population projections

There are a number of roads, approximately 5% of the network, which lie within this peat area that require a specialised treatment and design for maintenance and renewal works. There are also a number of primary industries located on rural roads within the District and these create additional loadings and traffic on our roads.

We also have agreements with some of these large primary industries (meat and dairy processing) located in our District to supply water and take wastewater, which help support the growth of our services.

In general, the different soil types present in the District have a very minor impact on the condition of our stormwater reticulation network. However with soils in the District ranging from very good to poor quality soakage we need to look at different stormwater for different areas. This was a major consideration for Council when we adopted the zoning for new growth areas in our towns.

## Our Assets

### Service Performance and Condition

We have approximately \$534 million invested in infrastructure assets in our District. Infrastructure accounts for around half of our annual operating expenditure such as repairs, maintenance, depreciation etc. Overall our assets are in average to good condition, and continue to deliver the expected levels of service to our communities. We continue to invest in the ongoing maintenance and replacement of assets to ensure the provision of services to our residents and businesses is maintained. We currently spend almost \$20 million annually on the maintenance and operations of our assets, to deliver services to our communities. Over the past 10 years we have spent on average \$13 million on renewal of assets each year across our network infrastructure (water supply, wastewater/sewer treatment and disposal, stormwater, roads and footpaths) and community facilities.

<b>ROADS AND FOOTPATHS</b>	<ul style="list-style-type: none"> <li>1008km of roads</li> <li>35km footpaths</li> <li>350 bridges and underpasses</li> <li>35km cycleway (independently managed)</li> </ul> <p>Streetlights, signage, drainage assets, railings, structures, berms and vegetation</p>
<b>WATER SUPPLY</b>	<ul style="list-style-type: none"> <li>9 Water Treatment Plants (WTP)</li> <li>10 Water Pump Stations</li> <li>393km reticulated water supply</li> </ul>
<b>WASTEWATER/SEWAGE TREATMENT AND DISPOSAL</b>	<ul style="list-style-type: none"> <li>5 Wastewater Treatment Plants (WWTP)</li> <li>253km reticulated wastewater network</li> <li>36 pump stations</li> </ul>
<b>STORMWATER</b>	<ul style="list-style-type: none"> <li>148km stormwater drains</li> <li>6 retention ponds</li> </ul>
<b>PARKS AND OPEN SPACES</b>	<ul style="list-style-type: none"> <li>14 Sports &amp; recreation parks</li> <li>24 Amenity parks</li> <li>20 Neighbourhood parks</li> <li>7 Natural parks</li> <li>3 Outdoor adventure parks</li> <li>4 Premier parks</li> <li>77 Linkage parks</li> </ul>
<b>COMMUNITY FACILITIES AND BUILDINGS</b>	<ul style="list-style-type: none"> <li>3 Swimming pools</li> <li>1 Spa facility</li> <li>3 Civic and Events Centres</li> <li>109 Elderly Persons Housing Units (EPH)</li> <li>7 Corporate buildings and depots includes Dog Pound and Matamata Civic and Memorial Centre</li> </ul> <p>176 Miscellaneous buildings and property includes: Utilities buildings, transfer stations, community halls, aerodrome, information centres, cemeteries, and public toilets.</p>

## The most likely scenario - Where are we going?

### Matamata-Piako District 2051



#### Growth and Demand → Our People 2051

In 2051 our District population will have grown from 36,000 in 2019, peaking at 39,000 in the late 2030s before stabilising around 38,000 by 2051. The average household size will be 2.3 compared to 2.5 in 2019. This means that we will require more dwellings to house our people. The geographical distribution of our people will shift towards the urban centres of Matamata, Morrinsville and Te Aroha, leading to increased demand on our connected infrastructure. Please see Section 5 of the LTP for more detailed information on demographics and geographical overview.

The baseline of our planning is making sure we deliver the current services, maintaining our assets, planning for growth and complying with regulations.

Our customers will expect that we respond to environmental and legislative changes, and that we manage our assets to achieve positive outcomes for our environment and our people/communities.

- **Roads and footpaths:** Our customers will expect to see town centres prioritising alternative modes of transport such as cycling and walking. More people will be working and getting their education remotely, changing the way our town centres are used to one more centred on socialising and community gatherings. New technology like autonomous cars means that car ownership numbers have decreased, with people subscribing to car sharing services instead of taking their own car into town. The changes in transport behaviour has also seen a change to how roading authorities approach road safety, and there is an increasing focus on soft road users. Budgets for passenger transport and footpath widening has been increased in this LTP.
- **Water and wastewater:** Our customers will expect that we take a pro-active approach to managing demand for drinking water, including using residential water meters, invest in leak detection and preventative interventions, and use of rain water/ grey water for public gardens and vegetation.
- **Built infrastructure:** Green buildings have become the norm, with the aim of developing self sustainable buildings for water (rainwater collection and grey water utilisation) and electricity (better insulation to minimise requirement for heating, better ventilation and use of materials that minimise the need for cooling, solar panels, use of window technology to enable better use of natural light). The operating budget has been increased to reflect this.
- **Stormwater:** Our customers will expect increased use of rain gardens or grass swales to provide some stormwater quality before it enters our streams/rivers or soaks into the ground. With changing weather patterns and increased storm intensities the use of at times using carparks and roads as short term ponding areas for large events is something that will potentially be more common.

There will be an increasing expectation from our community that we support economic development by investing in community infrastructure that will attract visitors to our District, and supports the local economy. This means that we have the capacity in our water and waste network for the growth areas identified in the District Plan to be developed and that we ensure there are no service levels impacts on existing systems by allowing for this.



#### Resilience → Our Assets 2051

Network infrastructure generally has expected life of between 50 and 100 years, depending on a number of factors including type of material. This means that infrastructure that was installed in the post war era when our District experienced exponential growth, will be coming up for renewal during the life of this strategy. By continuing to replace and renew assets as required, to the modern equivalent standards, our infrastructure assets in 2051 will be in average to good condition.

As the demand for our infrastructure services changes due to how people use our services, a process for assessing whether or not to replace certain assets will be implemented, along with an ongoing assessment of new requirements prompted by new legislation and customer expectation changing over time.

The key over the next 30 years is to ensure we look after the assets we have and prioritise our capital expenditure to ensure it is affordable and sustainable over the 30 years for our community. We will continue to take a risk-assessment approach, including assessing how our assets perform during extreme weather events, to our asset renewal programme, monitoring condition and performance to enable timely replacement of critical assets before failure. Critical assets are considered those assets in which failure would result in a major disruption to the supply of services. For a full list of our critical infrastructure assets, refer to the individual Asset Management Plans.

Although the Government's Water Reform (<https://www.dia.govt.nz/Three-Waters-Reform-Programme>) has been indicated to be implemented in the next few years, we have made the assumption in Section 4 that the Water, Wastewater and Stormwater Assets planning is still required and that it will be used to inform any new entity that will be managing the assets in the future.



### Compliance → Our Environment 2051

By 2051 we will experience increased frequency and severity of extreme weather events, such as drought and flooding. This means that our rural communities will have to adjust how they manage their land in terms of stock density, crop selection, soil nutrients and effluent management.

In 2051 there will be stringent environmental conditions regulating how we can treat and discharge our wastewater, how much drinking water we can extract and supply, and increasing requirements to use green technology in the delivery of all our services. There will be an increased awareness of how our behaviour and activities impact the environment long term.

In 2051 central government will have a strong focus on minimising and reducing the impacts of climate change. This will be reflected in new and amended legislation adding more stringent requirements to asset owners and service providers in how services are delivered to our communities. This has implications across every asset. We expect there to be legislative changes during the life of this Strategy, but we don't know what these may look like. Therefore, we have made the assumption in Section 4 that any new or amended legislation will not have a significant impact on our activities. Most changes to legislation are known about in advance, enabling us to prepare for the implementation. Our ongoing asset management planning ensures that any new projects or changes to operations will adhere to the legislative framework of the day.



### Affordability → Our Economy 2051

Ageing population means that the median household income is down and therefore less able to pay rates.

There is always tension between affordability and the strategic drivers identified and outcomes we want to achieve.

The key over the next 30 years is to ensure we look after the assets we have and prioritise our capital expenditure to ensure it is affordable and sustainable over the 30 years for our community.

It is also key to partner with stakeholders, other service providers or councils which can provide Council with ways to achieve infrastructure development that it can't manage on its own to make it more affordable.

This affordability issue has been considered as part of the Financial Strategy.



## How are we going to get there? - Key Challenges and Our Response

We have identified the key challenges that we are facing heading towards our most likely scenario for 2051

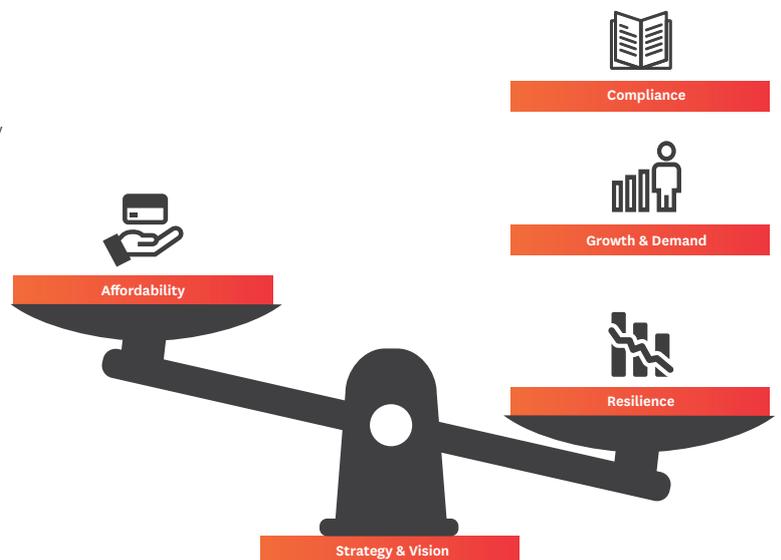
It is about planning and delivering an affordable and sustainable capital and renewal programme. \*Please note all projects within the following tables use uninflated figures. All graphs use inflated figures to show the true value.

DRIVER	MOST LIKELY SCENARIO FOR OUR DISTRICT	IMPACT ON INFRASTRUCTURE	OUR RESPONSE
<p><b>GROWTH AND DEMAND</b></p> 	<p>We are forecasting that our population will increase over time with the majority of this increase happening among the older age groups and within urban areas.</p>	<p>Population growth and land intensification increases demand for infrastructure service in the urban centres. Ageing population increases demand for accessibility and changes the way in which infrastructure assets and services are used. There currently hasn't been the growth in tourism but over the 30 years this is still included in our planning.</p>	<ul style="list-style-type: none"> <li>We will plan for sustainable growth and manage demand.</li> <li>We will provide additional capital and operational expenditure over the next 30 years to meet growth.</li> </ul>
<p><b>RESILIENCE</b></p> 	<p>The global climate change we are currently experiencing means that we have more frequent severe weather events like storms and droughts.</p>	<p>More frequent severe weather events and droughts puts pressure on our infrastructure, and may require improved capacity and capability to cope with severe weather events and natural hazards. No allowance has been made for the replacement of damaged infrastructure but rather to ensure we fund the replacement of our assets as it is needed. By completing our budgeted renewal programme and providing additional infrastructure we are improving the resilience of our current network, assets and services.</p>	<ul style="list-style-type: none"> <li>Our infrastructure will support or improve public health benefits.</li> <li>Our infrastructure will support or improve environmental outcomes.</li> <li>We will maintain our current assets to maintain or increase levels of service.</li> <li>We will provide for the replacement of critical assets at the end of their useful lives.</li> </ul>
<p><b>COMPLIANCE</b></p> 	<p>Increased level of central and regional government direction particularly with changes to the Drinking Water Regulations, the Freshwater Policy and the Road to Zero Strategy.</p>	<p>This will impact how we manage our infrastructure to ensure we protect our community by providing them with compliant drinking water, lessen the environmental impact from activities and look to reduce serious and fatal injuries on our roads.</p>	<ul style="list-style-type: none"> <li>Our supplies will meet drinking water standards.</li> <li>Our plants will meet resource consent conditions.</li> <li>We will reduce death and serious injuries on our roading network.</li> </ul>
<p><b>AFFORDABILITY</b></p> 	<p>The median household income for our District is \$32,400 (2018), with around 72.2% of our population holding a formal qualification (2018 census). With the increase in the ageing population, we are also forecasting that the average household size will decrease from 2.5 to 2.3 by 2051, with a higher proportion of single income or fixed income households.</p>	<p>The ageing population and moderate growth places a cap on the ability of our community to pay for infrastructure assets and services.</p>	<ul style="list-style-type: none"> <li>We will optimise our investment and apply asset management practices to our planning.</li> <li>We will smooth our costs where possible over time.</li> <li>Non-critical assets will be run to failure and only replaced if there is still a demand and requirement for the asset.</li> </ul>

All key assumptions are detailed in Section 4 of the LTP and these have been applied when developing the 30 year strategy. A risk based approach has been applied as we can't do everything as a priority and we have to choose. The preferred option is looking after what we already have, meeting legislative compliance and ensuring we are supporting the growth planned in our district. Further to this, with these challenges ahead, rates do need to increase to ensure we can respond accordingly, not leaving the cost for later years and compounding it.

There is still a moderate to high risk that will not be able to deliver the projected capital programme as specified. The timing may be further impacted if we have staff losses, change in supplier and contractor markets and delays with sourcing materials or goods.

For each challenge there are multiple options for how to respond. The following provides an overview of the challenges we are facing, the principle options and by when a decision will be required.



### 1. Improving the quality of our drinking water to meet new regulations

The Drinking Water Standards were reviewed in 2018 after the Havelock North incident. In 2019 the Government also announced the new approach and have a dedicated Regulator to lead change and drive improvement.

The Health Act 1956 requires Council, as a drinking water supplier to take all practicable steps to ensure they provide an adequate supply of drinking water that complies with the Drinking Water Standards. This requires upgrades to some of our plant assets or new and improved assets, the emphasis is also on continuing the quality testing process and monitoring facility.

