South Dunedin Future Programme

Council Presentation: 3 Proposed Adaptation Futures (10 June 2026)

South Dunedin Future Programme

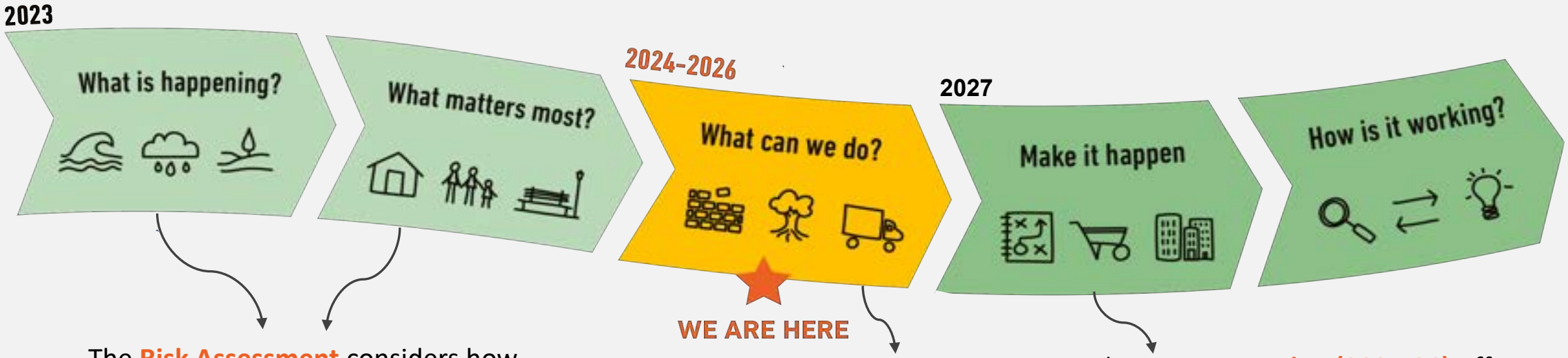
Councillor Presentation / Workshop - Agenda

1. South Dunedin Future Programme - Overview
2. South Dunedin - History, hazards, risks and climate impacts
3. Shortlisting from 7 potential Adaptation Futures
4. 3 Proposed Adaptation Futures
5. Reports to Councils
6. Planned communications and community engagement
7. Final stage of SDF programme and transition to implementation
8. Q and A
9. Links to previous SDF Council reporting

South Dunedin Future Programme

South Dunedin Future – Background and Overview

- Impact of climate change on South Dunedin has been studied by the DCC and ORC since the late 2000s.
- In 2021, Councils establish a joint initiative to develop a climate adaptation plan for South Dunedin.
- The vision for the SDF programme is: *"A **safer and better** South Dunedin, where sustainable urban regeneration leads to improved community resilience and wellbeing"*.*



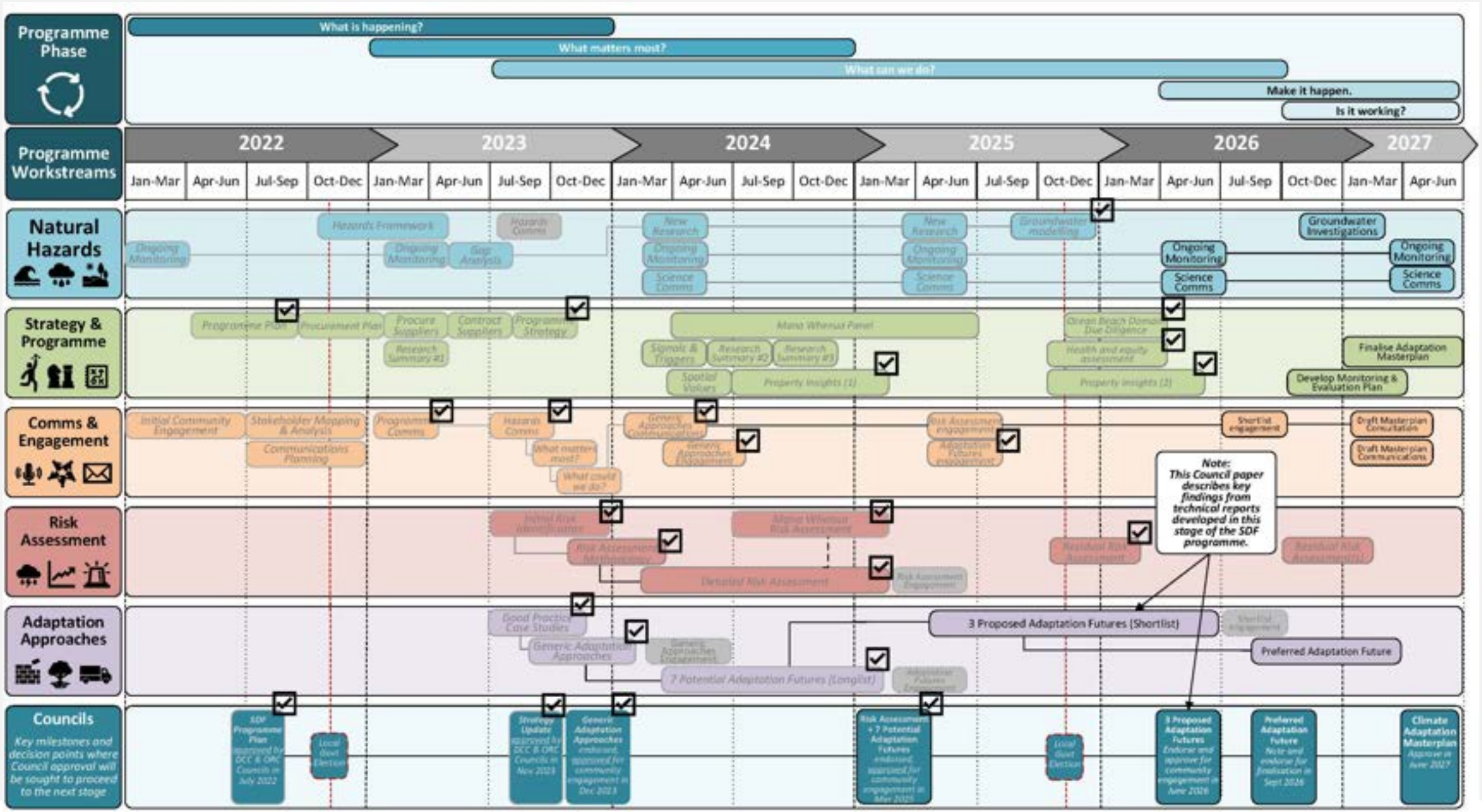
The **Risk Assessment** considers how changing natural hazards will impact on buildings, infrastructure, and communities in South Dunedin.

The **Adaptation Futures** explore different ways to manage and mitigate the risks facing South Dunedin.

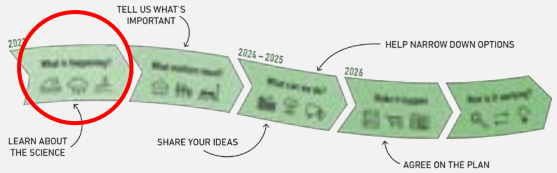
The **Long Term Plan (2027-36)** offers the best opportunity to start delivery of the Climate Adaptation Masterplan for South Dunedin.

*** The full SDF programme strategy can be accessed here.**

South Dunedin Future Programme



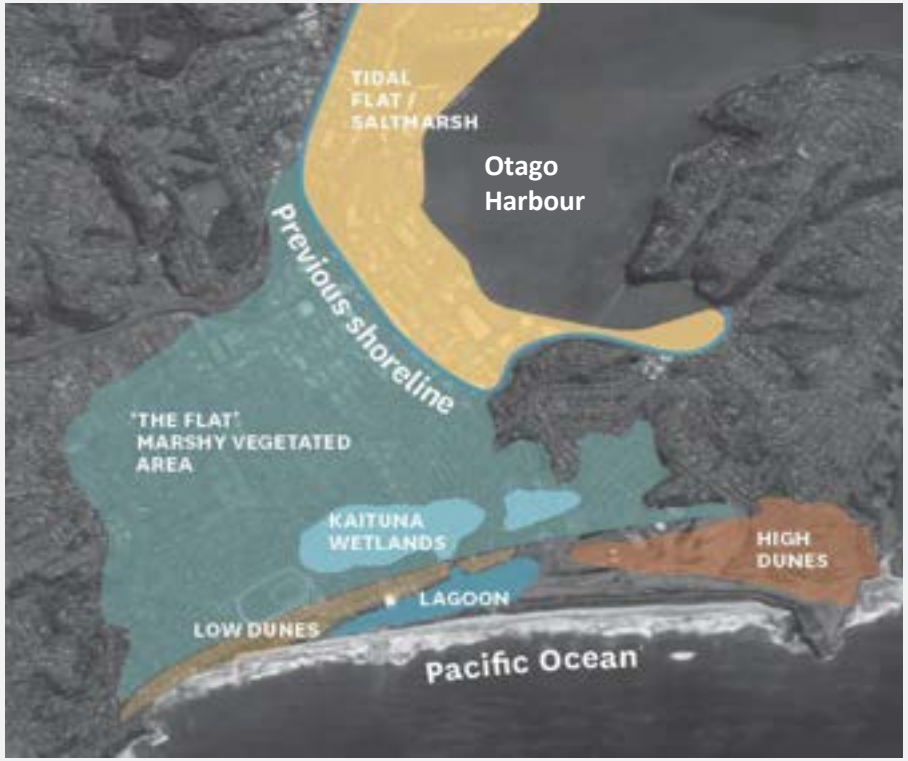
South Dunedin Future Programme



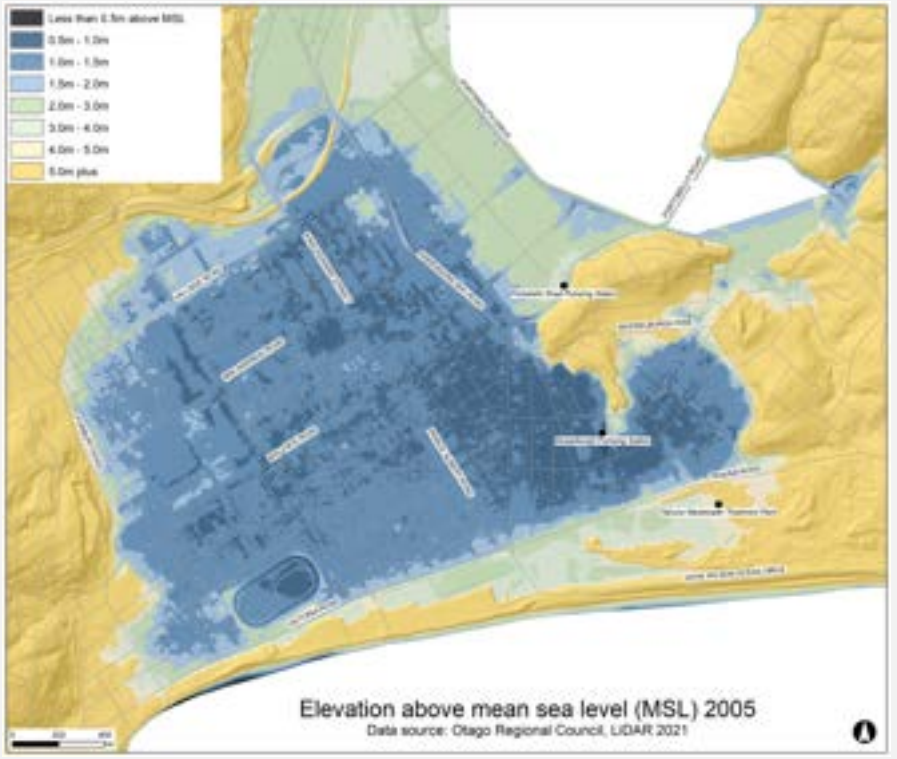
Why are councils undertaking this work?

