Auckland Transport
An Auckland Council Organisation

Technical note

Investment Logic Map

in support of the Cycling and Micromobility Programme Business Case

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Contents

1 Introduction

The purpose of this document is to outline the Cycling and Micromobility Programme Business Case (CAM-PBC) investment logic map (ILM) including problems, benefits, key performance indicators (KPIs) and investment objectives (IOs), and the reasons for changes made compared to the 2017 ILM.

2 Problems

Table 1 summarises the changes to the problem statements since 2017 and the reason for those changes.

Table 1 Changes to the problem statements since 2017

Problems (2017)	Revised Problems (2021)	Reason for change
Problem 3: The current transport system often fails to meet the needs of people using bikes, resulting in them being over-represented in deaths and serious injuries (30%)	Problem 1: Auckland's transport system[1] is failing to protect people using bikes and micromobility devices, resulting in high exposure to risk and over-representation in deaths and serious injuries (30%)	Updated to reflect Vision Zero terminology and acknowledge exposure to risk (not just incidents that have occurred). Added reference to micromobility throughout the ILM to align with Future Connect's Cycle and Micromobility Strategic Network.
Problem 1: Cycling is perceived as unsafe and unattractive, resulting in it not effectively contributing to Auckland's transport system (45%)	Problem 2: People find cycling and micromobility unsafe and unattractive, resulting in these modes not fulfilling their potential to contribute to Auckland's transport system (30%)	Updated to acknowledge existing potential for cycling and micromobility to contribute more to the transport system. Lower weighting to compensate for Problem Statement 3 and 4.
Problem 2: Relatively low levels of cycling and high dependence on private vehicles results in poor environmental, place and health outcomes (25%)	Problem 3: Relatively low levels of cycling and micromobility and high dependence on private vehicles result in poor environmental, place, social and health outcomes, including the risk that we will not meet the goals of Te Tāruke-ā-Tāwhiri: Auckland's Climate Plan (30%)	Updated to include social outcomes (i.e. equity) and make an explicit reference to the goals of Te Tāruke-ā-Tāwhiri: Auckland's Climate Plan. Higher weighting to place greater emphasis on the pathway outlined in Te Tāruke-ā-Tāwhiri.
N/A	Problem 4: Current cycling delivery mechanisms and resistance towards reallocating road space to cycling infrastructure are resulting in cost escalations, delays in delivery, and facilities that do not always meet customer expectations (10%)	Added a new problem statement to acknowledge the causes and effects of current cycle delivery challenges. Ensures all alternatives and options are assessed with delivery challenges in mind.

[1] The Transport System, as it relates to this Problem Statement, includes any road, path, or cycling facility that people can ride a bike or micromobility device on.

3 Benefits

Table 2 summarises the changes to the benefit statements since 2017 and the reason for those changes.

Table 2 Changes to the benefit statements since 2017

Benefits (2017)	Revised Benefits (2021)	Reason for change
Increased safety for people using bikes (30%)	Impact on social cost of deaths and serious injuries (DSIs) (30%)	Updated to align with the Waka Kotahi Benefits Framework (1.1).
Cycling plays a greater role in meeting Aucklander's transport needs (30%)	Impact on mode choice (10%)	Updated to align with the Waka Kotahi Benefits Framework (10.2).
	Impact on perceptions of safety and security (10%)	Updated to align with the Waka Kotahi Benefits Framework (2.1).
Improved access to opportunities, particularly for people with low levels of transport choice (20%)	Impact on access to opportunities (10%)	Updated to align with the Waka Kotahi Benefits Framework (10.3).
Improved environmental, place and health outcomes (20%)	Impact on greenhouse gas emissions (10%)	Updated to align with the Waka Kotahi Benefits Framework (8.1).
	Impact on physical and mental health (10%)	Updated to align with the Waka Kotahi Benefits Framework (3.1).
	Impact on townscape (10%)	Updated to align with the Waka Kotahi Benefits Framework (11.3).
N/A	Impact on delivery of safe cycle facilities (10%)	Added a new benefit to acknowledge impact on delivery of safe cycle facilities.

As shown in Table 2, new benefits have been included, resulting in subsequent changes to the original benefit weightings.