**Assumption: We will continue to provide reticulated, treated water supply that meets the New Zealand Drinking Water Standards.**

	Principal options	Implications of options/what are the benefits?	Cost estimate and timing	Operational	Growth	Levels of service	Renewal
<b>Preferred option</b>	Meet compliance requirements	This option ensures that our communities are supplied with safe and potable drinking water that meets several compliance criteria, processes and procedures set out in the Drinking Water Standards for New Zealand (2005, revised 2018).	\$100,000 per 2021-58	✓			
		This option would be best for this situation. This will allow us to meet the regulatory requirements and will be the best value for money – meeting the requirements without over investing.	\$350,000 in 2024/25 and \$250,000 each year between 2031 to 2051			✓	
<b>Other options</b>	Upgrade all of our assets with the latest and industry best replacements	This option may imply purchasing new modern equipment, streamlining processes and investing in state of the art facilities for drinking water compliance that will sit above the requirements outlined in the Drinking Water Standards for New Zealand (2005, 2018).	\$100,000 per 2021-2051				
		The main trade off with this option is that it achieves the compliance requirements set by the regulatory standard but at a relatively higher cost.	\$350,000 in 2021/22 and			X	
			\$250,000 in 2031 to 2051			X	
Delayed approach to meet new regulations	This option will put our communities at risk by increasing the likelihood of supplying unsafe drinking water through the network. Choosing this option will also expose Council to unnecessary legal risks.	\$600,000 total between 2021 to 2024					
	This option may give us a window to save money in the short term but will expose us to a substantial amount of risk that we cannot afford to take.	No funding allocated		X			

Covid-19 has been identified as a risk and we have made some assumptions in Section for of the LTP. It also relates directly to the delivery of our capital programme. The three waters stimulus funding adds additional delivery capacity constraints by increasing the programme.

Some capital projects have been re-prioritised due to the change in tourism from international to regional and national visitor number.

There is potentially some goods and services delays for specialised equipment but we do not see any of the renewals programme being impacted

## 2. Provide more resilience to our water supplies so that we can limit severe water restrictions over summer - improve the security of our water supplies - District Wide

Network infrastructure required to facilitate this residential growth in the next 30 years has been included in the LTP. Apart from Growth being a key driver for additional water, it is also about ensuring that we have resilience in our supply over the drier months. We know that we can't totally eliminate water restrictions during summer, however, we aim to reduce the severe water restrictions.

**Assumption:** Meet resource consent requirements for our "water take consents" from Waikato Regional Council. (Refer Assumption on next page.)

	Principal options	Implications of options/what are the benefits?	Cost estimate and timing	Operational	Growth	Levels of service	Renewal
Preferred options	Increase education around water usage	More emphasis on educating our community on water usage and conservation initiatives to assist with the water reduction.  The benefit of doing this would be getting the engagement and involvement of our community as a partner in achieving our environmental outcomes through better water use, while enhancing and promoting water conservation efforts as a whole.	\$50,000 per 2021 to 2051	✓			
	Provide additional bores and water treatment				✓		
	• Morrinsville Additional Water Supply 1		\$4.65 million in 2023/24		✓		
	• Morrinsville Additional Water Supply 2	The LTP allows for additional investigation bores, new bore equipment and also treatment plants to be developed over the life of the strategy.	\$2.15 million in 2024/25		✓		
	• Morrinsville additional bore	The main benefit of this option is that it enables us to gain access to water resources, which will be used as contingencies for emergencies. This boosts our resilience in the long term.	\$550,000 in 2030/31 \$3 million in 2031-36 and \$3 million in 2046-51		✓		
	• Matamata additional bore				✓		
	(note not unlimited water)						
	Reduce water loss in the network through leak detection and leak repairs	A leak detection programme underway to investigate where leaks are currently in our network so that they can be rectified. This also includes looking at private laterals and advising property owners of any leaks within their property.	\$50,000 per year 2021-2024			✓	
	Network resilience improvements	This option is assumes a more proactive approach as it seeks to rectify the deficiencies in our water network instead of investing in new water bore infrastructure, which can be expensive.  This option includes development of bore sites to improve network resilience, replace SCADA and replace old meters. This is being funded through the water reform programme.	\$344,118 in 2021/22			✓	
Other option	Install universal water meters	An analysis was completed for the implementation of universal water meters but it was found that at this current time it wasn't cost beneficial but it should be reviewed again at a later time.	\$2.7 million between 2021 and 2024	✓			

### 3. Provide more resilience to our water supplies so that we can limit severe water restrictions over summer - Improve the security of our water supplies - Morrinsville

There have been a number of water events affecting the Morrinsville community in recent years.

Morrinsville is currently supplied with water from a single 17km long main trunk line from the Topahaehae Stream on Waterworks Road. The mains pipe failed in December 2017 and resulted in a large water outage for the town. There have been water quality issues due to the manganese and iron levels (i.e. brown water, bad taste), and most recently the unprecedented, extremely dry summer in 2019/20 led to imposing level 4 water restrictions. Morrinsville has also been identified as a growth area, placing further pressure on water supply and contributing to residents' dissatisfaction with this service.

In the 2018 LTP council investigated new sources of water at Wisely and Lockerbie and a consent has been lodged with the Waikato Regional Council.

**Assumption:** We will continue to deliver treated water to current and future residential customers in Morrinsville.

	Principal options	Implications of options/what are the benefits?	Cost estimate and timing	Operational	Growth	Levels of service	Renewal
<b>Preferred options</b>	Plan to reline the existing main trunk line before its due to be replaced.	By relining the pipe we can extend the asset life and reduce the risk of future breakages. Relining the pipe will lead to reduced flow rates and reduced quantities of water getting into town.	\$7.5 million in 2039				✓
	Develop additional bores and water treatment plant		\$4.15 million in 2023/24				
	<ul style="list-style-type: none"> <li>Morrinsville Additional Water Supply 1</li> <li>Morrinsville Additional Water Supply 2</li> <li>Morrinsville additional bore</li> </ul>	<p>The LTP allows for two new bores, the equipment and also treatment plants to be developed over the life of the strategy.</p> <p>Though these new two bores would be aimed to increase capacity and resilience, water conservation and care should still be exercised.</p>			✓		
	Matamata additional bore (note not unlimited water)						
<b>Other options</b>	Reduce water loss in the network through leak detection and leak repairs and increased education around water usage.	<p>A leak detection programme is underway to investigate where leaks are currently in our network so that they can be rectified. This also includes looking at private laterals and advising property owners of any leaks within their property.</p> <p>More emphasis on educating our community on water usage and conservation initiatives to assist with water reduction.</p>	\$40,000 per 2021 - 51	✓			
	Install universal water meters	An analysis was completed for the implementation of universal water meters but it was found that at this current time it wasn't cost beneficial but it should be reviewed again at a later time.	\$2.7 million between 2021 and 2024	✓			
	Do nothing.	The main trunk is a critical asset. If we do nothing, the pipe will continue to deteriorate and more frequent breakages may be experienced. There will also be the continued level 3 and 4 water shortages during dry summers as the water supply is purely relied on the Topahaehae stream intake.	No extra cost from 2021 - 2051				

#### 4. Improving our infrastructure assets to reduce the adverse effects on the environment.

The National Policy Statement for Freshwater Management 2020 sets out the objectives and policies for freshwater management under the Resource Management Act 1991.

Te Mana o te Wai is a concept that refers to the fundamental importance of water and recognises that protecting the health of freshwater protects the health and wellbeing of the wider environment. It protects the mauri of the wai. Te Mana o te Wai is about restoring and preserving the balance between the water, the wider environment, and the community.

The detailed requirements that will be applied to our new consents are not yet specified but we need to ensure we plan ahead and try and anticipate what the new rules and regulations will require us to do (Refer Assumption 22 in Section 4).

**Assumption:** We will comply with consent conditions, environmental standards and requirements.

Principal options	Implications of options/what are the benefits?	Cost estimate and timing	Operational	Growth	Levels of service	Renewal
Continue to investigate feasibility to discharge to land as part of our consent renewals	The investigations will consider partial or full disposal to land for our wastewater discharges and the potential for decreasing the environmental impact we are having on our rivers and streams.	\$50,000 in 2021/22	✓			
Reduce the infiltration in the wastewater network from stormwater	By reducing the infiltration of stormwater into the wastewater system we are not overloading the wastewater system at times of heavy rainfall and allow no overflows into the environment. Smoke testing and CCTV work will provide an understanding of where the issues are. Then maintenance and renewal can be targeted to these areas.	\$50,000 per 2021-2025	✓			
	The main benefit of doing this in essence is that we will be treating wastewater instead of stormwater and thus our plant will be performing as designed during heavy rainfall. This also avoids us from upgrading our wastewater networks and plants due to stormwater infiltration.					
Reduce water loss in the network through leak detection	A leak detection programme underway to investigate where leaks are currently in our network so that	\$40,000 per 2021-51	✓			
	they can be rectified. This also includes looking at private laterals and advising property owners of any leaks within their property.					
	This is a more proactive approach by looking at solutions and optimising the current network instead of investing into new assets right away.					
Achieve compliance with our Discharge consents	Council is required to ensure it meets resource consent conditions. Individual consent will require Council to allow for funds to upgrade plants so they meet increased resource consent requirements.	Matamata \$11 million between 2025 to 2029	✓			
		Morrinsville \$4 million between 2026 to 2029	✓			
		Te Aroha \$6.2 million between 2026 to 2029	✓			
Network resilience improvements	This option includes purchase and deployment of generators and replacement of SCADA system. This is being funded through the water reform programme.	\$484,412 in 2021/22				✓

Preferred options

### 5. Improving the quality and safety of our transport network to reduce fatal and serious injuries.

In late 2019 The Ministry of Transport released the Road to Zero Road Safety Strategy. This was in response to the lack of achievement in reducing deaths and serious injuries. A target of a 40 percent reduction in deaths and serious injuries by 2030 is proposed.

Assumption:		We will reduce the number of fatal and serious injuries on our roads.					
Principal options	Implications of options/what are the benefits?	Cost estimate and timing	Operational	Growth	Levels of service	Renewal	
Preferred options	<p>By focusing funding on our high risk routes the benefits are effective and can have the greatest impacts.</p> <p>Work by Waka Kotahi (NZTA) and our own knowledge has identified and prioritised these areas and looked at potential improvements to reduce fatal and serious injuries on our network.</p> <p>This option embodies a best value for money approach by utilising evidenced based spending and supplemented by our local knowledge of our roads. This approach yields better and safer road network outcomes.</p>	\$500k per 2021-51			✓		
	<p>Enhance safety and ccessibility of footpaths, bike lanes and cycleways</p>	<p>This will result in people being provided with alternative transport options. Council is planning to widen footpaths where most appropriate and provide for safe walking routes, connecting our towns.</p>	\$35,000 per year 2021-2023		✓		
	<ul style="list-style-type: none"> <li>Matamata to Piarere Cycleway</li> </ul>		\$150,000 per year 2021-2051		✓		
	<ul style="list-style-type: none"> <li>Te Aroha to Morrinsville Cycleway</li> </ul>		\$2 million in 2026/27		✓		
		\$5 million in 2031			✓		
Other options	<p>By focusing funding on our high risk routes the benefits are effective and can have the greatest impacts.</p> <p>Work by Waka Kotahi (NZTA) has identified these areas and looked at potential improvements to reduce fatal and serious injuries on our network.</p> <p>This option may not be ideal, as it does not exploit our local road knowledge as a road controlling authority. Some gaps may not be covered due to the lack of collaboration and information exchange between Waka Kotahi (NZTA) and Council.</p>	\$1 million per 2021-2051			X		
	<p>Reduce our safety work on our network</p>	<p>This option aims to discontinue with our investment toward a safe road network. This may be an economical option but this puts us in a position that is not aligned with the Road to Zero vision. This in effect, will not help our communities enjoy a safer road network</p>	No funding allocated to safety works	X			

## 6. Upgrade Council's current infrastructure to cater for growth in identified areas.

Network infrastructure required to facilitate the residential growth areas in the next 30 years as identified in the District Plan has been included in the LTP and this Strategy. Growth has been higher than anticipated and some additional land has been zoned residential, network modelling has been completed to identify what work is required.

**Assumption:** Growth will occur as planned.

	<b>Principal options</b>	Implications of options/what are the benefits?	<b>Cost estimate and timing</b>	<b>Operational</b>	<b>Growth</b>	<b>Levels of service</b>	<b>Renewal</b>
<b>Preferred option</b>	Upgrade infrastructure to meet growth as per projected figures for residential zoned land	This manages Council's risk in over investing or hindering development of residential zoned land.	\$16 million from 2021 to 2030		✓	✓	
		This allows Council to manage the assets in a planned manner.					
<b>Other options</b>	Provide additional capacity for growth not limited to zoned land	This may be attractive for developers or industries to look at developing land or increasing their current operation in our District but places a risk on Council that it cannot recover the investment back from developers.	\$16 million from 2021 to 2030				
			\$15 million in year 2021/22		X	X	
			\$5 million in year 2022/23				
	Delay the infrastructure upgrades → delay growth	This will hinder development and give no certainty to developers in the District to be able to subdivide in the District and hinder growth.	No additional costs	X			

### 7. Meeting customer expectation with our improvements now and in the future.

It is about providing the community with the appropriate infrastructure at an affordable price. We are not able to provide the community with everything that they want as it is not affordable and not a sustainable delivery model. Projects need to be prioritised in accordance with strategic fit with our Vision and Community Outcomes, and how they contribute to the overall community wellbeing (Social, Cultural, Environmental and Economic). The key projects are mainly in the Parks and Open Spaces, Community Facilities and Buildings and some of the Footpath and cycleway projects.