- South Dunedin is a ***complex, multi-hazard environment***, linked to its location on a low-lying flat, at the bottom of a large water catchment, adjacent to the harbour and ocean.
- This ***area has been highly modified*** over the past 180 years, turning marshy vegetated wetlands into a densely populated urban environment and basin with no natural outflow for water.

Overlay of South Dunedin geography circa 1850

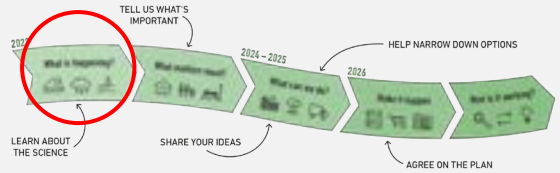


The geography of South Dunedin at present day



South Dunedin Future Programme

Why are councils undertaking this work?

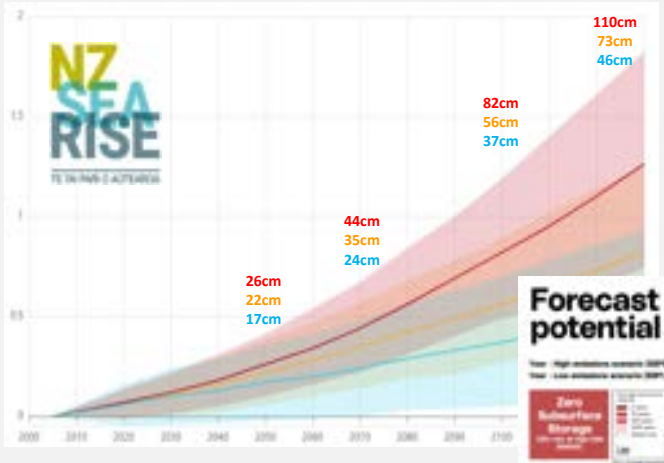


- There is a ***history for flooding*** in South Dunedin, with records stretching back to the 1920s. A significant flood event in 2015 was the genesis for South Dunedin Future. The last significant flood was in 2024.
- **Flood risk is expected to increase** over time linked to rising sea levels, rising groundwater, and more intense rainfall. This is compounded by ageing infrastructure, increasing impermeable surfaces, and ongoing urban development.

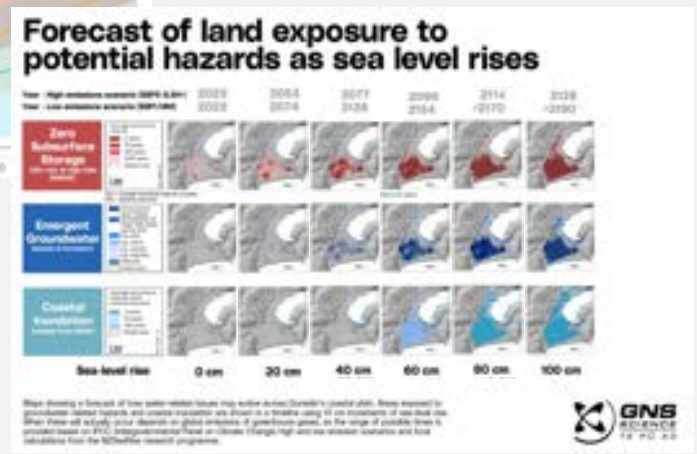
April 1923

June 2015

October 2024



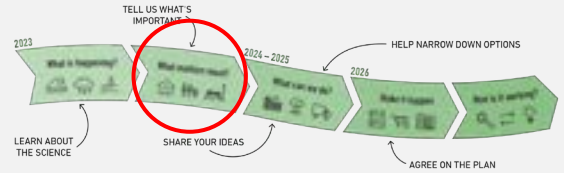
Source: The NZ SeaRise Project, link).



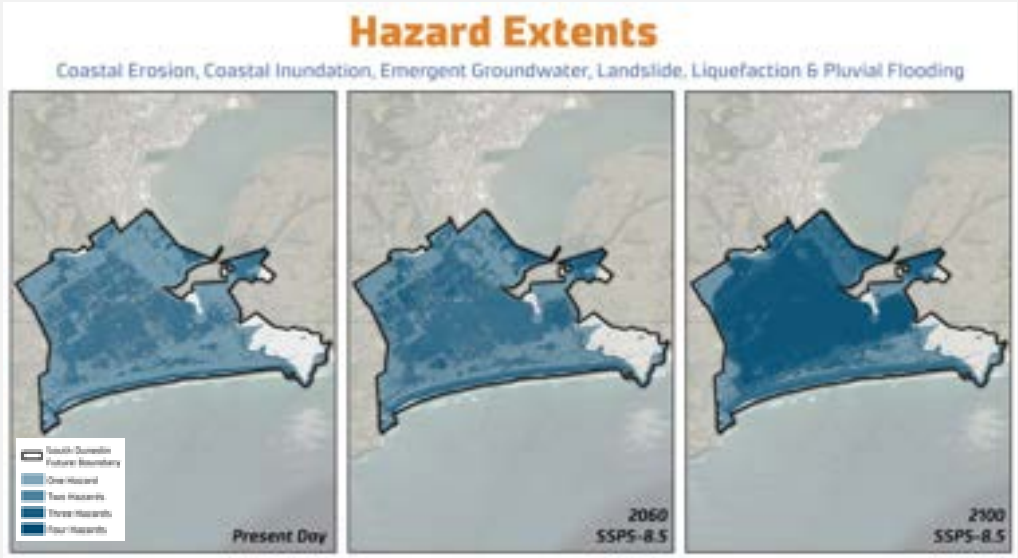
Source: Dunedin groundwater; Cox, S. et al. (2023) (link)

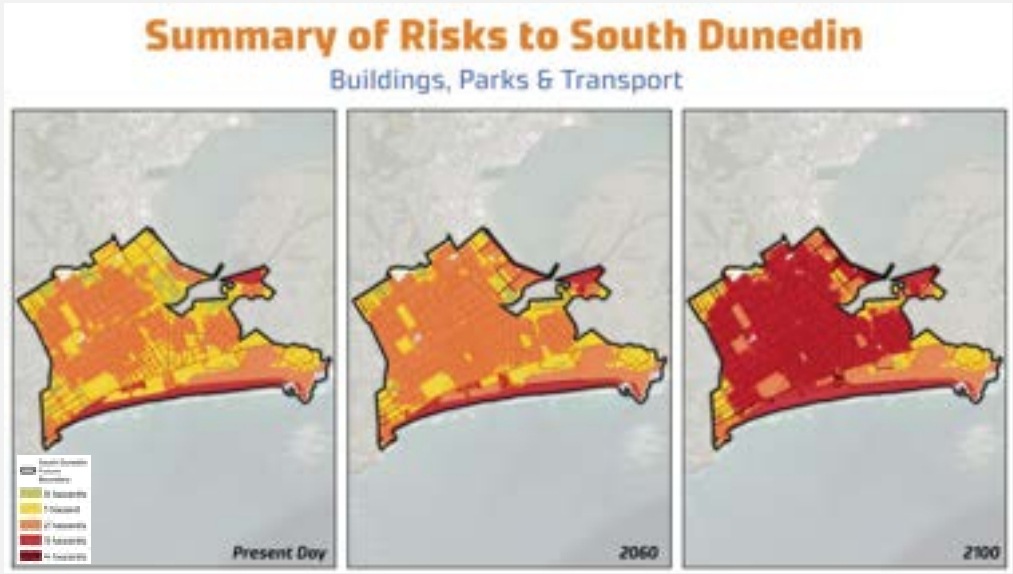
South Dunedin Future Programme

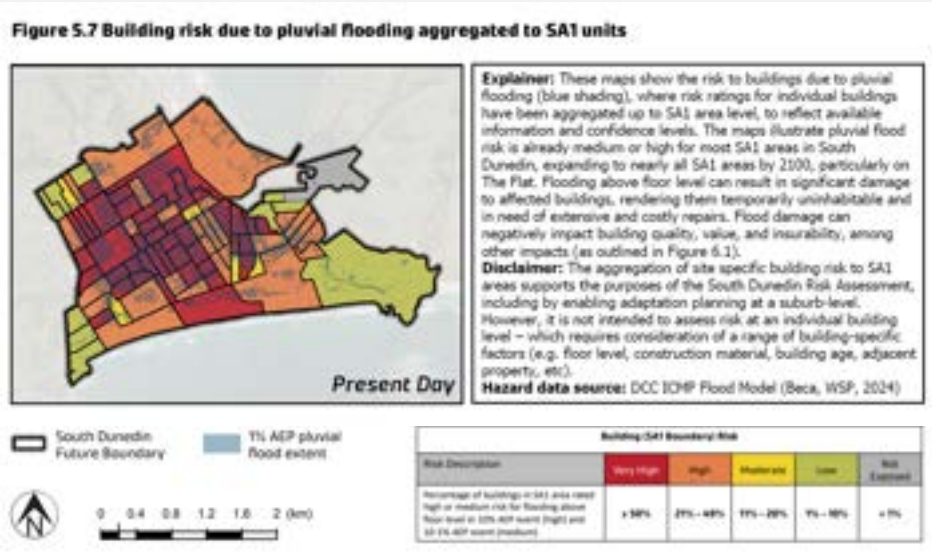
Overview of South Dunedin Risk Assessment.

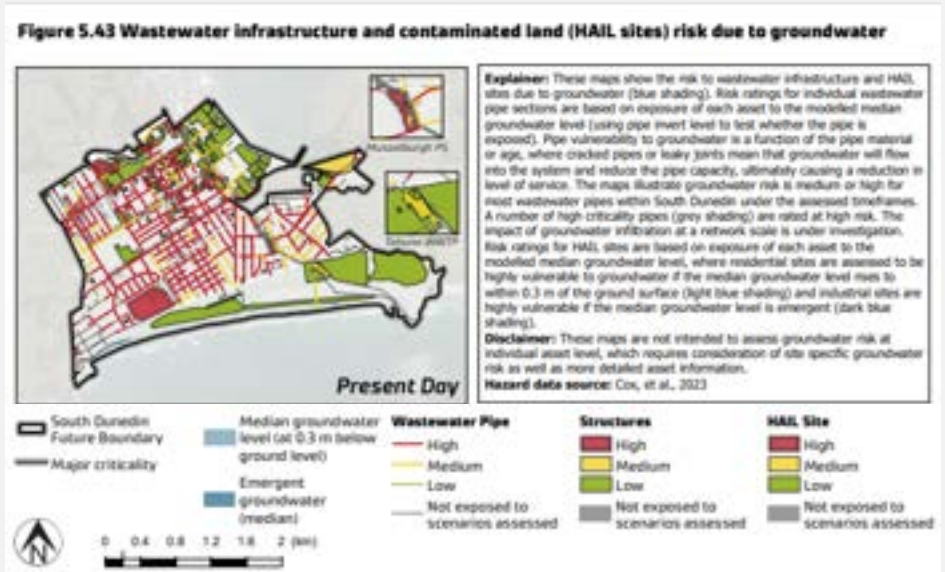


- South Dunedin is a ***complex multi-hazard environment***. Many hazards will increase with the impacts of climate change.
- South Dunedin is also a ***high-risk environment***, with increasing hazards expected to materially increase risk to buildings, infrastructure, and communities.
- ***Risks are interlinked and cascading,*** depending on location, hazard, and element.