4 Investment objectives

Table 3 summarises the changes to the investment objectives (IOs) since 2017 and the reason for those changes.

Table 3 Changes to the investment objectives since 2017

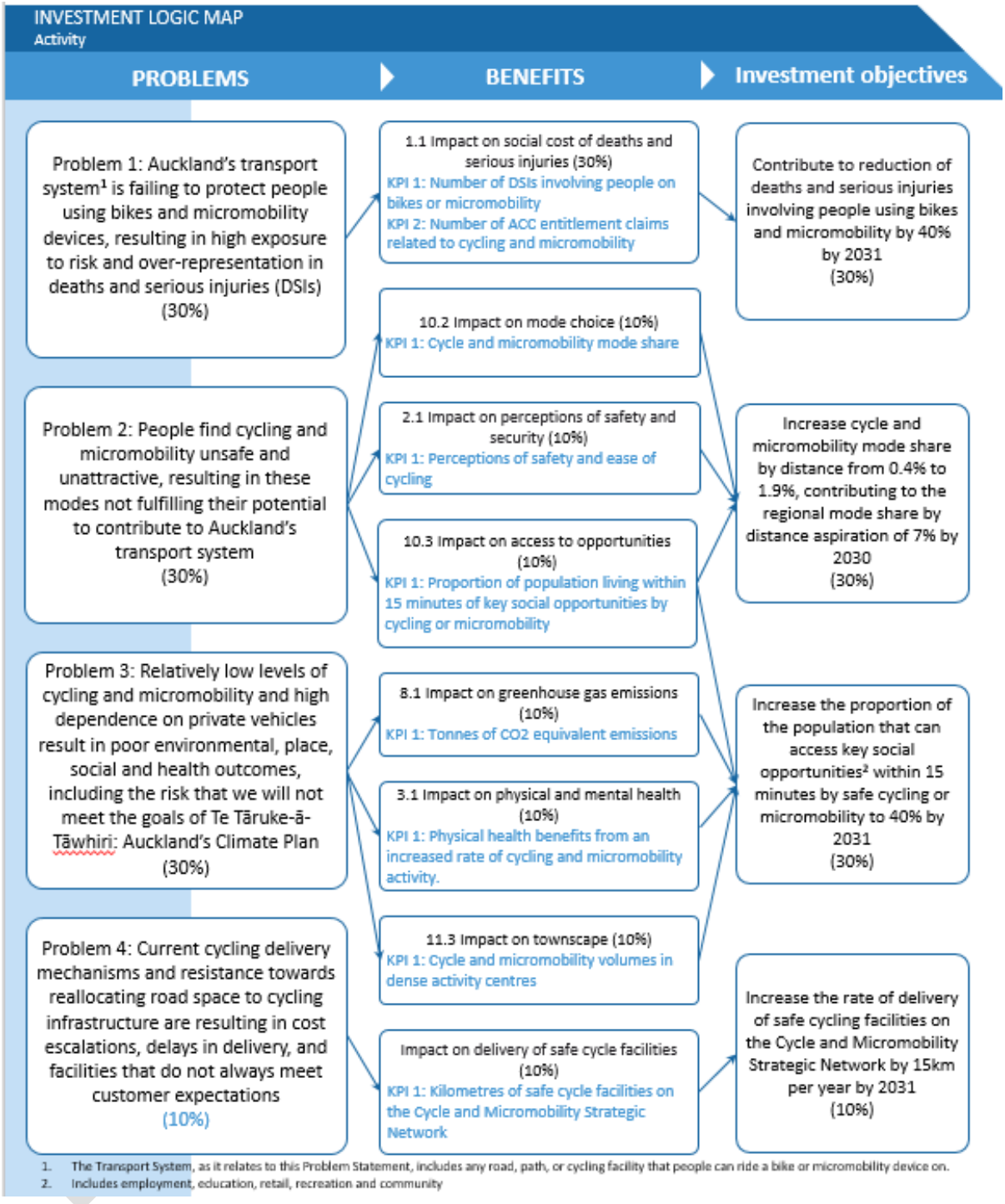
IOs (2017)	Revised IOs (2021)	Reason for change
Reduce deaths and serious injuries involving people using bikes by 20% by 2028 (30%)	Contribute to a reduction of deaths and serious injuries involving people using bikes and micromobility devices by 40% by 2031 (30%)	Have aligned with the target set in Road to Zero.
Triple cycle mode share from 1% to 3% of total journey to work/education trips by 2028 (30%)	Increase cycle mode share by distance from 0.4% to 1.9%, contributing to the regional mode share by distance aspiration of 7% by 2030[2] (30%)	Have aligned with the cycle mode share by distance goal identified Te Tāruke-ā-Tāwhiri: Auckland's Climate Plan.
Triple jobs and education opportunities accessible by short cycle trips for people with low levels of transport choices by 2028 (20%)	Increase the proportion of the population that can access opportunities within 15 minutes by safe cycling or micromobility to 40% by 2031 (30%)	Have aligned with the Benefits Framework (5.2.6).
N/A	Increase rate of delivery of safe cycling facilities on the Cycle and Micromobility Strategic Network by 15km per year by 2031 (10%)	Have added a new investment objective related to the delivery of safe cycle facilities.