**Assumption:** We are aware of Community expectations.

Principal options	Implications of options/what are the benefits?	Cost estimate and timing	Operational	Growth	Levels of service	Renewal
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Upgrades prioritised as per community expectations and with strategic support and where business cases have been developed.						
<ul style="list-style-type: none"> <li>Cycleway to Piarere</li> </ul>	This option allows us to listen and tailor to the needs of the community by making more informed business decisions that would align to our strategies and yield community outcomes. This enables us to address community issues and opportunities in the short term by delivering the projects on time, on budget and in scope while ensuring that the outcomes and benefits that these projects aim to deliver will last in the long term for the enjoyment of our communities.	\$2 million in 2026/27			✓	
<ul style="list-style-type: none"> <li>Development of Te Aroha Spas</li> </ul>		\$2 million in 2022/23, \$7 million in 2023/24 and 8,381 million in 2024/25			✓	
<ul style="list-style-type: none"> <li>Increased indoor sports courts for Matamata</li> </ul>		\$2 million in 2023/24			✓	
<ul style="list-style-type: none"> <li>Morrinsville Recreation Ground Master Plan and development</li> </ul>		\$250,000 per second year 2021-2031			✓	

Preferred options

Complete further business cases on some of the projects that the have been identified by the community	The approach of creating business cases enables us to ensure that these investments are:	\$50,000 in 2023/24	✓			
<ul style="list-style-type: none"> <li>Te Aroha to Morrinsville Cycleway</li> </ul>	<ul style="list-style-type: none"> <li>Strategically necessary (aligns with our strategy)</li> <li>Economically smart (offers best value for money)</li> </ul>	\$100,000 in 2022/23	✓			
<ul style="list-style-type: none"> <li>Cover and improve the Morrinsville pool</li> </ul>	<ul style="list-style-type: none"> <li>Commercially achievable (attracts suppliers, contractors, external partners and/or developers).</li> <li>Financially affordable.</li> </ul>	\$200,000 in 2023/24	✓			
<ul style="list-style-type: none"> <li>New Matamata Civic Centre Stage</li> </ul>	<ul style="list-style-type: none"> <li>Sustainably manageable (ensures benefit realisation in the long term)</li> </ul>	\$4 million in 2026-28			✓	
<ul style="list-style-type: none"> <li>New Te Aroha Civic Facilities</li> </ul>						

Exclude projects that are not aligned with council objectives or supportive business cases.	This option allows council to only deliver projects that are strategically linked, thoroughly planned and most likely yields the best outcomes for the community.	No extra cost in 2021 - 2051				
<ul style="list-style-type: none"> <li>Increase in Staff Housing</li> </ul>	This allows council to focus resources and time to projects that are worthwhile, evidenced backed and objectively assessed by having a business case first before it gets approval for project delivery. This approach allows better use of resources and avoids investing on projects that are driven reactively.					
<ul style="list-style-type: none"> <li>Short to medium upgrades to the Morrinsville library, Camping facilities, Te Aroha Council building development</li> </ul>						
<ul style="list-style-type: none"> <li>Matamata bypass</li> </ul>						

# Water

## Background

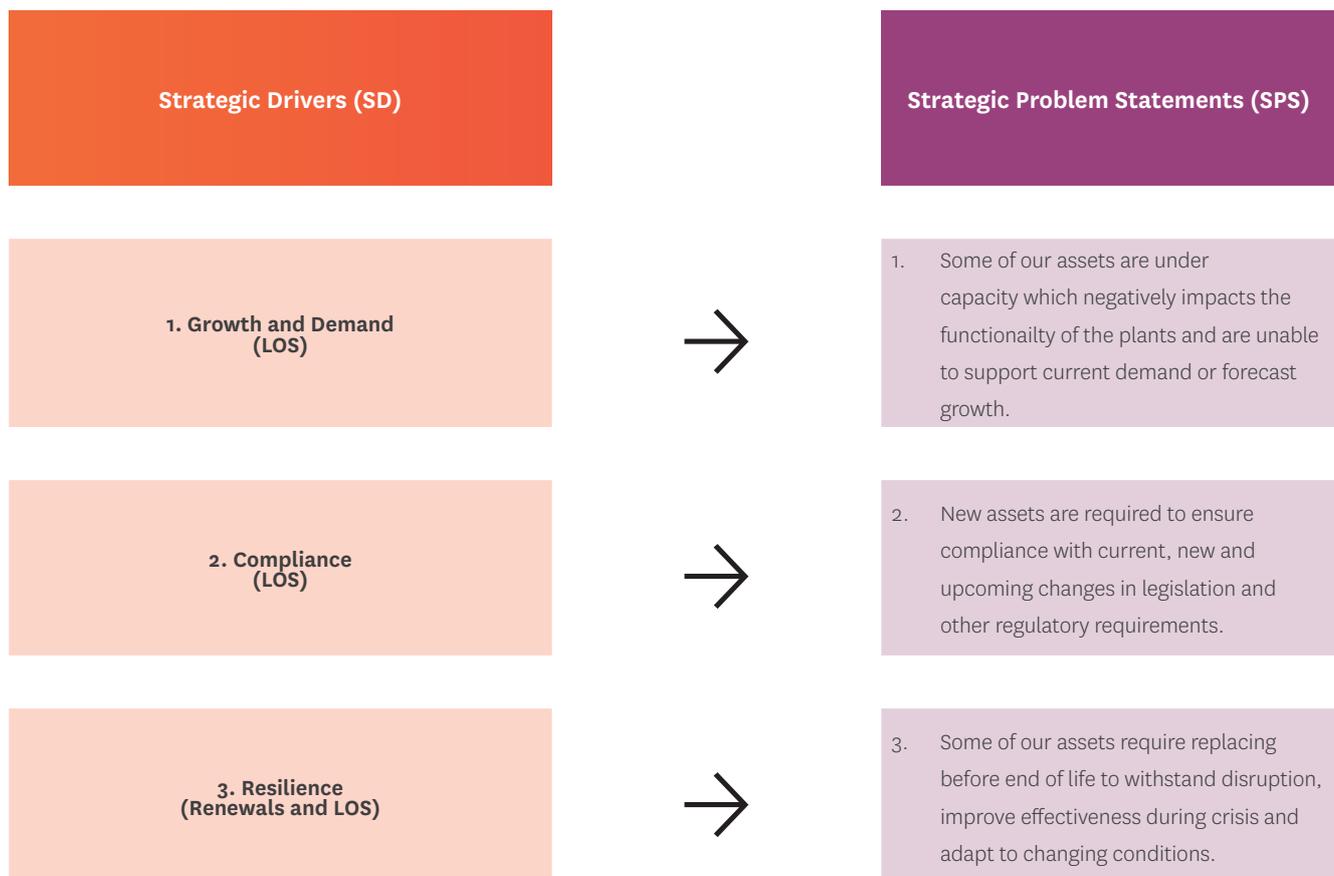
Our Water service ensures our communities are supplied with clean, safe drinking water to ensure the health and wellbeing of our residents. Our key levels of service for the Water assets are described in Section 6. Our Water service consists of seven water supply schemes, including nine water treatment plants, 10 pump stations and 393 km of reticulated water supply to our towns and rural settlements.

## Context

Water is a precious resource, and there is an increasing demand for water to both residential and industrial users. With stricter environmental standards and conditions on our water take resource consents, and increased frequency and severity of droughts as a result of higher temperatures and less rainfall, we need to look for new ways to save and conserve water, and increase the security of our water supply for our communities. The reality is that water restrictions cannot be avoided but we look to have our systems improved so that we can limit severe water restrictions during summer.

Freshwater management, including taking water for drinking water supply, is an important community issue and of particular interest to iwi. We will consult with iwi on the renewal and potential new water take consents.

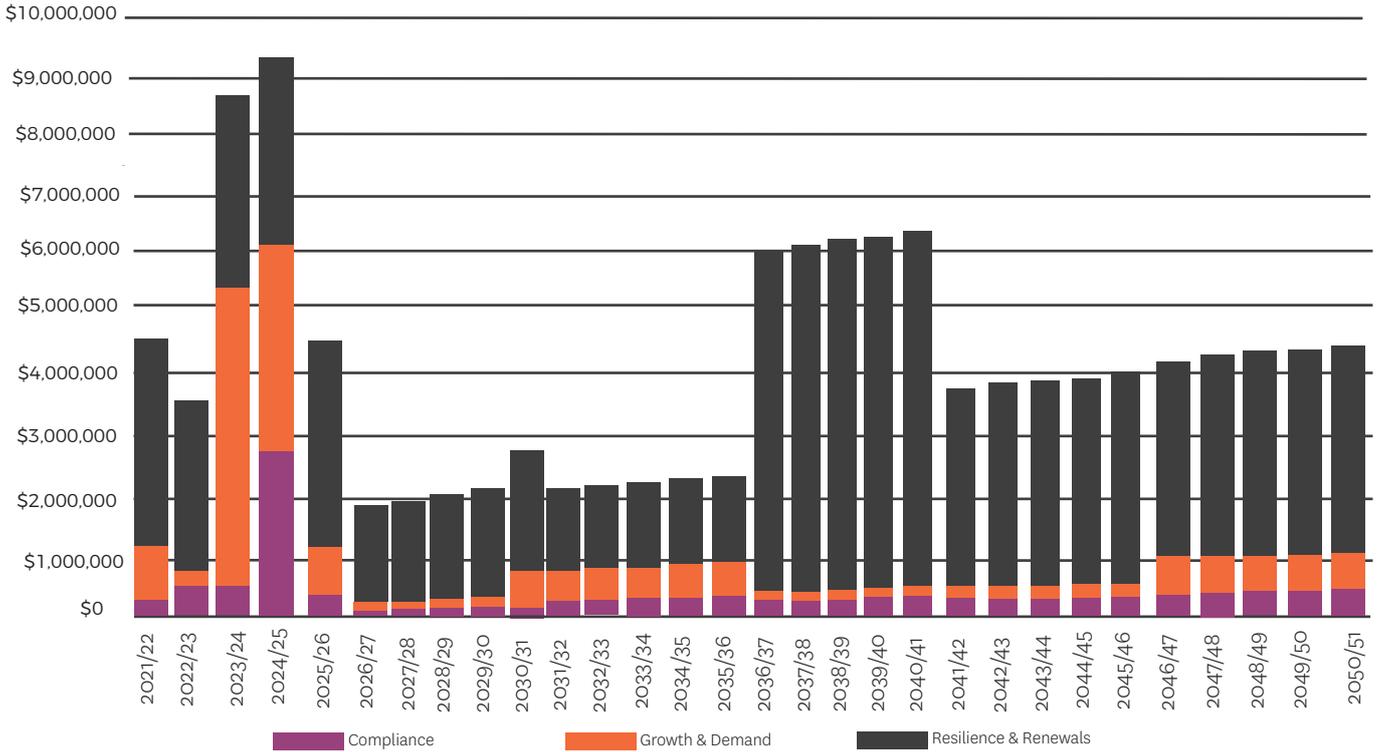
## Strategic Overview



Overall we are not planning to increase the direct level of service for our community but compliance requirements will provide an improvement to the water treatment.

## Capital and Renewal Expenditure

WATER PROJECTED BUDGETS BY STRATEGIC DRIVERS VS FINANCIAL YEAR



Our forecast budgets include funding for continuous District-wide improvements to our water treatment plants and processes to meet **COMPLIANCE**. Some of which include:

PROJECT NAME	2021/22	2022/23	2023/24	2024/25 TO 2030/31	2031/32 TO 2050/51
Implement water loss strategy	\$50,000	\$50,000	\$50,000		
Lime dosing tank duplication - Te Aroha		\$100,000			
Lime dosing tank duplication - Tills Road		\$100,000			

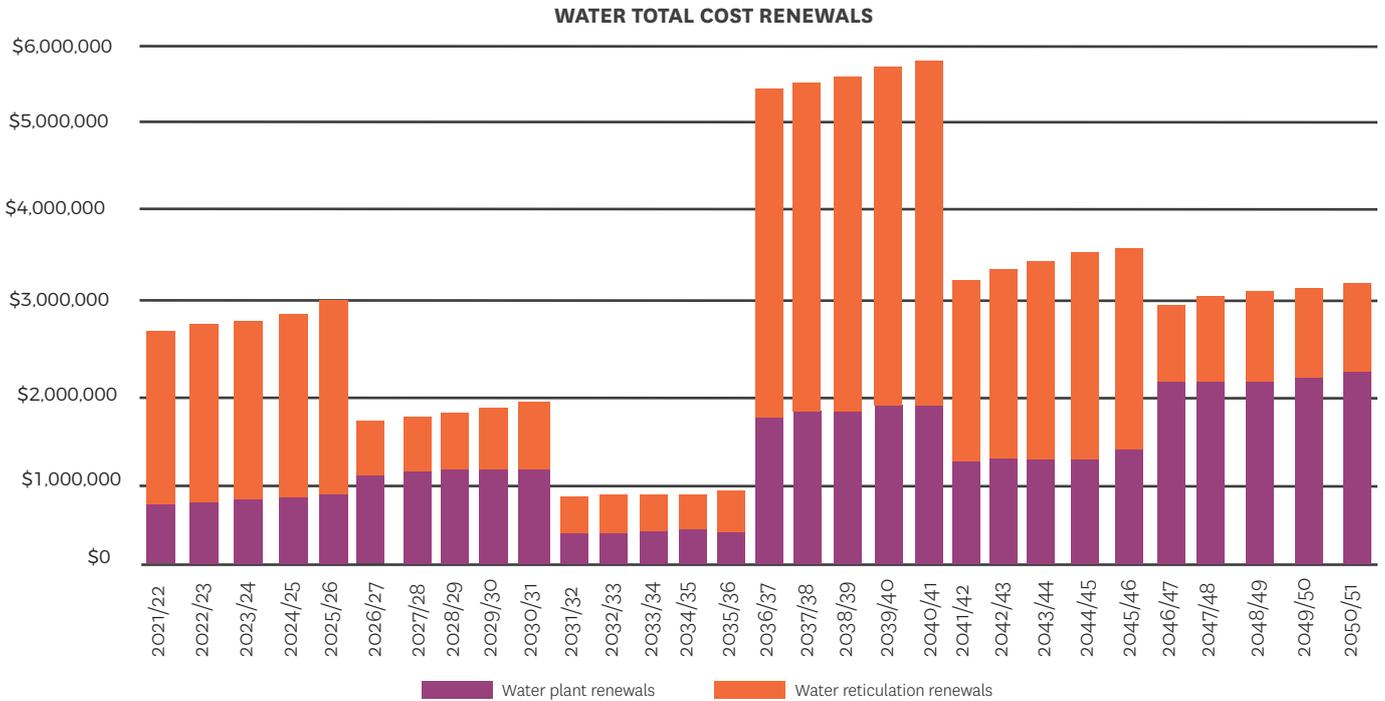
Raw water monitoring \$100,000

Our improvements also include upgrade works to ensure the zoning in our District Plan can be developed and there is adequate water and the appropriate reticulation network in place. Some **GROWTH AND DEMAND** projects include:

PROJECT NAME	2021/22	2022/23	2023/24	2024/25 TO 2030/31	2031/32 TO 2050/51
Additional Water Supply for Morrinsville 1	\$500,000		\$2,500,000	\$1,500,000	
Water pipe size increases associated with new subdivisions	\$75,000	\$75,000	\$75,000	\$525,000	\$1,500,000
Additional Water Supply for Morrinsville 2			\$1,500,000		
Taharoa Road industrial new ringmain in Morrinsville			\$400,000	\$600,000	
Treated water storage construction in Matamata				\$1,000,000	
Develop and construct a treatment plant at the Waharoa Airfield bore			\$150,000	\$650,000	
Matamata South Bore				\$550,000	
Matamata – Eldonwood South ring main upgrade	\$360,000				
Matamata Tower Road main pipe upgrade		\$175,000			

There are also projects planned to increase the **RESILIENCE** to our current network and supply. Some of which include:

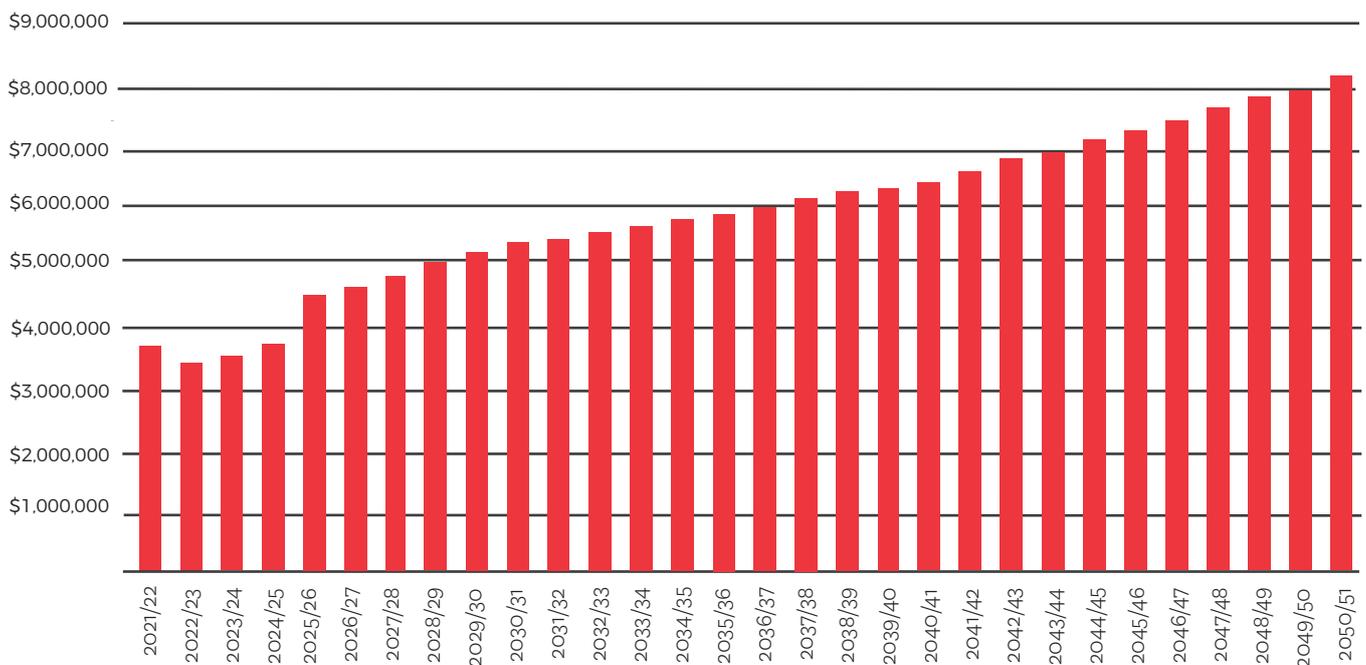
PROJECT NAME	2021/22	2022/23	2023/24	2024/25 TO 2030/31	2031/32 TO 2050/51
Reticulation on line monitoring			\$250,000		
Reticulation monitoring		\$150,000			
Gross pollution monitoring (conductivity and PH probes)			\$150,000		
Rolleston Street generator			\$100,000		



Business as usual projects are mainly our plant and reticulation **RENEWALS**. The renewal profiles have been averaged over five years to allow for smoothing of the budget. This helps us manage the replacement of assets based on their criticality, potentially deferring the replacement based on condition of non-critical assets and bringing forward the replacement of critical assets. This smoothing allows us to manage the work programme in a sustainable manner over the term of the strategy. The backlog is not significant and can be managed going forward with this renewal strategy. ANother focus of the renewal programme is to replace all steel pipes

The main trunk line replacement in Morrinsville can be seen in year 2039 which has been smoothed out across five years. Further to Challenge 3 on page 42, whether or not the main trunk line is replaced will be subject to further consideration by Council. There is an increase in plant renewal costs as a result of continued investment to improve the resilience and compliance of our drinking water quality.

### WATER OPERATING COSTS



It is assumed that the operating costs for the water assets will remain reasonably consistent but has increased over the past three years with new assets coming on board to increase the compliance to meet Drinking Water Standards. It also includes inflation and some additional costs due to the increase in the stock of assets through new subdivisions. With the increase of the monitoring requirements there is also additional costs associated with the management and systems of this. From the graph we can see an increase in operational expenditure from year 5 onwards. This is due to the additional treatment plants in Waharoa and Lockerbie.

## Asset Condition

The water infrastructure assets' condition and reliability of data are described in the Water Asset Management Plan 2021-51. Our water treatment plants (WTP) and reticulated water supplies are generally in good condition, delivering the agreed level of service to our community.

The lives of water pipes are between 30 and 100 years depending on material. We have a fairly good understanding of what type of pipes we have. There are approximately 9% of length of pipes of which we do not know the material. These are mainly for our service lines and not our critical assets. We are working through identifying the material types when there are service requests or repairs. However the age of the assets is something that is a bit more difficult to ascertain exactly. We therefore carry out regular condition assessments which inform our renewal programmes and have been given the shortest asset life pipe material.

Water loss (unaccounted for water) has been identified as a potential issue and we have been undertaking a leak detection programme to identify the cause. One source of losses is from old steel pipes and in particular spiral riveted steel. The replacement of these is being treated as a priority. We have identified that our main trunk lines out treatment plants and our bores are critical assets but additional work has been started to further develop and update our critical asset information in our Asset Management system. We are reviewing our asset criticality criteria and completing modelling to ensure we also capture the asset criticality for supply to critical services and more details on critical bridge structures that support our services.

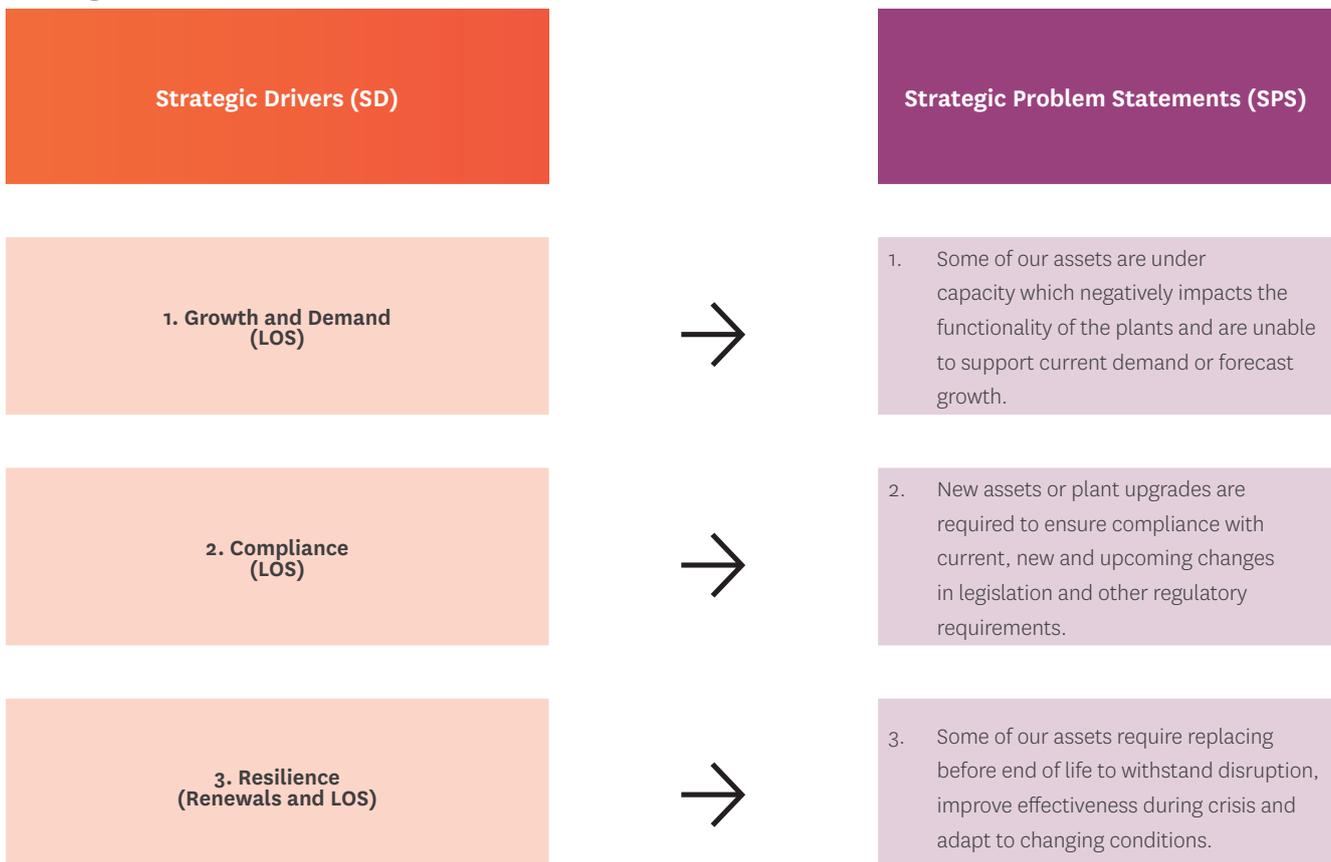
## Wastewater

**Background** Our wastewater network consists of five wastewater treatment plants, 36 pump stations and 243km of wastewater pipes. The wastewater service ensures that wastewater (sewage and grey water that goes down your drains) is collected, treated and disposed of appropriately for the health and wellbeing of our community and environment. Our key levels of service for the wastewater assets are described in Section 6 of the LTP.

**Context** With the increased frequency of severe weather events, the resilience of our wastewater network is under pressure. Overflows from the network as a result of heavy rain pose a risk to the environment and the public health of our community.

The National Policy Statement for Freshwater Management 2020 is also likely to put increased requirements for treatment and restrict disposal to waterways. This may also become a requirement of our discharge consent in the future and the disposal to land is being investigated as an option when renewal of resource consents are required. We have identified that our main trunk lines out treatment plants and our bores are critical assets but further work has been started to further develop and update our critical asset information in our Asset Management system. We are reviewing our asset criticality criteria and completing modelling to ensure we also capture the asset criticality for supply to critical services and more details on critical bridge structures that support our services.

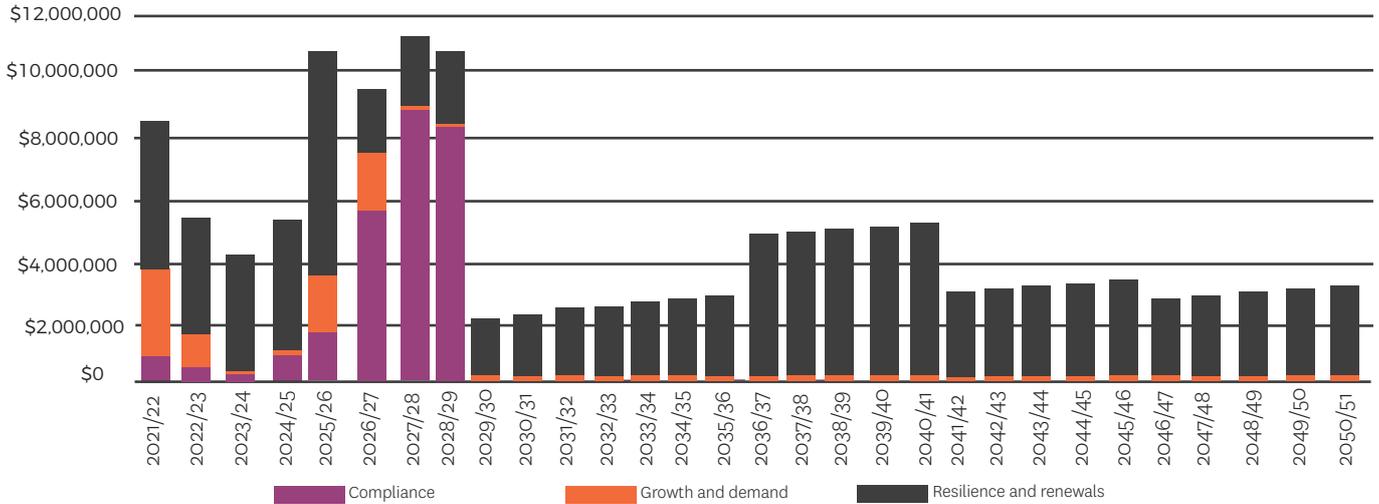
## Strategic Overview



Overall we are not planning to increase the direct level of service for our community but compliance requirements will provide an improvement to the wastewater treatment

## Capital and Renewal Expenditure

WASTEWATER PROJECT BUDGETS BY STRATEGIC DRIVERS VS FINANCIAL YEAR



Our forecast budgets include funding for continuous District-wide improvements to our wastewater treatment plants and processes to meet **COMPLIANCE**. Our plants are generally meeting current consent conditions with the exception of Waihou where some upgrade works are required.