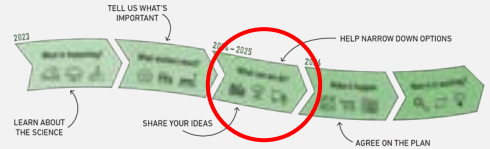
South Dunedin Future Programme

Shortlisting from 7 to 3 Futures

- Shortlisting from 7 potential to 3 proposed adaptation futures
- Community feedback and technical assessments
- Selecting and finetuning the shortlist

South Dunedin Future Programme

7 Potential Adaptation Futures (Overview)



Present day

1 *– Status quo*

2 *Keep land dry – pipes + pumps*

3 *Keep land dry – elevating land and pumping water*

Keep doing what we're doing

Building infrastructure to keep water out

4 *Space for water – waterways + wetlands*

5 *Space for water – waterways + raised land*

6 *Let water in – relocate to raised land*

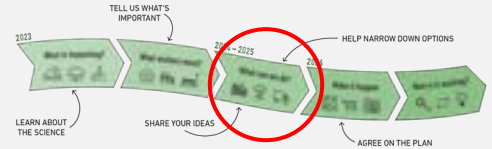
7 *Let water in – large scale managed retreat*

Mix of infrastructure, green space, moving people

Progressively moving people out of harm's way

South Dunedin Future Programme

What did the community say?



% OF PEOPLE THAT AGREE THIS FUTURE TAKES DUNEDIN IN THE RIGHT DIRECTION

South Dunedin Future

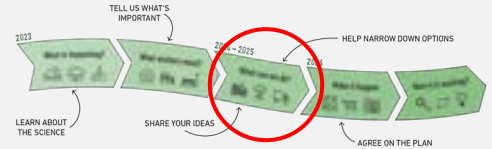
Future 1	STATUS QUO Keep doing what we are doing	15%
Future 2	KEEP THE LAND DRY Pipes and pumps	51%
Future 3	KEEP THE LAND DRY Elevating land and pumping water	48%
Future 4	SPACE FOR WATER Waterways and wetlands	59%
Future 5	SPACE FOR WATER Waterways and raised land	48%
Future 6	LET WATER IN Relocation to raised land	47%
Future 7	LET WATER IN Large scale retreat	38%

"Build more infrastructure in the short term to reduce present day flood risk."

"We want more information about any potential managed retreat process, including buy-outs."

South Dunedin Future Programme

What did the technical specialists say?

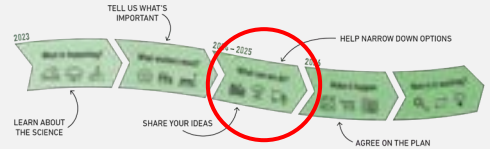


- **Multi-criteria assessment** of 7 futures against strategic objectives and decision-making framework previously approved by Councils.
- Involved technical and economic assessments by council staff, Aukaha (representing Kāi Tahu), and consultant teams.
- Incorporated community engagement results.

Objective	Criteria	Future 1	Future 2	Future 3	Future 4	Future 5	Future 6	Future 7
Sustainable Urban Development: Urban development accounts for the changing environment in South Dunedin, providing better spaces for people, water, and wildlife.	Reduce emissions and waste	-2.7	-1.5	-1.2	0.0	-0.2	-1.2	-1.5
	Well-functioning and liveable urban environment	-2.9	-1.0	-0.4	0.7	0.0	-0.1	-0.8
	Promotes water sensitive urban design and enhances amenity	-3.0	-1.4	-1.0	2.4	1.2	1.4	1.0
	Suitable phasing over time	-3.0	0.0	-0.7	2.3	0.7	-1.3	-2.7
Environmental and cultural restoration: Restore and regenerate natural environment, renew urban spaces, and re-energise cultural connections to place	Restore the natural environment	-2.6	-1.7	-0.7	0.6	1.2	1.9	2.7
	Aligns with Te Taki Haruru values (Autūroa, Auora, Autaketake, Autakata)	-3.0	-2.0	-1.5	1.5	2.0	0.5	-0.5
	Enhances cultural connections to place	-3.0	-0.5	-1.8	1.3	0.3	-0.8	-0.8
Just transition: Respond to climate change in ways that empower communities and promote fairness and equity.	Reflect community preference	-3.0	1.0	0.0	1.0	0.0	2.0	-1.0
	Minimise impacts on all vulnerable communities	-3.0	-1.4	-1.0	1.0	0.2	-2.0	-2.2
	Empowers communities	-2.0	0.0	-1.0	1.5	1.0	-1.0	-1.5
	Vulnerable communities not left behind	-2.7	-1.7	-1.3	1.7	1.3	-2.0	-2.3
	Promotes intergenerational equity	-2.8	-2.0	-1.0	0.0	0.6	0.0	-0.6
Social and economic resilience: Strengthen communities and businesses so they are well-prepared for floods and other hazards, able to cope and bounce back	Preserve and enhance community cohesion and community values	-2.5	1.1	0.6	1.5	0.0	-0.5	-0.8
	Minimises economic risk to communities	-2.7	0.3	0.0	1.2	0.0	-0.7	-0.8
	Increases community adaptive capacity	-2.8	-1.8	0.0	0.4	0.4	0.2	0.0
	Minimises economic risk to individuals	-2.6	-0.5	-0.3	0.0	-0.3	-0.3	-0.8
	Minimises impacts to business	-2.3	1.3	0.3	1.3	-1.7	1.0	1.0
Promote community safety: Promote community safety in South Dunedin by reducing flood and other risks, despite increasing natural hazards.	Promote community wellbeing	-3.0	-0.7	-0.7	1.0	0.7	-1.3	-2.0
	Promote community safety	-3.0	0.2	1.3	0.2	-0.2	1.0	0.7
	Reduced natural hazard risk	-2.6	-0.4	0.6	0.0	1.1	1.3	1.1
	Promote community health	-2.8	-1.0	-0.3	0.5	1.0	-0.5	-0.5

South Dunedin Future Programme

How the shortlisted futures were selected/developed.



Future 2 ranked **6th** overall. Infrastructure focus supported in short-term, but not long-term. Eliminated, but short-term infrastructure was integrated into design of all three shortlisted futures.

Future 1 ranked **7th** overall, scoring low with community and advisors. Eliminated.

Future 3 initially ranked **5th** overall, but was shortlisted to keep an infrastructure-focussed option on the table.

Future 4 ranked **1st** overall, scoring highly with community and advisors. Shortlisted.

Future 5 ranked **2nd** overall, scoring highly with community and advisors. Shortlisted.

Future 6 ranked **3rd**, but cost, complexity, and long lead in times led to elimination.

Future 7 ranked **4th**, with cost, complexity, and long lead in times leading to elimination.

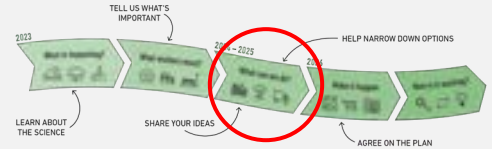
South Dunedin Future Programme

3 Proposed Adaptation Futures

- Key components of the 3 proposed futures
- Flood risk reduction over time
- Staging and implementation over time (including visualisations)
- Costs, benefits, and avoided damages

South Dunedin Future Programme

3 Proposed Adaptation Futures for South Dunedin



Future 3 - Protect

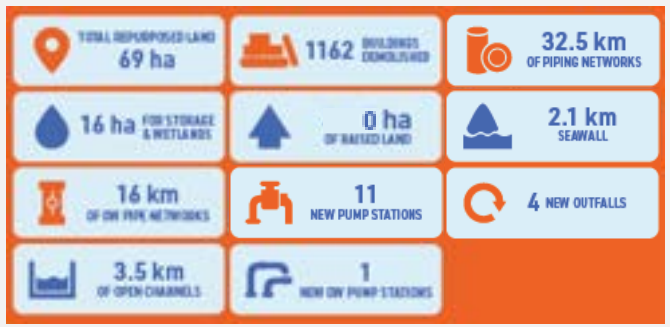
Future 3 – Protect, seeks to keep the land dry through a focus on engineered systems — pipes and pumps — with some land raising and coastal protection.

Cost: $2.098B	Benefits: $1.335B	Net cost: $763M

Future 4 - Restore

Future 4 – Restore, seeks to make space for water, by reintroducing open waterways, wetlands, and other green spaces to complement the pipes and pumps.

Cost: $1.629B	Benefits: $1.351B	Net cost: $278M

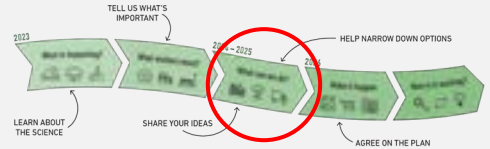


Future 5 - Reshape

Future 5 – Reshape, is the most transformative, moving people out of harm's way using land raising and infrastructure alongside green and blue networks.

Cost: $2.448B	Benefits: $1.336B	Net cost: $1.112B

South Dunedin Future Programme

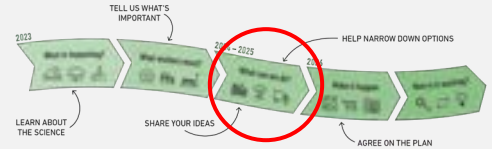


How were the 3 Proposed Adaptation Futures developed?

- Guided by performance standards and design principles, **each future uses a different mix** of infrastructure, green and blue space, and land use change to manage risk in different areas over the next 100 years. Key actions include:

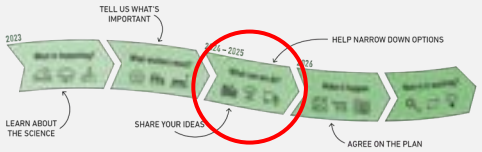
South Dunedin Future Programme

3 Proposed Adaptation Futures – Staging over time



South Dunedin Future

Revised risk over time



- ***All 3 futures significantly reduce risk*** when compared to the status quo, and by mid-century have reduced flood risk below present day (despite increasing hazards).
- ***Residual risk*** (if the system breaks or a flood event exceeds operating capacity) ***remains high***. This is due a reliance on constant dewatering, coastal erosion and inundation risk, and parts of South Dunedin being at or below sea level.

The image below shows how the risk changes over time across different futures.
It compares present day risk with short-, medium-, and long-term projections, highlighting building and roads that remaining exposed to flooding even after proposed interventions are implemented. The maps illustrate the varying levels of risk that persist under each future, highlighting where vulnerabilities continue and where adaptation efforts reduce exposure over time.