As shown in Table 3, a new investment objective has been included, resulting in further changes to the original investment objective weightings.

5 Investment Logic Map

The final investment logic map, which details the problems, benefits, KPIs and investment objectives are shown below.

[2] 7% mode shift cannot be achieved through the CAM PBC alone. The CAM PBC is expected to contribute to this 7% mode shift together with other projects and policy changes.


INVESTMENT LOGIC MAP
Activity
PROBLEMS
BENEFITS
Investment objectives
Problem 1: Auckland's transport system[1] is failing to protect people using bikes and micromobility devices, resulting in high exposure to risk and over-representation in deaths and serious injuries (DSIs) (30%)
Problem 2: People find cycling and micromobility unsafe and unattractive, resulting in these modes not fulfilling their potential to contribute to Auckland's transport system (30%)
Problem 3: Relatively low levels of cycling and micromobility and high dependence on private vehicles result in poor environmental, place, social and health outcomes, including the risk that we will not meet the goals of Te Tāruke-ā-Tāwhiri: Auckland's Climate Plan (30%)
Problem 4: Current cycling delivery mechanisms and resistance towards reallocating road space to cycling infrastructure are resulting in cost escalations, delays in delivery, and facilities that do not always meet customer expectations (10%)
1.1 Impact on social cost of deaths and serious injuries (30%)
KPI 1: Number of DSIs involving people on bikes or micromobility
KPI 2: Number of ACC entitlement claims related to cycling and micromobility
10.2 Impact on mode choice (10%)
KPI 1: Cycle and micromobility mode share
2.1 Impact on perceptions of safety and security (10%)
KPI 1: Perceptions of safety and ease of cycling
10.3 Impact on access to opportunities (10%)
KPI 1: Proportion of population living within 15 minutes of key social opportunities by cycling or micromobility
8.1 Impact on greenhouse gas emissions (10%)
KPI 1: Tonnes of CO2 equivalent emissions
3.1 Impact on physical and mental health (10%)
KPI 1: Physical health benefits from an increased rate of cycling and micromobility activity.
11.3 Impact on townscape (10%)
KPI 1: Cycle and micromobility volumes in dense activity centres
Impact on delivery of safe cycle facilities (10%)
KPI 1: Kilometres of safe cycle facilities on the Cycle and Micromobility Strategic Network
Contribute to reduction of deaths and serious injuries involving people using bikes and micromobility by 40% by 2031 (30%)
Increase cycle and micromobility mode share by distance from 0.4% to 1.9%, contributing to the regional mode share by distance aspiration of 7% by 2030 (30%)
Increase the proportion of the population that can access key social opportunities[2] within 15 minutes by safe cycling or micromobility to 40% by 2031 (30%)
Increase the rate of delivery of safe cycling facilities on the Cycle and Micromobility Strategic Network by 15km per year by 2031 (10%)
1. The Transport System, as it relates to this Problem Statement, includes any road, path, or cycling facility that people can ride a bike or micromobility device on.
2. Includes employment, education, retail, recreation and community