The Morrinsville and Matamata wastewater plant consent will need to be renewed in 2024/25 and upgrade works will like be required to meet new legislation. Some individual projects include:

PROJECT NAME	2021/22	2022/23	2023/24	2024/25 TO 2030/31	2031/32 TO 2050/51
Overflow screening and flowmeter at Allen St. pump station	\$300,000				
Waihou wastewater treatment plant upgrade	\$300,000	\$500,000	\$200,000		
Morrinsville wastewater treatment plant upgrade				\$4,000,000	
Matamata wastewater treatment BNR plant/ waihou discharge				\$11,000,000	
Te Aroha Wastewater Treatment Plant MBR / Anoxic Upgrade				\$5,200,000	

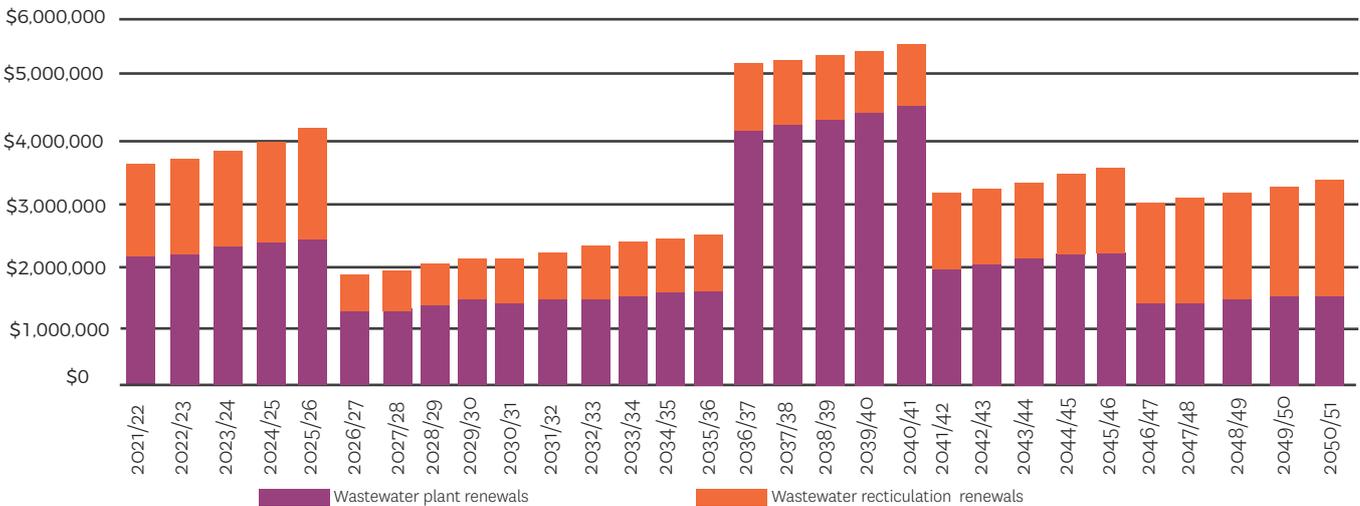
Our improvements also include upgrade works to ensure the zoning in our District Plan can be developed and there is adequate capacity at our wastewater treatment plants and the appropriate reticulation network in place. Some **GROWTH AND DEMAND** projects include:

PROJECT NAME	2021/22	2022/23	2023/24	2024/25 TO 2030/31	2031/32 TO 2050/51
Burwood Road bulk sewer	\$1,200,000	\$1,200,000			
Tower Road pump station and rising main				\$3,200,000	
Morrinsville NW sewer main	\$1,900,000				
Wastewater pipe size increases associated with new subdivisions	\$50,000	\$50,000	\$50,000	\$350,000	\$1,000,000

There are also projects planned to increase the **RESILIENCE** to our current network and supply. Some of these key ones include:

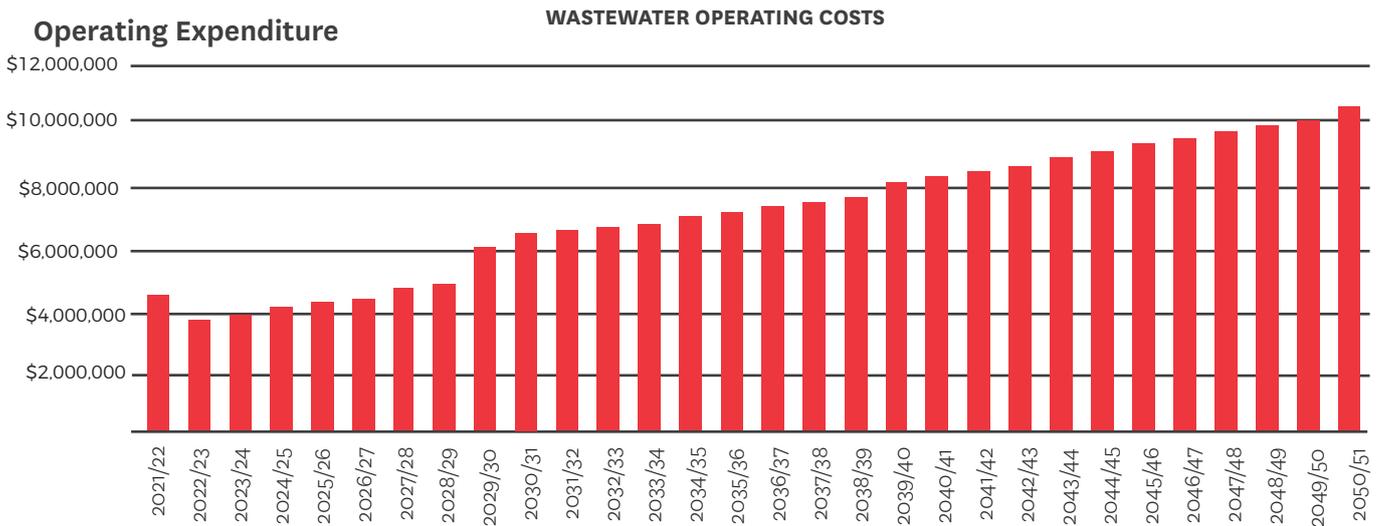
PROJECT NAME	2021/22	2022/23	2023/24	2024/25 TO 2030/31	2031/32 TO 2050/51
Upgrade of Te Aroha falling main				\$3,000,000	
Te Aroha wastewater treatment plant discharge consent					\$1,000,000

**WASTEWATER TOTAL COST RENEWAL**



Business as usual projects are mainly our plant and reticulation **RENEWALS**. We plan to smooth the reticulation costs as much as possible to allow us to manage our work programme in a sustainable manner over time. The renewal strategy is to focus on our critical assets and replace or reline these before the end of their lives, potentially deferring the replacement of non-critical assets. The renewal strategy also is to replace or earthenware pipes throughout the network. We undertake regular monitoring and condition assessments of our assets to inform the prioritisation of work and minimise the potential risk of failure.

All wastewater treatment plants have been upgraded in recent years but some plant assets such as membranes require replacement over relatively short time frames. There is also a large amount of electronic equipment that requires replacement every five years. As mentioned above, the Morrinsville and Matamata discharge consent will be required to be renewed in 2024/25.



It is assumed that there is a small increase in operating costs for the wastewater activity with the addition of inflation as well. This is based on the assumption that our levels of service will not change but there are improvements being made to our wastewater treatment plants over time which will require additional maintenance.

It also includes some additional costs due to the increase in the stock of assets through new subdivisions. With the increase of the monitoring requirements as a result of new consents, there is also additional costs associated with the management and systems of this.

### Asset Condition

The wastewater infrastructure assets’ condition and reliability of data are described in the Wastewater Activity Management Plan 2021-51. We have good knowledge of the wastewater assets, and our forecast confidence for this group is fairly accurate (confidence rating B). Overall our wastewater assets are in average to good condition, with a programme of regular asset condition assessments which informs our renewal profile and priorities.

There are approximately 5% of assets that we don’t know the material of construction. This is not considered to be a significant risk as the life of “unknown” pipes are the same as the lowest rated pipe. The condition of the reticulation system varies with the various schemes. Te Aroha is subject to higher infiltration rates that can indicate a poor condition. The modelling of the Morrinsville reticulation for dry and wet weather flows indicates that the catchment is generally in poor condition. It is believed that much of the inflow and infiltration originates within private properties from defective pipes and low gully traps and a programme of testing is addressing this issue. We are undertaking condition assessments of our reticulation using closed circuit television (CCTV) and especially for assets approaching scheduled renewal. This is resulting in some renewals being deferred and the pipes given an extended life. We also have a program of inspections using smoke testing and other means to identify faults and to ensure they are remedied and allowing us to prioritise renewals.

Work has commenced on completing some further work on criticality of our Assets. We are refining our criticality criteria to include reticulation assets that are more critical which supply essential services and schools, and we are also including high risk assets that could cause environmental concerns or issues if failure. This will assist with future decision making processes.

## Stormwater

### Background

Stormwater systems safely and efficiently drain surface water to minimise flooding in our communities. Stormwater is drained from our urban areas and is discharged either into streams, rivers, open drains, retention or detention ponds. Our key levels of service for the stormwater assets are described in Section 6 of the LTP. We aim to ensure stormwater is well managed, and work with property owners to improve stormwater drainage and reduce flooding.

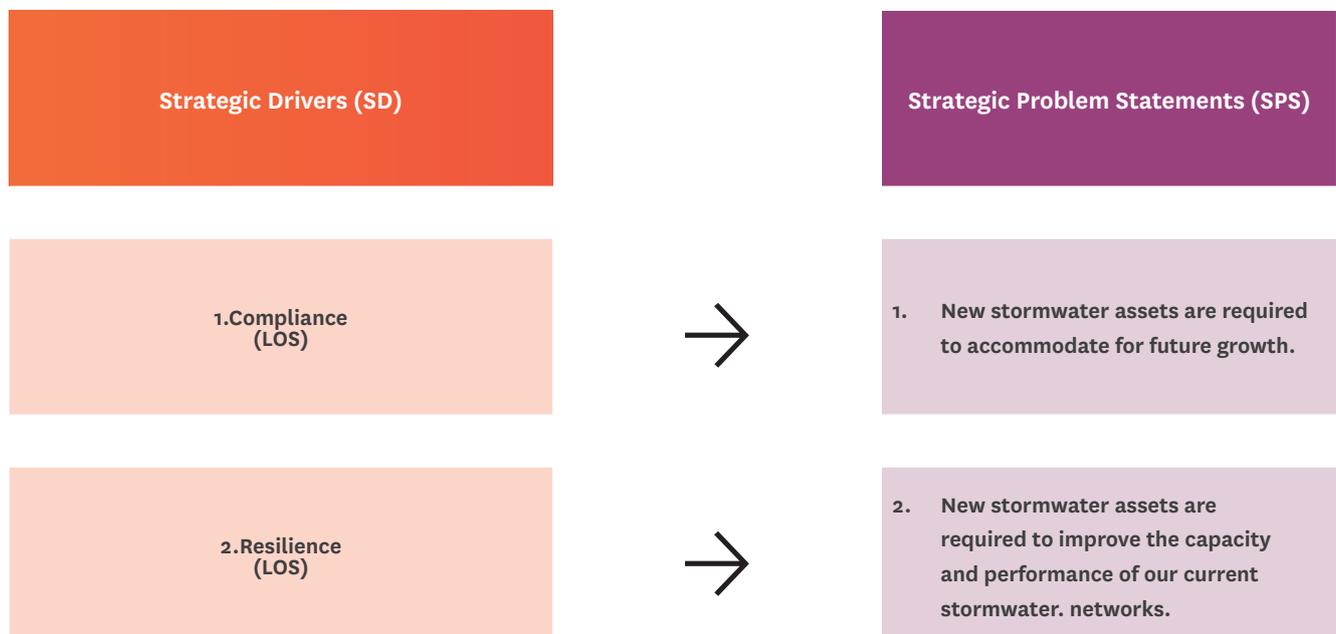
The network consists of 6 retention ponds, 148km of stormwater pipes, manholes and soakage systems and devices.

### Context

Council is responsible for urban stormwater management, while the Waikato Regional Council is responsible for drains and rural land drainage. Customer satisfaction is traditionally low in this area, as many customers are not happy about surface flooding during heavy rain. Surface flooding is an acceptable way to manage flooding during severe weather events which are planned to increase in frequency. While surface flooding is not considered ideal by many people, it is a legitimate, cost effective way to handle stormwater for short periods of time during severe storms. Similarly, due to the limited capacity of our existing stormwater network, soakage is the preferred method of disposal as this is more affordable and manageable. New developers will be required to manage soakage onsite to minimise the impact on the community.