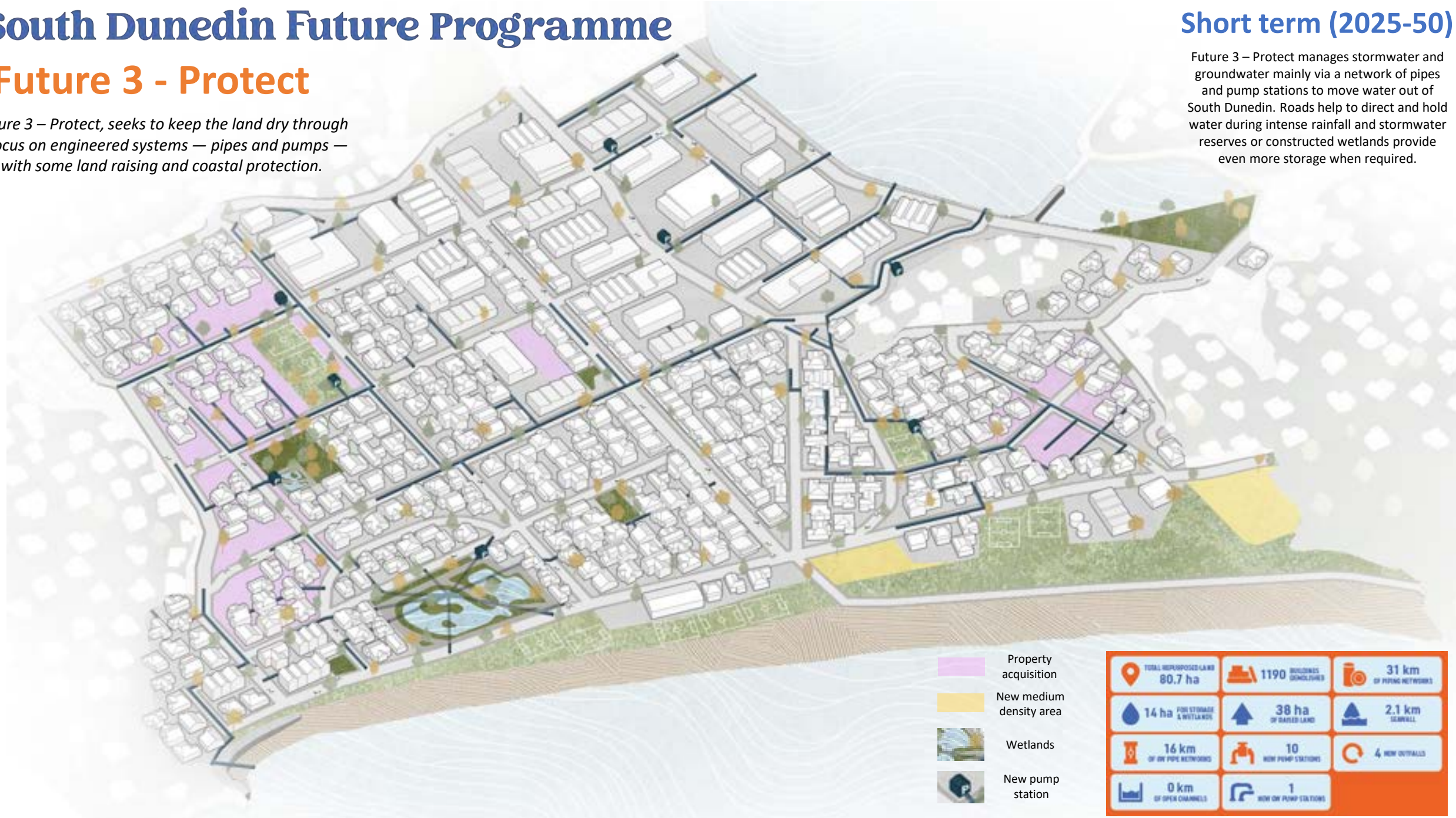
South Dunedin Future Programme

Future 3 - Protect

Future 3 – Protect, seeks to keep the land dry through a focus on engineered systems — pipes and pumps — with some land raising and coastal protection.

Short term (2025-50)

Future 3 – Protect manages stormwater and groundwater mainly via a network of pipes and pump stations to move water out of South Dunedin. Roads help to direct and hold water during intense rainfall and stormwater reserves or constructed wetlands provide even more storage when required.



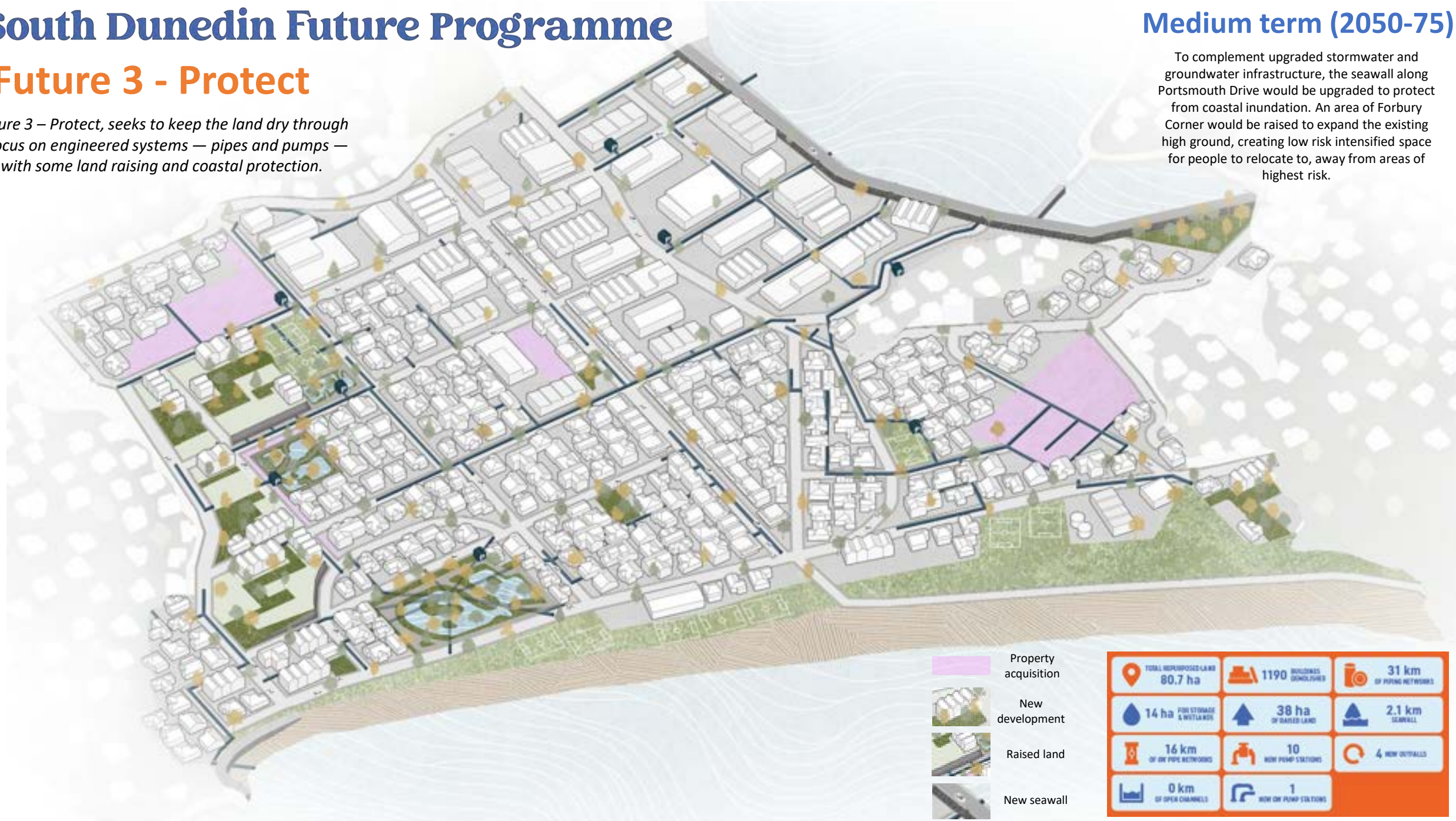
South Dunedin Future Programme

Future 3 - Protect

Future 3 – Protect, seeks to keep the land dry through a focus on engineered systems — pipes and pumps — with some land raising and coastal protection.

Medium term (2050-75)

To complement upgraded stormwater and groundwater infrastructure, the seawall along Portsmouth Drive would be upgraded to protect from coastal inundation. An area of Forbury Corner would be raised to expand the existing high ground, creating low risk intensified space for people to relocate to, away from areas of highest risk.



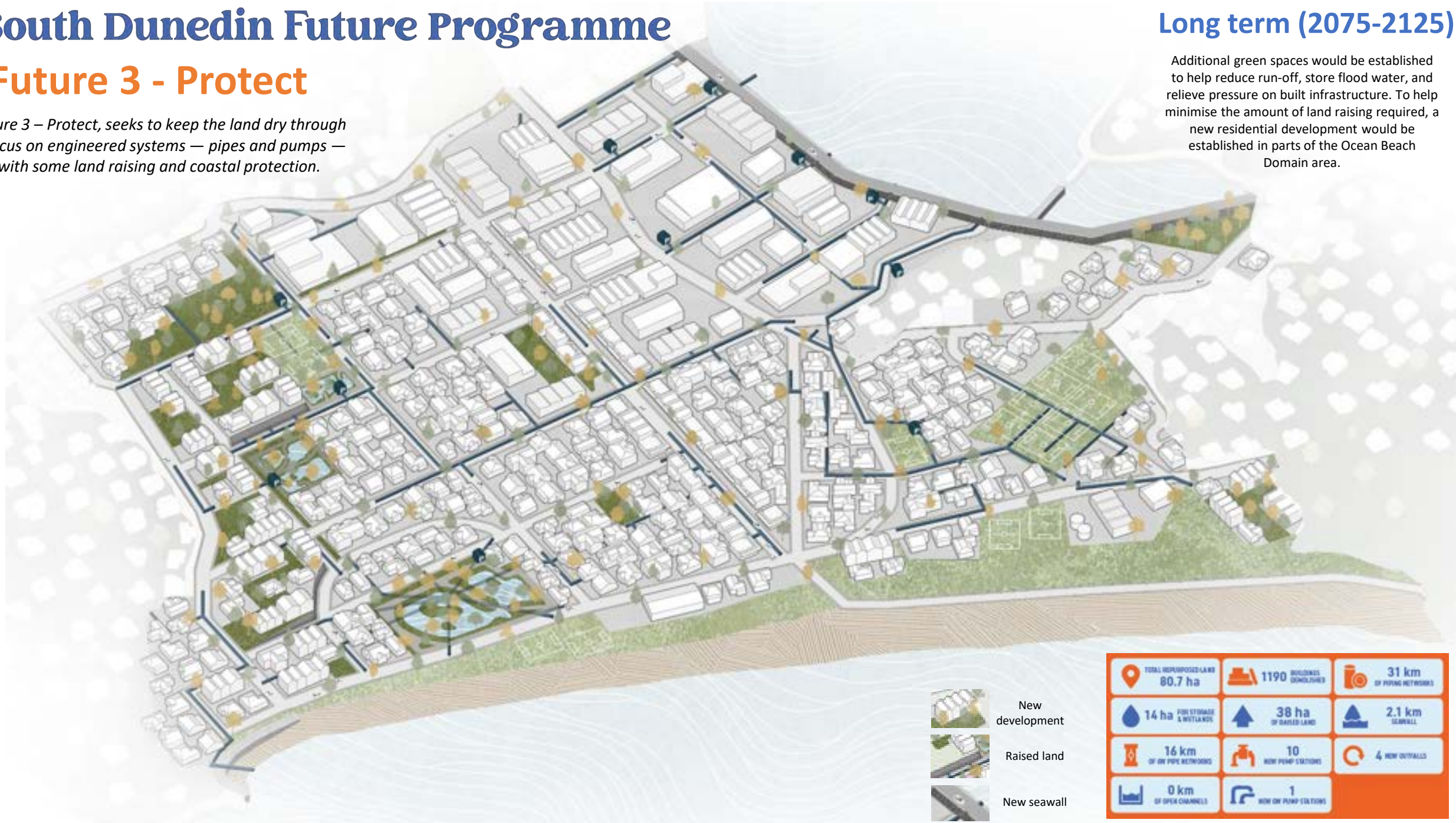
South Dunedin Future Programme

Future 3 - Protect

Future 3 – Protect, seeks to keep the land dry through a focus on engineered systems — pipes and pumps — with some land raising and coastal protection.

Long term (2075-2125)

Additional green spaces would be established to help reduce run-off, store flood water, and relieve pressure on built infrastructure. To help minimise the amount of land raising required, a new residential development would be established in parts of the Ocean Beach Domain area.



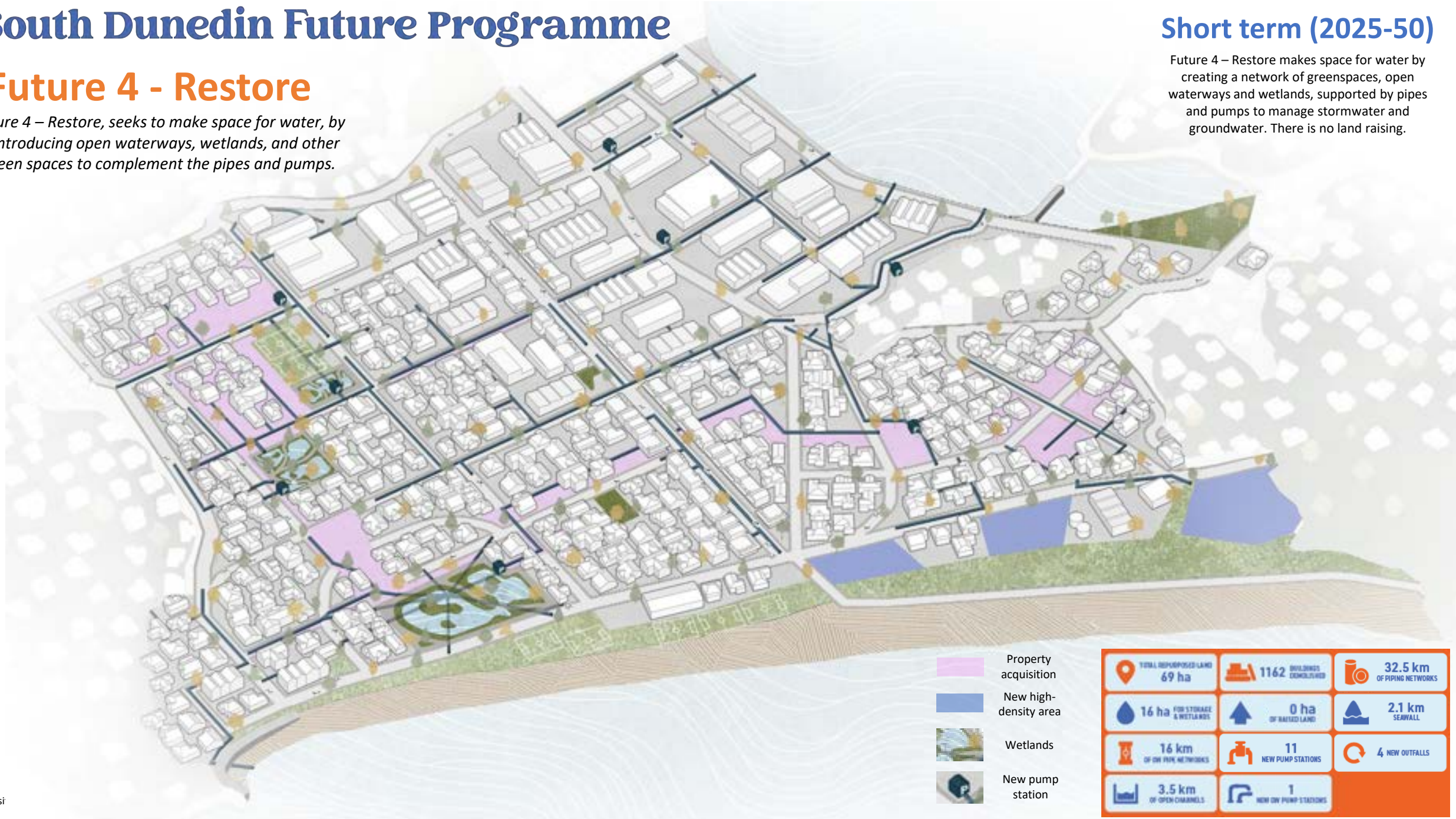
South Dunedin Future Programme

Future 4 - Restore

Future 4 – Restore, seeks to make space for water, by reintroducing open waterways, wetlands, and other green spaces to complement the pipes and pumps.

Short term (2025-50)

Future 4 – Restore makes space for water by creating a network of greenspaces, open waterways and wetlands, supported by pipes and pumps to manage stormwater and groundwater. There is no land raising.



Classi

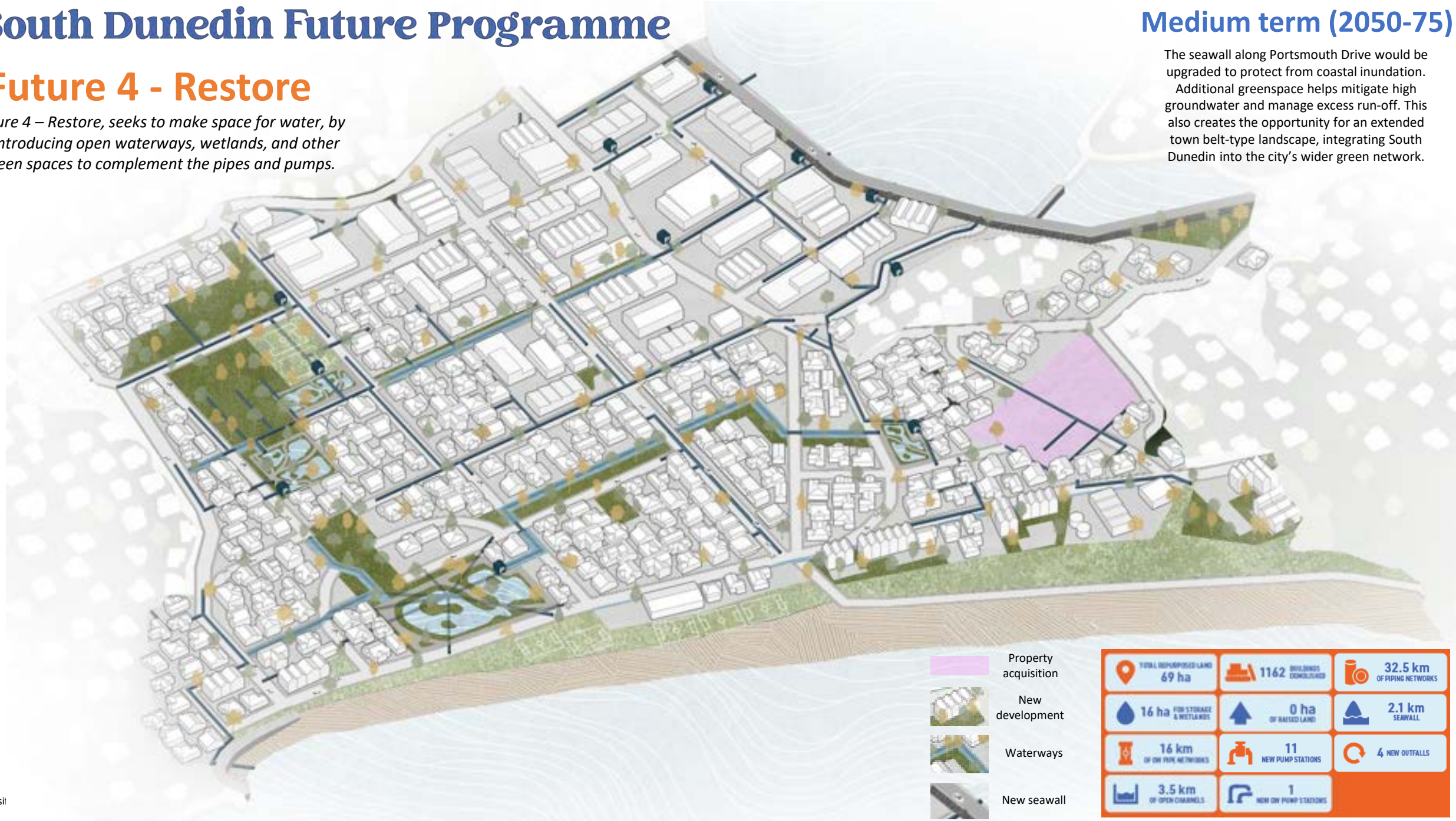
South Dunedin Future Programme

Future 4 - Restore

Future 4 – Restore, seeks to make space for water, by reintroducing open waterways, wetlands, and other green spaces to complement the pipes and pumps.

Medium term (2050-75)

The seawall along Portsmouth Drive would be upgraded to protect from coastal inundation. Additional greenspace helps mitigate high groundwater and manage excess run-off. This also creates the opportunity for an extended town belt-type landscape, integrating South Dunedin into the city's wider green network.



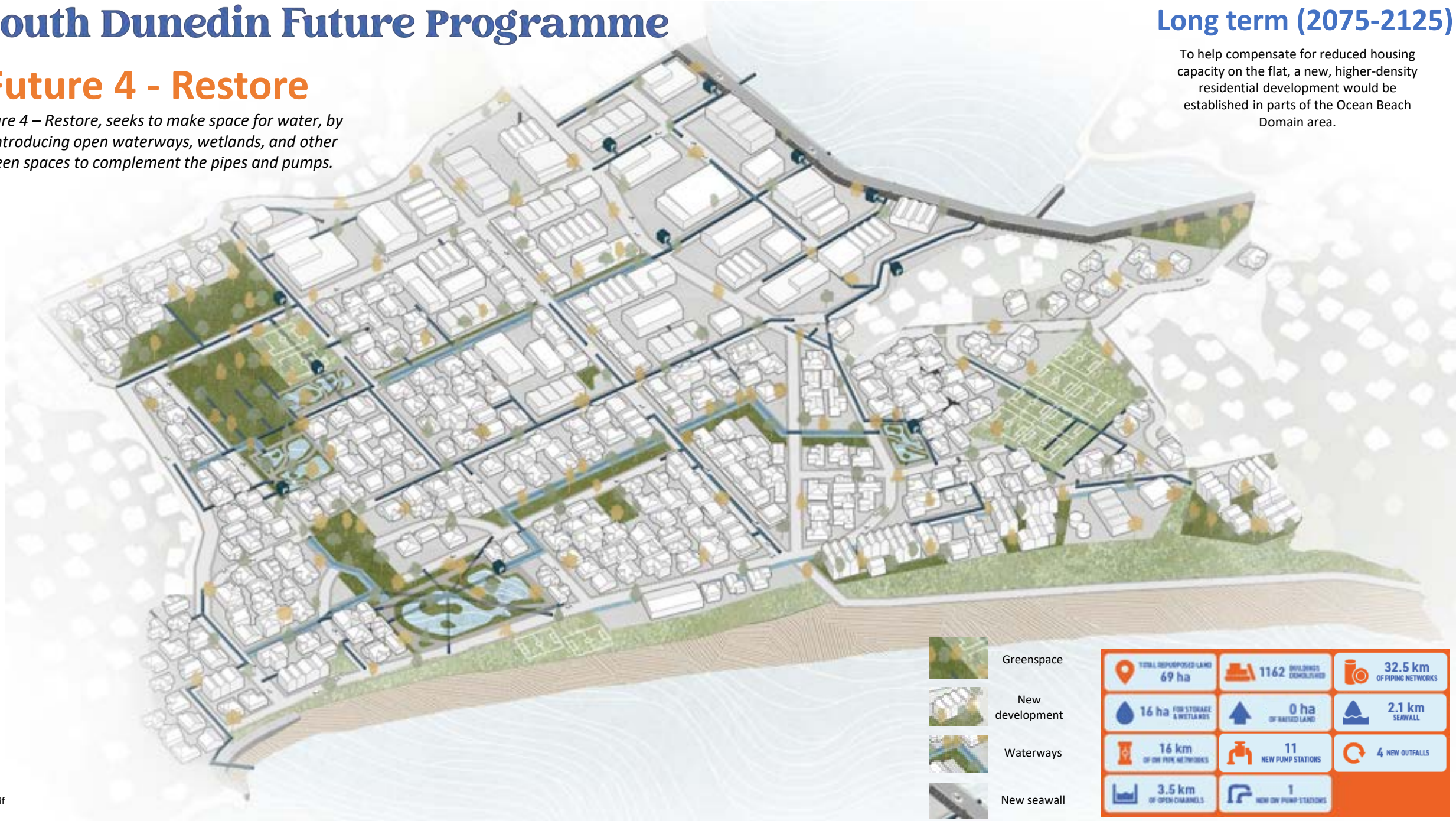
South Dunedin Future Programme

Future 4 - Restore

Future 4 – Restore, seeks to make space for water, by reintroducing open waterways, wetlands, and other green spaces to complement the pipes and pumps.