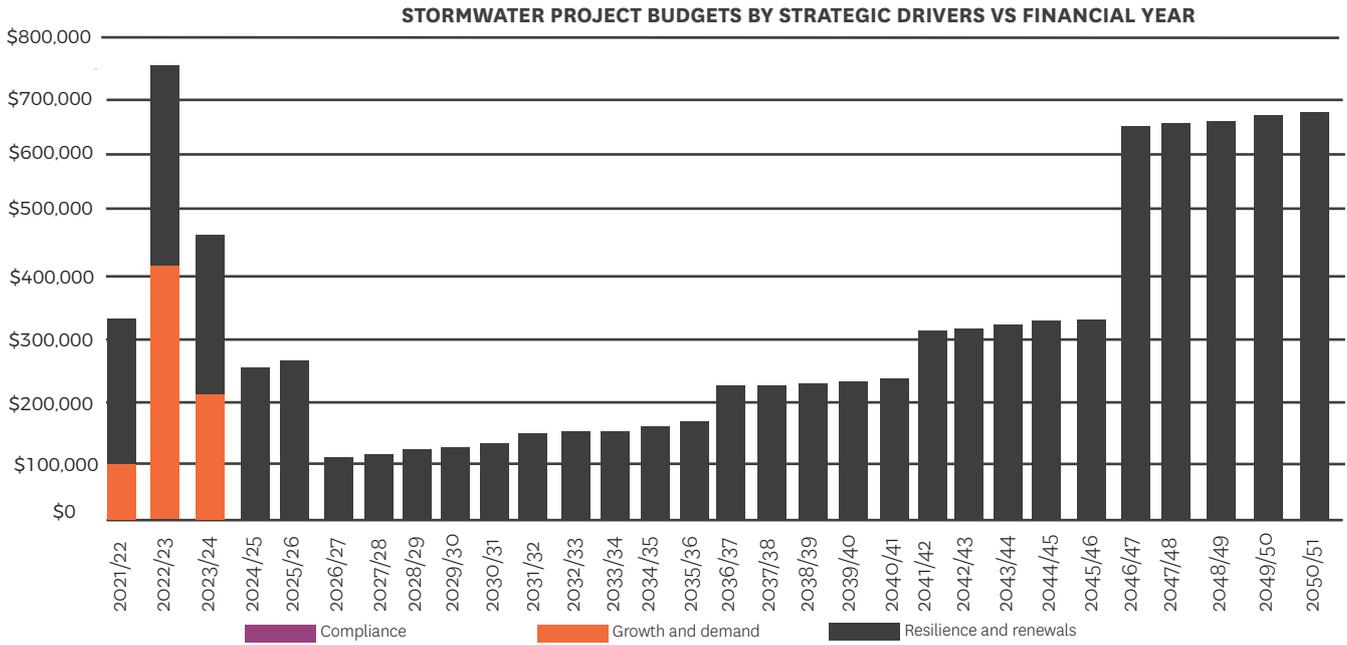
With the National Policy Statement for Freshwater Management 2020 it is expected that some treatment of stormwater may be required in the future. What this will involve to our existing network is unknown at the time of writing this strategy but what we do know is that any new works requires additional stormwater filtration and treatment prior to discharge or soakage.

### Strategic Overview



Overall we are not planning to increase the direct level of service for our community but compliance requirements will provide an improvement to the treatment of stormwater. The increase in intensity of flooding events will require additional investment

### Capitl and Renewal Expenditure



Our forecast budgets include no funding for continuous District-wide improvements to our stormwater network to meet **COMPLIANCE**.

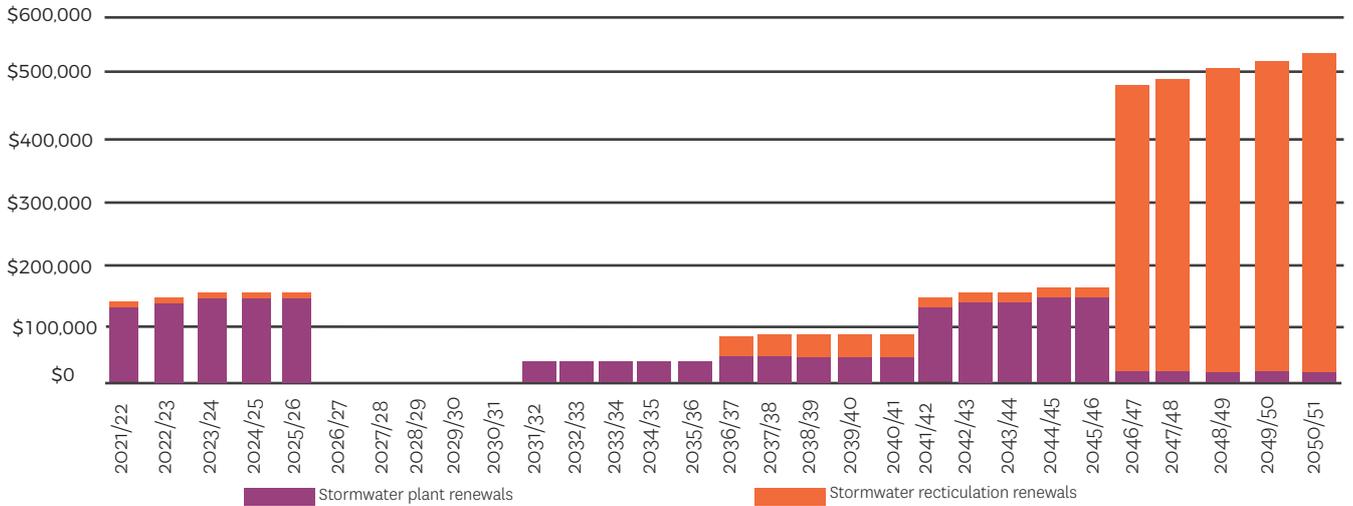
For **GROWTH AND DEMAND**, the policy of the developer to manage stormwater on site through soakage is the continued approach for our growth areas. There are only some very minor projects planned, which include:

PROJECT NAME	2021/22	2022/23	2023/24	2024/25 TO 2030/31	2031/32 TO 2050/51
Tower Road development		\$400,000			
Eldonwood south development	\$100,000				
Matipo Street stormwater pond			\$200,000		

There are also projects planned to increase the **RESILIENCE** to our current network and supply. Some of these key ones are as following:

PROJECT NAME	2021/22	2022/23	2023/24	2024/25 TO 2030/31	2031/32 TO 2050/51
Upgrade of existing network by installing soakage or detention	\$100,000	\$200,000	\$100,000	\$700,000	\$2,000,000

## STORMWATER TOTAL COST DEPRECIATION/RENEWAL



Business as usual projects are mainly our plant and reticulation **RENEWALS**.

Only minimal replacement of stormwater pipes is expected over the next 30 years. There is a spike in 45 years' time which is due to the assumed date of installation of about 50% of the pipes and it is anticipated that condition rating these pipes closer to this date will spread the actual replacement dates and cost.

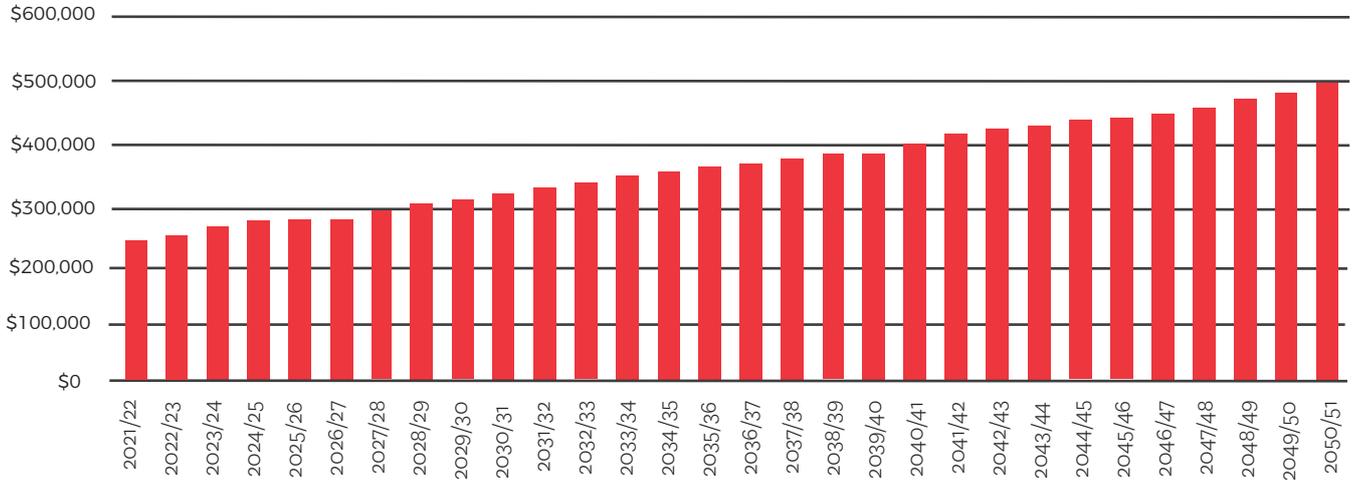
The peaks in the renewal profile are the replacement of the majority of our Matamata pipes in 2047 and Te Aroha in 2052. There have been no issues with the pipe condition to date. It is planned to complete some assessment of these to assess their condition and to verify the asset age. There is also a pump replacement that is scheduled in 2021.

The key renewal going forward are the discharge consents which expire in 2023/24. These will require a lot of planning and investigation work to have all the information ready for a renewal and will include some allowance for legislative changes (i.e. change or increase in standards).

With the high number of retention ponds and other structures being vested in Council as our asset, these will have an impact on renewals but they will be near the end and outside of the term of this strategy from 2050.

## Operating Expenditure

### STORMWATER OPERATING COSTS



It is assumed that the operating costs for the stormwater assets will increase as there are additional stormwater retention and detention ponds resulting from subdivisions which need to be maintained, and also inflation. Our assumption is that our levels of service will not change however we are completing some improvements to our network as we are aware that climate change will increase the number and intensity of flooding in the future. This will also require an increase in operating responses to manage any flooding events.

### Asset Condition

The stormwater infrastructure assets’ condition and reliability of data are described in the Stormwater Asset Management Plan 2021-51. We are unsure of the materials of 17% of assets, which makes up about 21 kilometres of the piped network. These pipes have been given the same life as the shortest life pipe material so that the renewal funding is not at risk in this area. Our overall forecast confidence for the stormwater infrastructure is fairly accurate (confidence rating B).

## Roads and Footpaths

### Background

Our transport network consists of 948km of sealed roads and 60km of unsealed roads. It also includes 350 bridges, street lights, road markings and signs and road drainage assets.

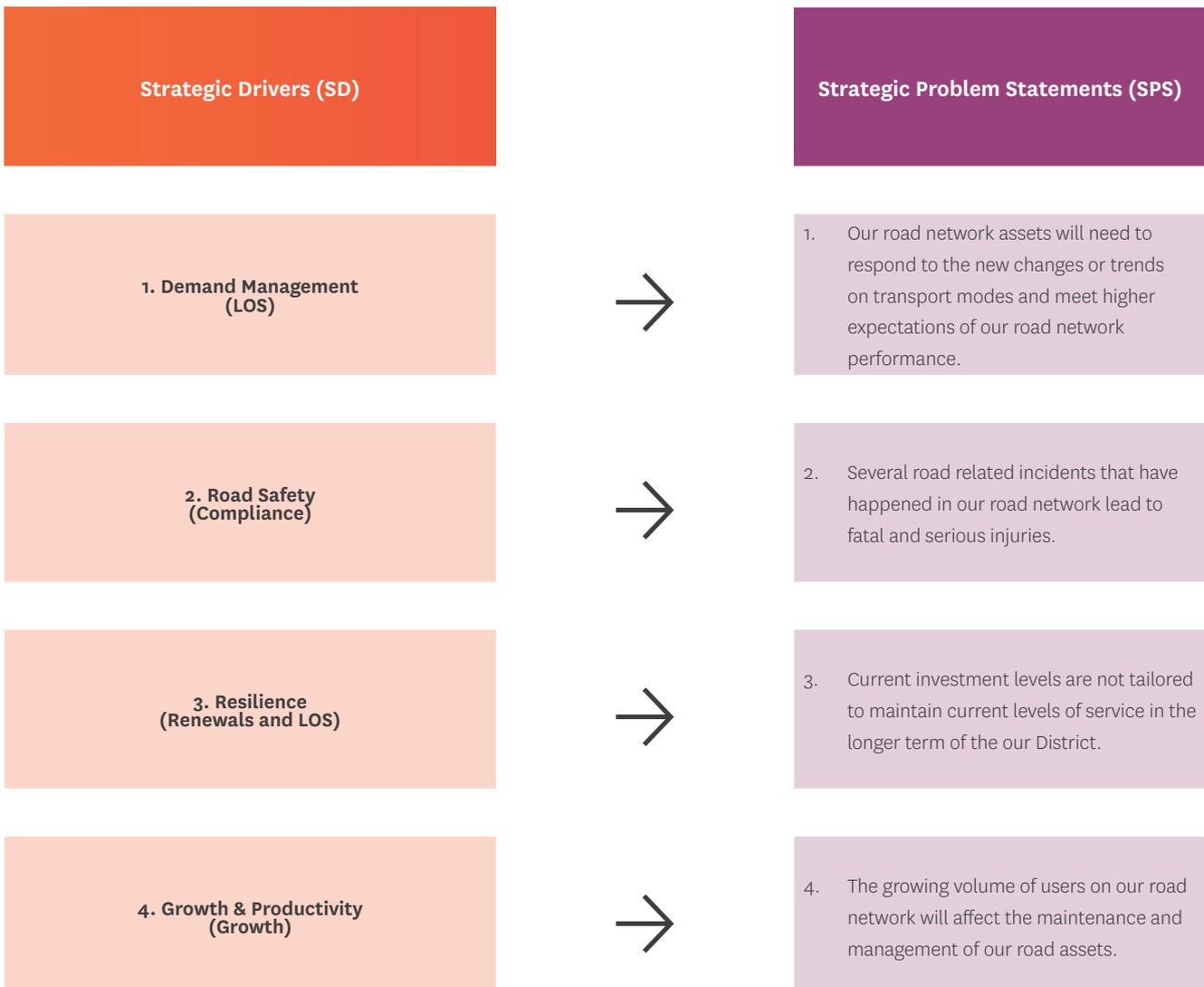
Roads provide for a wide variety of users with diverse needs, including private and commercial car drivers and passengers, freight operators, dairy tankers, stock trucks, quarry trucks/machinery, public transport, harvesting contractors/farm machinery, cyclists and pedestrians. They also support and enable economic growth and, when designed appropriately, enhance living environments and amenity. In addition to providing access to properties, the road corridor is also where utilities are usually located (e.g. gas, power, telecommunications, water, sewer and stormwater). Our key levels of service for the roads and footpaths assets are described in Section 6.