Long term (2075-2125)

To help compensate for reduced housing capacity on the flat, a new, higher-density residential development would be established in parts of the Ocean Beach Domain area.



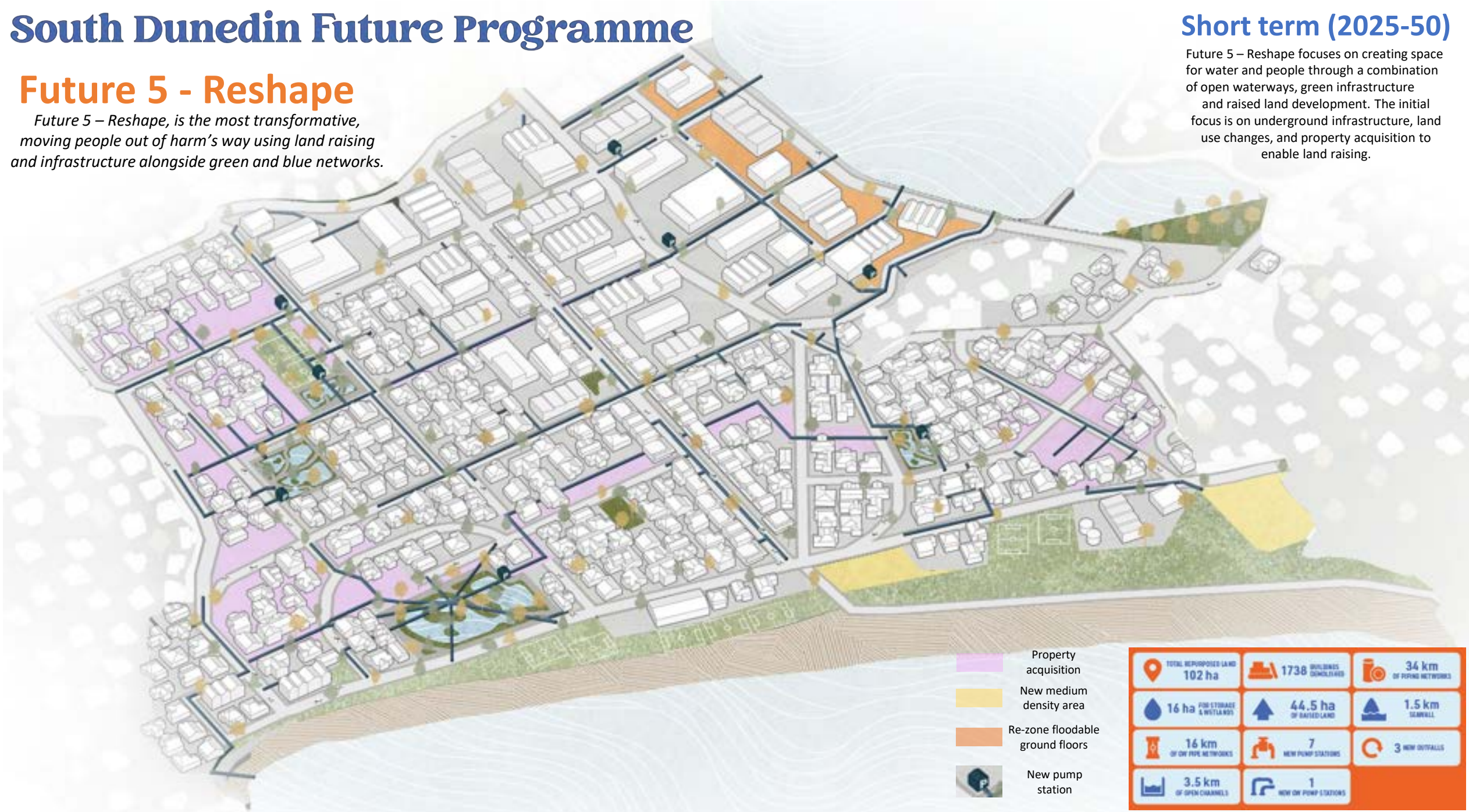
South Dunedin Future Programme

Future 5 - Reshape

Future 5 – Reshape, is the most transformative, moving people out of harm's way using land raising and infrastructure alongside green and blue networks.

Short term (2025-50)

Future 5 – Reshape focuses on creating space for water and people through a combination of open waterways, green infrastructure and raised land development. The initial focus is on underground infrastructure, land use changes, and property acquisition to enable land raising.



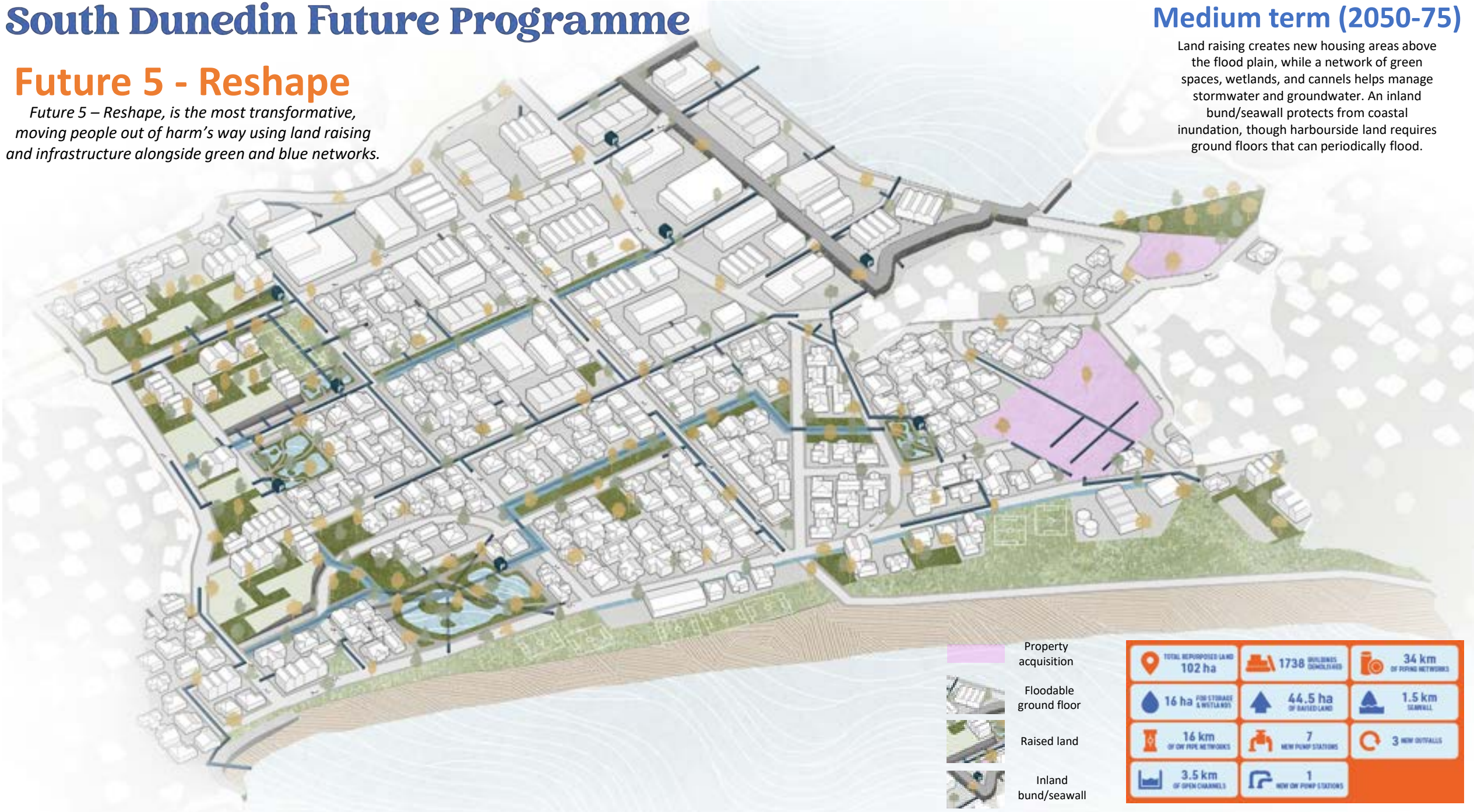
South Dunedin Future Programme

Future 5 - Reshape

Future 5 – Reshape, is the most transformative, moving people out of harm's way using land raising and infrastructure alongside green and blue networks.

Medium term (2050-75)

Land raising creates new housing areas above the flood plain, while a network of green spaces, wetlands, and cannels helps manage stormwater and groundwater. An inland bund/seawall protects from coastal inundation, though harbourside land requires ground floors that can periodically flood.



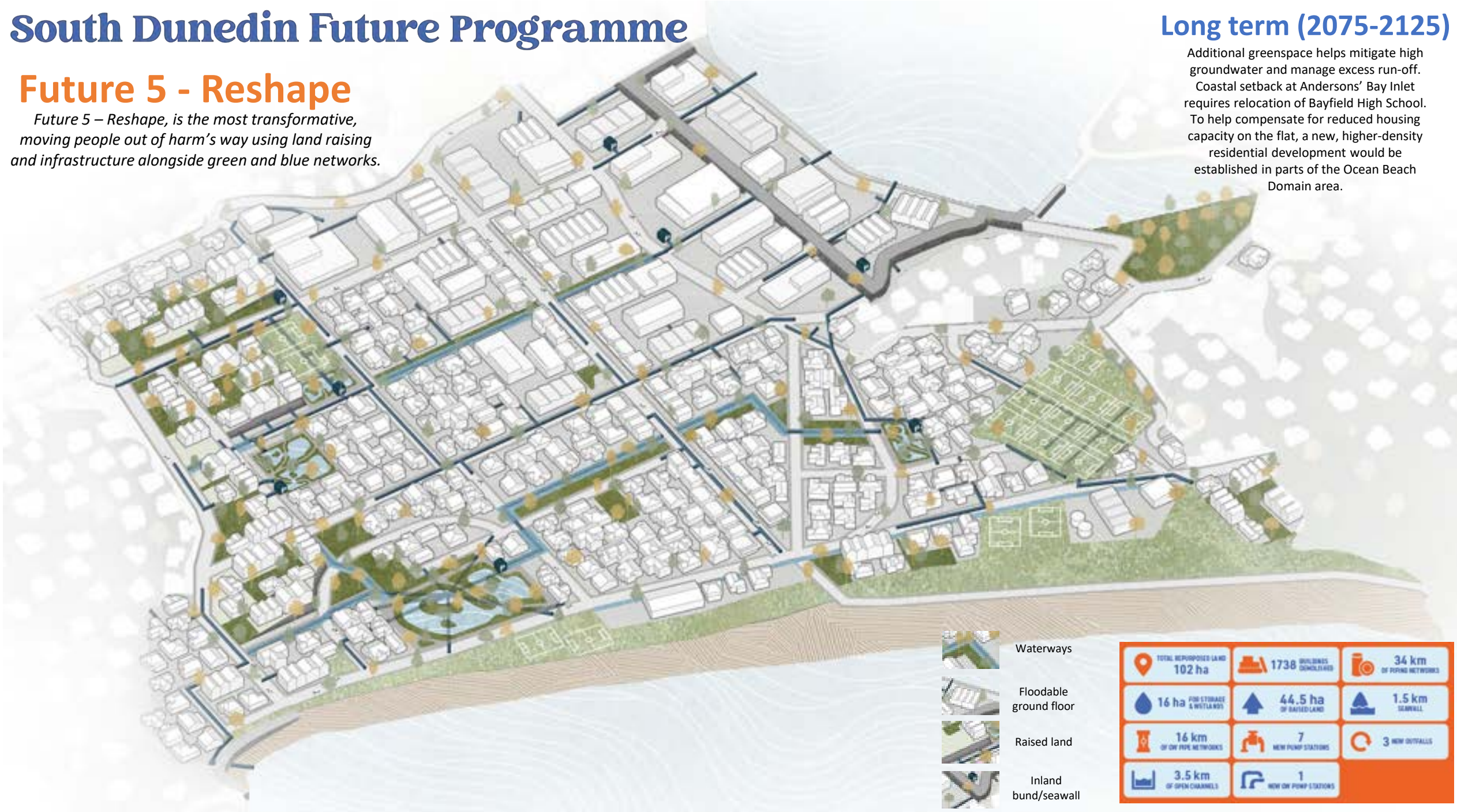
South Dunedin Future Programme

Future 5 - Reshape

Future 5 – Reshape, is the most transformative, moving people out of harm's way using land raising and infrastructure alongside green and blue networks.

Long term (2075-2125)

Additional greenspace helps mitigate high groundwater and manage excess run-off. Coastal setback at Andersons' Bay Inlet requires relocation of Bayfield High School. To help compensate for reduced housing capacity on the flat, a new, higher-density residential development would be established in parts of the Ocean Beach Domain area.



South Dunedin Future

What can we do?

- The costs of the Futures range from $1.63B-$2.45B.
- Compared to status quo of $1.5B-$2.0B (incl. costs + damages).
- Costs are front loaded in short-term, with benefits accruing in later years via avoided damages.
- Funding and financing strategy could be developed once preferred futures is identified.

Futures		Main Actions	Costs	Properties acquired and added	Challenge of Implementation	Social Impacts	Residual Risk	Average Annual Damages
Status Quo **Keep doing what we are doing** Total Costs: $0.41B **Total Damages: $1.45B**	Short	Pipes and pumps (minor stormwater network), reactive retreat, individual interventions	$254M	-57*				$11M
	Medium	Pipes and pumps (minor stormwater network), reactive retreat, individual interventions	$115M	-103*				$78M
	Long	Pipes and pumps (minor stormwater network), reactive retreat, individual interventions	$43M	-678*				$212M
Future 3 **Protect** Total Costs: $2.1B Total Benefits: $1.34B	Short	Investment in pipes, pumps, land aquisition and rezoning	$1,598M	-736				$0.6M
	Medium	Raise land, add pipes and coastal protection, expand pumps, create green spaces	$452M	-456/+336				$2.3M
	Long	Increase pump capacity, expand green spaces, develop housing	$48M	+1520				$1.0M
Future 4 **Restore** Total Costs: $1.63B Total Benefits: $1.35B	Short	Investment in pipes, pumps, land aquisition and rezoning	$1,284M	-1162				$0.6M
	Medium	Build canals, wetlands, and coastal protection, expand pumps, add pipes	$287M	+840				$1.6M
	Long	Complete green space transition, add pipes, increase pumping, develop housing	$58M	0				$0.7M
Future 5 **Reshape** Total Costs: $2.45B Total Benefits: $1.34B	Short	Investment in pipes, pumps, land aquisition and rezoning	$1,938M	-1144				$0.6M
	Medium	Raise land, build canals and coastal protection, develop housing	$475M	-594/+336				$2.5M
	Long	Maintain infrastructure, complete green space transition	$35M	+1780				$3.3M

SOUTH DUNEDIN FUTURE

Short - 2025 to 2050
Medium - 2050 to 2075
Long - 2075 to 2125

Pipes and Pumps
Coastal Protection
Land Raising
Water Storage
Waterways
Change in Planning Rules

Low
Moderate
High
Very High
With high coastal residual risk
Higher residual risk due to failure or hazard event that exceeds design limits

*Properties that would be impacted by emergent groundwater

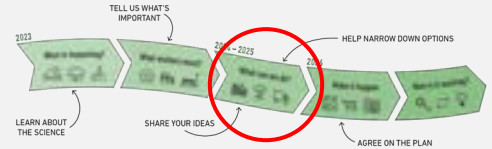
South Dunedin Proposed Adaptation Futures, Apr 2026

South Dunedin Future Programme

3 Proposed Adaptation Futures – Reports to Councils

- Council reporting process
- Key documents to be presented to Councils

South Dunedin Future Programme

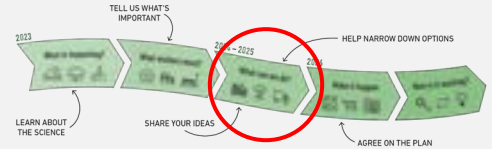


Summary of key outputs and findings

Four key outputs from this stage of the SDF programme include an overview of the 3 proposed adaptation futures for South Dunedin, and background technical reports on stormwater, groundwater, and economic assessments.

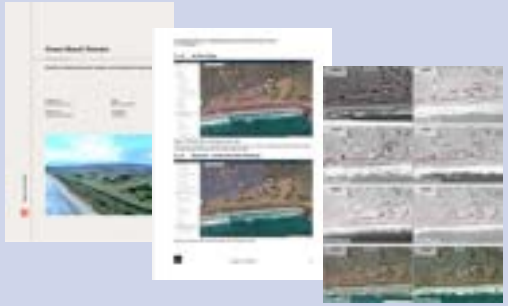
Report	Title	Purpose	Audience
	Three Proposed Adaptation Futures or South Dunedin	To provide a technical, but plain language **overview of the key features of each of the 3 Proposed Futures**. This includes key features, stages of development, performance, costs and benefits. The report includes visualisations of each future in the short, medium, and long term. The report draws on content from the stormwater, groundwater, and economic reports (see below).	Primary audience is Councillors and council staff, though much of the content will be used or adapted for community engagement. The content is technical, but at a summary level and written in plain language, aligned to most council reports and products.
	South Dunedin Stormwater Modelling Report	This report includes **technical assessments of feasibility of a range of potential interventions to mitigate flood and other risks** affecting South Dunedin. This includes through 'grey' infrastructure like pumps and pipes, and green infrastructure such as open water ways and water detention areas, as well and land use change. Modelling has enabled testing of the technical performance of potential interventions, preliminary configurations, sizing, and costing to support comparison and community engagement.	Primary audience is Councillors and council staff. The content is written in plain language (where possible) or technical language accessible to those with skillsets and experience in stormwater, groundwater, and finance and economics. The content provides more detailed information to support the conclusions presented in the overview report, includes additional information for interested stakeholders, and will inform future more detailed assessments and design work.
	South Dunedin Groundwater Assessment Report	This report describes early-stage **technical assessments to determine the feasibility of groundwater drainage systems aimed at managing risks from shallow and rising groundwater** across South Dunedin. Building on research by Earth Science New Zealand (formerly GNS) it uses modelling to scope the technical performance of potential interventions, preliminary configurations, sizing, and costing to support further analysis. Potential adverse effects of drainage, such as subsidence and saline intrusion, as well as mitigations for these effects are also explored.	
	Economic Assessment of the 3 Proposed Adaptation Futures for South Dunedin	This report **evaluates the economic performance of each of the three proposed adaptation futures for South Dunedin**, comparing these to a status quo counterfactual scenario in which no substantive adaptations occur. Standard cost-benefit methodologies are used to analyse anticipated costs, benefits (including avoided costs), and to calculate these over a 100-year period to 2125.	

South Dunedin Future Programme

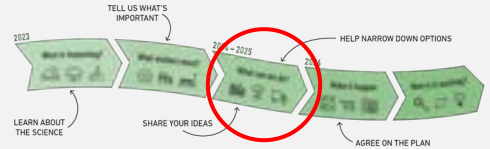


Summary of key outputs and findings

Three supplementary outputs looking at health and equity, property, and Ocean Beach Domain.

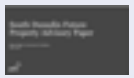
Report	Title	Purpose	Audience
	Health & Equity Assessment Report	This research into the health and equity implications of flooding, the implications of the three proposed futures, is intended to provide stronger insights into social aspects of adaptation (in addition to environmental, political, and economic). The visualisation materials are intended to support all stakeholders to access, understand, and offer informed responses on a range of complex issues relating to climate adaptation (e.g. health, environment, housing, finance, fairness, trade-offs, etc.)	Primary audience for the research report is Councillors and council staff, intended to support analysis of the futures; though key findings re-packaged in plain language and visualised to support wider community access. Science communications and visualisations are aimed at the community, supporting them to access and process complexity of these issues.
	Property Development Assessment Report	PWC was engaged to provide high-level commercial property insights across the three shortlisted futures, focusing on feasibility, sequencing, market response, value creation, and the funding and financing implications of early adaptation interventions, including land raising and redevelopment opportunities. This report builds on a Phase 1 report completed in 2025 that focussed on the longlist of 7 potential futures.	The primary audience of this report is Councillors and council staff, intended to support analysis of the futures, including consideration of next steps and potential approaches to implementation.
	Ocean Beach Domain Due Diligence Report	To undertake a preliminary assessment of the potential to redevelop areas of council-owned land at Ocean Beach Domain, within the context of making best use of available land in South Dunedin, potentially enabling more residents to remain local. Such development could reduce or avoid the more complex and costly process of land raising elsewhere. Preliminary investigations included a desktop analysis of natural hazards, geotechnical conditions, and contaminated land. A preliminary legal review of title was also undertaken.	The primary audience of this report is Councillors and council staff, intended to support analysis of the futures, including consideration of next steps and potential approaches to implementation.

South Dunedin Future Programme



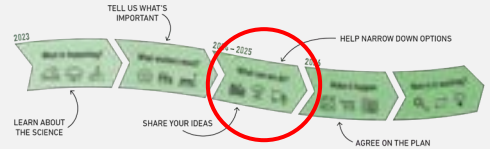
Summary of key outputs and findings

The four key outputs from this stage of the programme sit within a wider body of SDF programme work:

	Report	Title/Subject	Author(s)	Description
Communications and Community Engagement		Communications	SDF Team; DCC + ORC Comms	Media and communications activities associated with public release of the technical reports (e.g. flyer, letter drop, media releases, etc)
		Engagement	SDF Team; various DCC + ORC	Community engagement activities (e.g. public workshops and drop-ins, targeted stakeholder sessions, youth activities, etc.)
		Reporting	WSP (Kia Rōpine) / SDF Team	Analysis and reporting on community engagement results and covering Council papers.
Technical Summary		Council papers	SDF Team	Covering Council papers for Proposed Adaptation Futures for South Dunedin and six supporting technical reports.
		Three Proposed Adaptation Futures for South Dunedin	BECA (Kia Rōpine)	Technical but plain language overview describing the key features of each of the 3 Proposed Adaptation Futures for South Dunedin.
Background Technical Reports		Stormwater Modelling Report	BECA (Kia Rōpine)	Technical feasibility assessment of stormwater network systems and approaches (grey and green infrastructure) in South Dunedin.
		Groundwater Assessment Report	WSP (Kia Rōpine)	Technical feasibility assessment of groundwater drainage systems and risk management in South Dunedin.
		Economic Assessment Report	WSP (Kia Rōpine)	Evaluation of the economic performance of each of the three proposed adaptation futures for South Dunedin against a status quo.
		Health & Equity Assessment Report	University of Otago	Research into the health and equity implications of flooding, the potential impacts of the 3 Futures, and community engagement.
		Property Development Assessment Report	PWC	Advice on potential property market implications, commercial insights, potential market responses, and financing tools or models.
		Ocean Beach Domain Due Diligence Report	Stantec	Preliminary assessment of natural hazards, HAIL, and geotech at potential future development sites in Ocean Beach Domain.