### Context

There are a number of national, regional and local drivers and visions that it aims to achieve. The Government Policy Statement outlines four strategic priorities which it bases its national funding on:

- Safety,
- Better Transport Options,
- Improving Freight Connections
- and Climate Change.

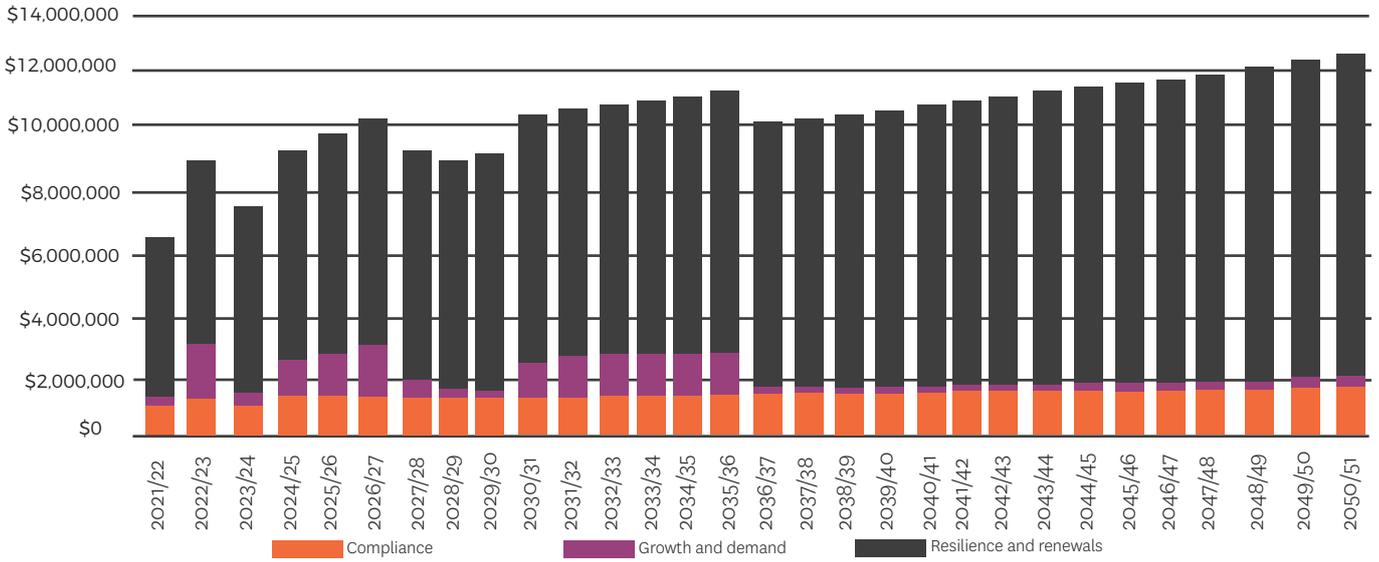
### Strategic Overview



Overall we are not planning to increase the direct level of service for this activity.

## Capital and Renewal Expenditure

ROADS AND FOOTPATH PROJECT BUDGETS BY STRATEGIC DRIVERS VS FINANCIAL YEAR



Our forecast budgets include funding for an improvement on road safety within the District. **COMPLIANCE (Road Safety)**.

Some of the key ones are as following:

PROJECT NAME	2021/22	2022/23	2023/24	2024/25 TO 2030/31	2031/32 TO 2050/51
Widening of existing footpaths within our towns to create shared pathways to allow for safe cycling and pedestrian movements  (Low Cost Low Risk)	\$50,000	\$50,000	\$50,000	\$350,000	\$1,000,000
School safety - speed activated signs and some other general safety work (Low Cost Low Risk)	\$50,000	\$50,000	\$50,000	\$350,000	\$1,000,000
Safety management programme - safety improvements on high risk, high route roads prioritised across the District  (Low Cost Low Risk- Road to Zero)	\$480,000	\$505,000	\$458,500	\$3,437,000	\$9,820,000
Speed management implementation - for the implementation of speed changes and infrastructure that supports this  (Low Cost Low Risk)	\$23,000	\$39,600	\$83,305	\$630,000	\$1,800,000

Our improvements also include upgrade works to ensure the zoning in our District Plan can be developed and there is adequate capacity within our transport network to cater for the additional vehicles and also providing for pedestrian and cycling links and connections. Some **GROWTH AND DEMAND** projects include:

PROJECT NAME	2021/22	2022/23	2023/24	2024/25 TO 2030/31	2031/32 TO 2050/51
Tower Road Structure Plan parking bays and intersection improvements in Matamata		\$300,000			
Haig Road upgrade		\$335,000			
Hinuera to Station and Station to Peria Road additional widening		\$100,000	\$100,000	\$300,000	
New kerb and channel District wide	\$55,000	\$55,000	\$55,000	\$385,000	\$1,100,000
New footpath District wide	\$55,000	\$55,000	\$55,000	\$385,000	\$1,100,000
Station Road 1 upgrade		\$730,000			
Station Road 2 upgrade				\$300,000	
New streetlights District Wide	\$110,000	\$110,000	\$110,000	\$770,000	\$2,200,000
Four new bus shelters	\$35,000	\$35,000			
Waharoa - Matamata walkway				\$700,000	

After the suitability and traffic modelling was completed for the Matamata Bypass, the construction has been omitted from the 30 year strategy. The old designation was not suitable and the traffic volumes did not support the investment.

Some projects have capital funding included in the 30 year life of the strategy but are subject to completing a business case first so that a more informed decision and accurate funding can be provided. Projects include:

PROJECT NAME	2021/22	2022/23	2023/24	2024/25 TO 2030/31	2031/32 TO 2050/51
Morrinsville to Te Aroha Cycleway					\$5,000,000

There are no projects identified that are linked directly to **RESILIENCE** but when renewal of existing pavements are completed, resilience is considered within the scope of the works and include additional drainage required to improve current situations, raising pavement levels and upgrading or improving drainage.

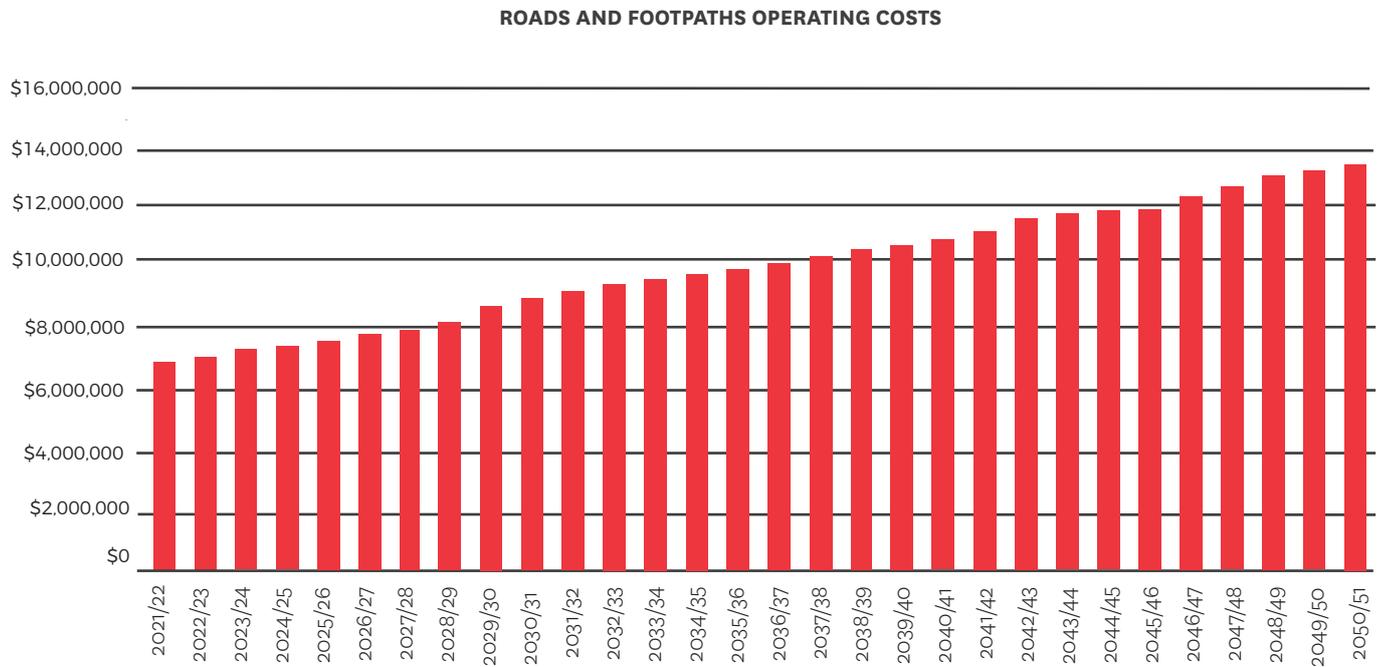
**ROADS AND FOOTPATHS RENEWAL COST**



Business as usual projects are our pavement, signage, marking, drainage and footpath RENEWALS. Modelling has been completed that has identified the most economical and sustainable renewal strategy for our pavements. Pavements make up 80% of the renewal costs so are critical to the long term management and funding implications.

The modelling has indicated that in order to maximise investment and get the best long term outcomes, resurfacing treatments should be reduced and pavement rehabilitation works should be increased.

## Operating Expenditure



Overall there is only a slight increase in operating cost in the Roads and Footpaths assets. Some of the changes are as following:

- LED streetlights have reduced the operating and power costs.
- The addition of signage and markings for road safety purposes has increased the operating costs slightly. This includes the additional maintenance requirements for electronic speed or safety signs that have been installed over recent years.
- Drainage has increased as there are now additional water treatment devices for the road water which have been vested in Council and that we are now required to maintain. These include rain gardens, other treatment devices and additional soakage systems and structures.

## Asset Condition

The roads and footpaths infrastructure assets' condition and reliability of data are described in the Roading Asset Management Plan 2021-51. The current asset condition of our roads (both sealed and unsealed) is acceptable by national standards and maintenance and renewal programmes are conducted in accordance with national standards. Our forecast confidence level is fairly accurate (confidence Level B)

The pavement of most of the roads is known and the life can be predicted reasonably accurately, but where soil conditions (such as peat) are a factor, the useful life or assets can be very unpredictable. The other varying factor is some of the traffic growth, specifically the increase in heavy vehicles on our roads. Both of these factors are managed by ensuring that road conditions are monitored and continuous and most optimised traffic counting is completed throughout the District. An increase in data collection on our network has meant we are able to complete better modelling on our surfacing and pavement renewal requirements.

We currently have identified some of our key roads as critical assets based on accessibility and previous lifelines mapping. We have a list of critical structures. This is currently being reviewed to ensure the criteria are still relevant.

## Parks and Open Spaces and Community Facilities and Property

### Background

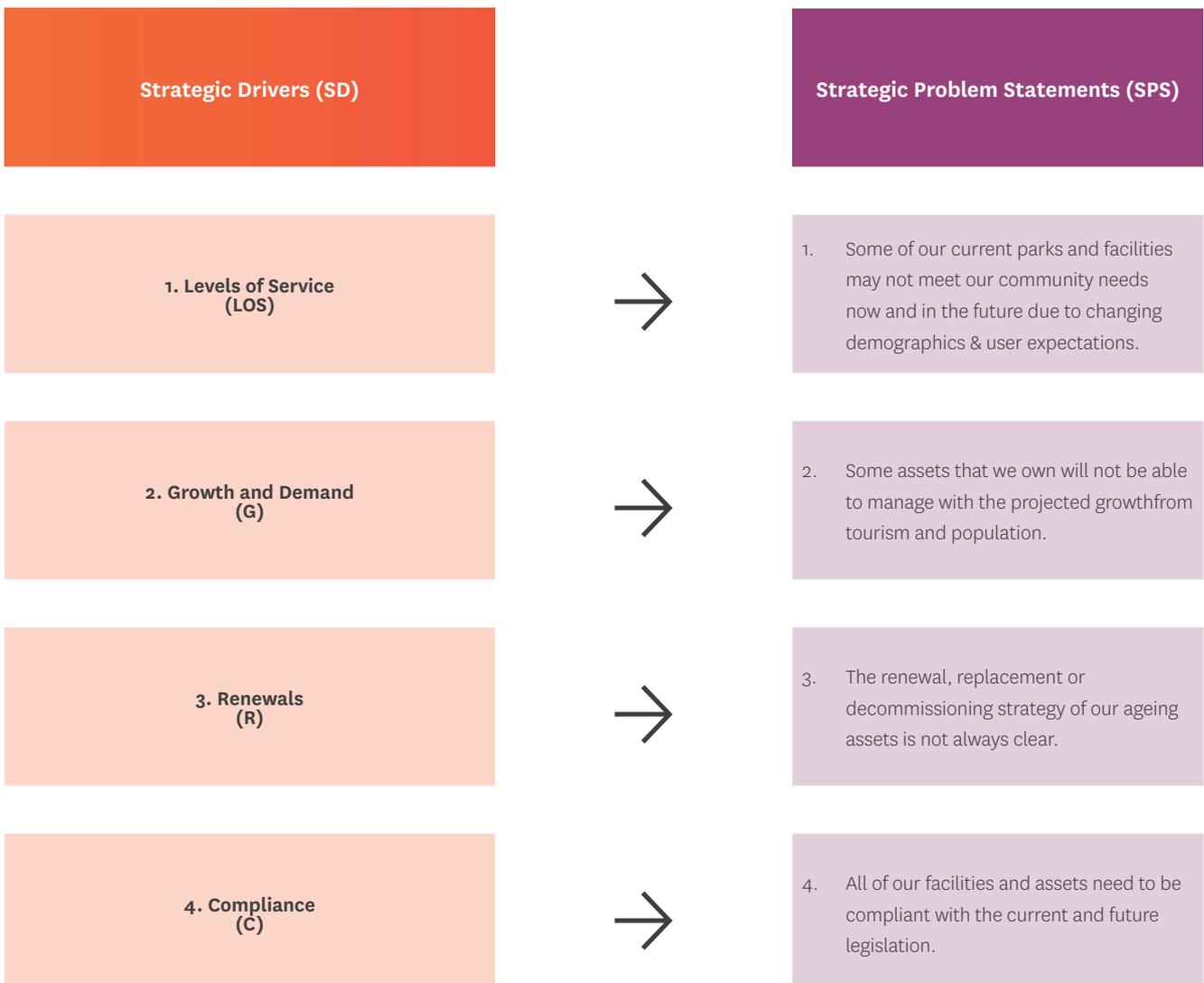
Parks and Open Spaces and Community Facilities and Property is about providing facilities for play, sport, recreation, cultural, and social activities, affordable housing for elderly people, and buildings and facilities that enable us to provide a range of services to the community. Our key levels of service for the Community Facilities and Property assets are described in Section 6.

### Context

Council owns and administers buildings and land across the District. Many of the buildings are more than 50 years old, and will reach their end of useful life in the next 30 years. As these assets come to the end of life we will review the demand and requirement for the assets, and decide whether to replace, repurpose or demolish the buildings. Any decision relating to our strategic assets will be subject to community consultation in line with our Significance and Engagement Policy.

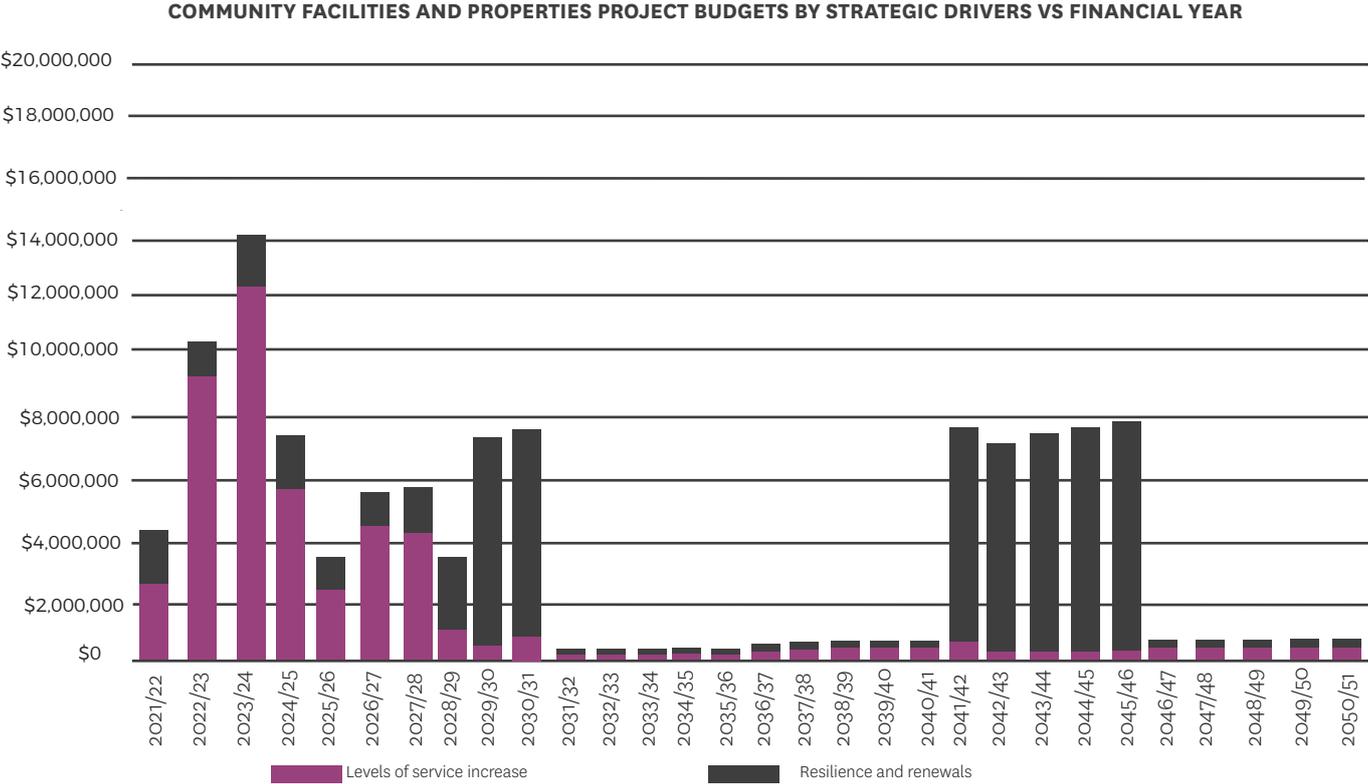
Any major structural work to buildings may require additional earthquake strengthening in line with the requirements of the Building Act and Building Regulations. Regulations require that, prior to the demolition of older buildings, an assessment must be made to consider whether there is likely to be asbestos within the structure and if so how to handle and dispose of it appropriately. These considerations have been included in cost estimates for the purpose of this Strategy.

### Strategic Overview



Overall we are not planning to increase the direct level of service for this activity.

### Capital and Renewal Expenditure



For Community Facilities and Properties there are no capital projects directly linked to **COMPLIANCE**. Generally, if there are any asbestos or earthquake issues with particular buildings then renewal funding is used to renew the building or aspects of the building.

Our improvements also include upgrade works or the vesting and/or development of new assets to ensure the additional population that we have provided zoning for in our District Plan meets our strategic policies and objective. These are mainly based on our Parks and Open Spaces Strategy, Regional Sports Facilities Plan, District Sports Facilities Action Plan and Sanitary Services Assessment.

These are the **GROWTH** projects, and there are also projects which relate more to customer expectation and **DEMAND**. Some of the key projects in the strategy include:

PROJECT NAME	2021/22	2022/23	2023/24	2024/25 TO 2030/31	2031/32 TO 2050/51
Development of spas - physical works	\$2,00,000	\$7,000,000	\$8,381,000		
Morrinsville Civic Centre					\$6,500,000
Town centre revitalisations		\$600,000		\$2,500,000	
Destination playgrounds				\$3,000,000	
Toilet upgrades (various)	\$100,000	\$100,000	\$100,000	\$700,000	\$2,000,000
Increased indoor sports courts for Matamata			\$2,000,000		
Matamata linkage walk ways				\$775,000	\$500,000
Morrinsville Recreation Ground development		\$250,000		\$1,000,000	
Morrinsville linkage walk ways				\$590,000	\$500,000
Te Aroha linkage walk ways				\$345,000	\$250,000
Morrinsville playgrounds			\$300,000		
Matamata playgrounds		\$100,000	\$200,000		
Provision of more playgrounds				\$240,000	
Morrinsville CBD toilets		\$120,000			

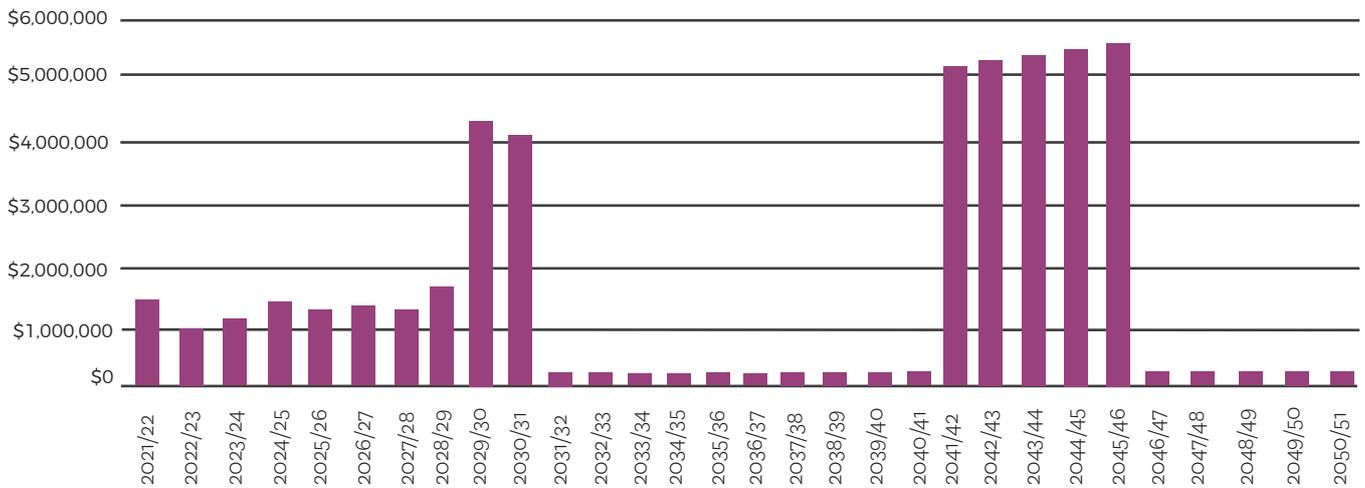
The activity contributes to community resilience by providing public health benefits through additional parks and open spaces. Some of our facilities and buildings provide facilities for emergency response purposes. However, there are no capital projects proposed where **RESILIENCE** is the main driver.

Some Projects have capital funding included in the 30 year life of the strategy but are subject to completing a business case first so that a more informed decision and accurate funding can be provided. Projects include:

PROJECT NAME	2021/22	2022/23	2023/24	2024/25 TO 2030/31	2031/32 TO 2050/51
Morrinsville pool development				\$10,000,000	

Te Aroha civic facilities \$4,000,000

### PARKS AND OPEN SPACES AND COMMUNITY FACILITIES AND BUILDINGS RENEWAL

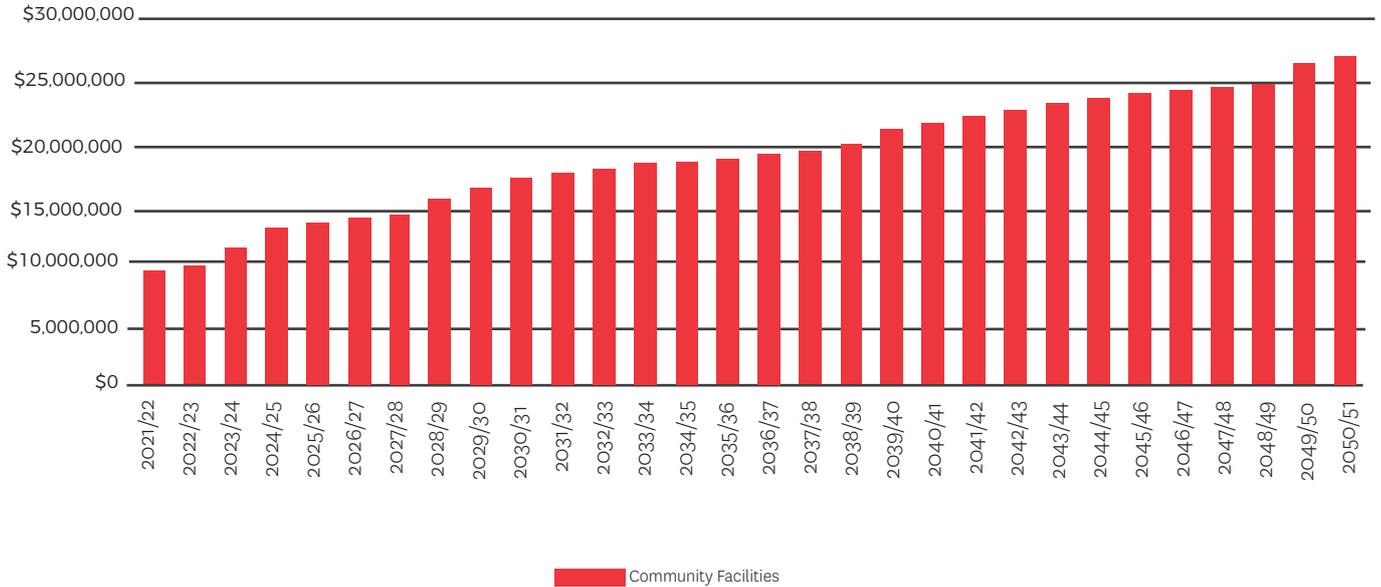


Business as usual projects are mainly our building, playground, tracks and structure **RENEWALS**. We plan to smooth the playground, track and structure renewals to ensure the programme is sustainable and manageable. We undertake regular monitoring and condition assessments for some of our assets to inform the prioritisation of work and minimise the potential risk of failure.

Council has adopted an approach for buildings where the need for major renewals are assessed against the use of the building, the associated costs and benefits, and its strategic purpose. A building with very limited use, high replacement cost and having no future use identified will not be renewed. Some allowance has been made in the building maintenance budgets for disposal and/or demolition of such buildings.

## Operating Expenditure

### PARKS AND OPEN SPACES AND COMMUNITY FACILITIES AND BUILDINGS OPERATING COSTS



Council in the past has maintained or even reduced the level of service and it is now looking to maintain or slightly improve the levels of service. The increase is related to additional maintenance on some of our existing tracks and walkways. The focus is also ensuring the central business District is maintained to a higher standard. The Open Spaces Strategy has identified a hierarchy of level of service associate with specific park categories or asset classes.

Additional vested assets also increase the long term maintenance trend as they require maintenance from the time they are vested unlike some other infrastructure assets that take some time to require any maintenance. Also additional assets like the Wairere Carpark, Silver Fern Farms Events Centre and Wairere Toilets also add to the existing maintenance budget. Inflation has also been included.

## Asset Condition

The Community Facilities and Property infrastructure assets’ condition and reliability of data are described in the Community Facilities and Buildings Asset Management Plan 2021-51 and the Parks and Open Spaces Asset Management Plan 2021-51.