South Dunedin Future Programme

Council reporting - Next steps and timing



- **Technical reports and Council papers** – Subject to Councillor and other feedback, technical reports will be finalised by mid-April. The reports and a covering Council paper will be presented to Councils (and public) on 24 June (ORC) and 25 June (DCC).
- **Community Engagement** – Subject to Council approvals, community engagement would run from 1 July – 9 August 2026 and include a range of public communications (media releases, flyers, collateral) and a mix of public and targeted stakeholder engagement sessions.
- **Climate adaptation masterplan** – Community engagement results will be combined with further technical and economic assessments to develop a single, preferred adaptation future by October 2026. This becomes the basis of the climate adaptation masterplan for South Dunedin, which should be completed and presented to Councils for approval in mid-2027.
- **Implementation** – The fastest and most efficient way of transitioning to implementation is to align the final stage of the SDF programme with Councils' LTP processes. SDF insights can inform budgets and workplans for the LTP (2027-37), with approved activities commencing from 1 July 2027, as part of a 'launch package' of projects.

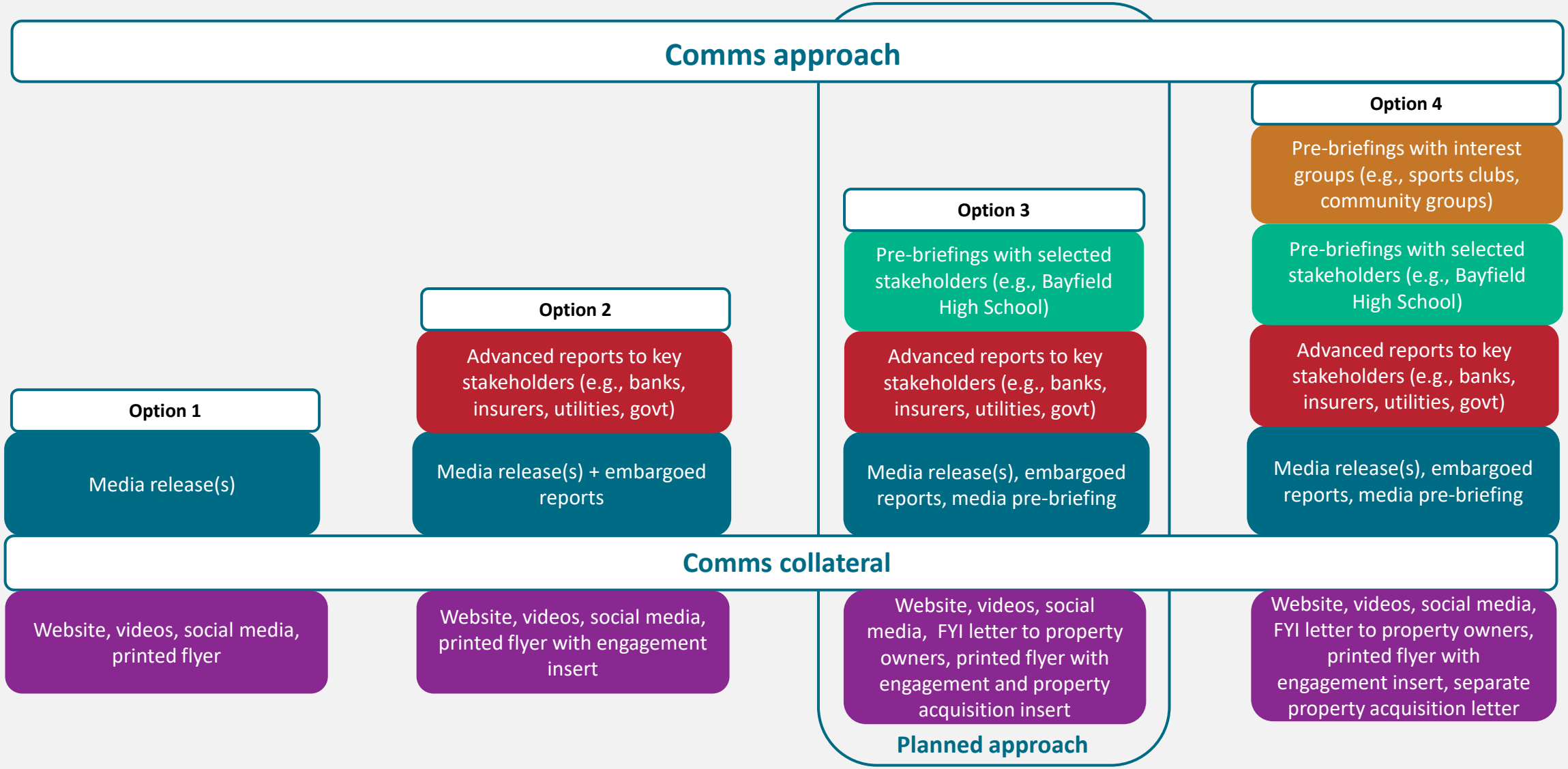
South Dunedin Future Programme

Planned approach to communications and engagement

- Communications options and planned approach
- Specific comms approach to property acquisition
- Community engagement options and planned approach
- Calendar of key events pre- and post-Council meetings

South Dunedin Future Programme

Planned approach to communications



South Dunedin Future Programme

Planned approach to communications

Option 1

What it means

- Relying on media release to convey key messages only.
- Detail provided in Council paper and technical reports.
- Basic package of comms collateral simplifies key elements, improving accessibility.

Risks

- Media may not accurately interpret and report key information.
- Opportunity for other stakeholders and/or narratives to dominate.
- Important information may not reach stakeholders.
- Stakeholder confusion and/or disengagement.
- Extensive public discourse and queries on property acquisition.

Option 2

What it means

- Supplementing the media release with advanced copies of Council paper and technical reports.
- Media and key stakeholders like banks and insurers are better placed to make more informed public comment.
- Comms collateral simplifies key elements and flyer insert directs stakeholders to engagement opportunities, further improving accessibility.

Risks

- Despite advanced copies of reports, media may misinterpret or misreport key information.
- While reduced, opportunity remains for other stakeholders and/or narratives to dominate.
- Important info may not reach key stakeholders, including on property acquisition.

Option 3

What it means

- Selected high priority stakeholders receive advanced briefing.
- Supplementing media release and advanced reports with media briefing.
- Media and key stakeholders like banks and insurers are better placed to make more informed public comment.
- Comms collateral specifically addresses property acquisition.

Risks

- More stakeholders have advanced information, increasing risk of leaks.
- Perception that certain stakeholders have received ‘special’ treatment.
- Additional complexity makes implementation more challenging.

Planned approach

Option 4

What it means

- A larger selection of stakeholders receive advanced briefing.
- Supplementing media release and advanced reports with media briefing.
- Media and wide range of stakeholders are better placed to make more informed public comment.
- Comms collateral addresses property acquisition at individual property-level.

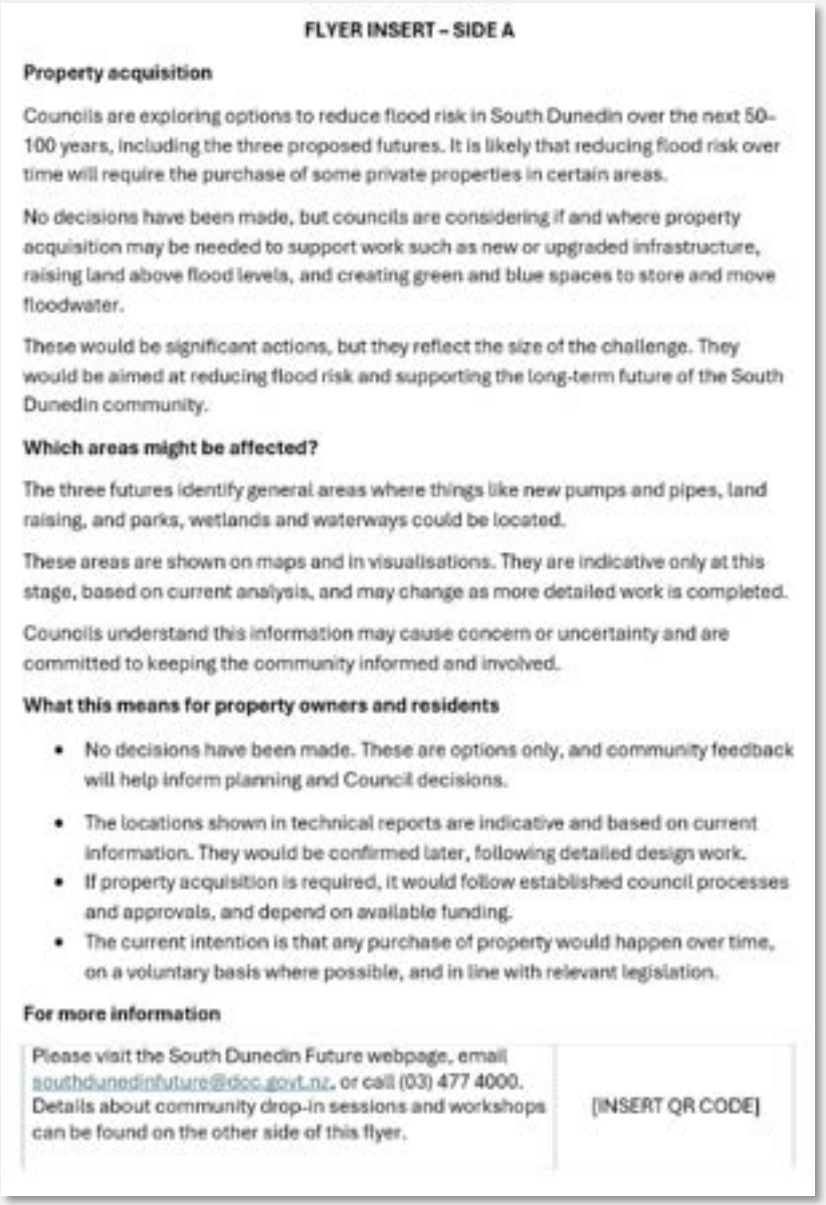
Risks

- Many more stakeholders have advanced info, significantly increasing risk of leaks.
- Widespread perception that many stakeholders have received ‘special’ treatment, creating ‘us and them’ sentiment.
- Additional complexity makes implementation very challenging, including risk of individual property level errors.

South Dunedin Future Programme

Comms relating to property acquisition

- In the three futures there is **no 'managed retreat'** in the sense of property acquisition for the purpose of alleviating flood risk to *individual* properties (e.g. buy-outs due solely to flood risk being too high).
- Rather, the futures include property acquisition for the purpose of **enabling public works** that would reduce wider *community* flood risk (e.g. to enable creation of a stormwater detention basin).
- There is **existing legislation, precedent, and process** covering property acquisition related to public works, including the Public Works Act 1981.
- Key messages on property acquisition would be included in media releases and engagement materials, including the **flyer insert** shown on this slide (which would be sent to all properties in South Dunedin).



FLYER INSERT – SIDE A

Property acquisition

Councils are exploring options to reduce flood risk in South Dunedin over the next 50-100 years, including the three proposed futures. It is likely that reducing flood risk over time will require the purchase of some private properties in certain areas.

No decisions have been made, but councils are considering if and where property acquisition may be needed to support work such as new or upgraded infrastructure, raising land above flood levels, and creating green and blue spaces to store and move floodwater.

These would be significant actions, but they reflect the size of the challenge. They would be aimed at reducing flood risk and supporting the long-term future of the South Dunedin community.

Which areas might be affected?

The three futures identify general areas where things like new pumps and pipes, land raising, and parks, wetlands and waterways could be located.

These areas are shown on maps and in visualisations. They are indicative only at this stage, based on current analysis, and may change as more detailed work is completed.

Councils understand this information may cause concern or uncertainty and are committed to keeping the community informed and involved.

What this means for property owners and residents

- No decisions have been made. These are options only, and community feedback will help inform planning and Council decisions.
- The locations shown in technical reports are indicative and based on current information. They would be confirmed later, following detailed design work.
- If property acquisition is required, it would follow established council processes and approvals, and depend on available funding.
- The current intention is that any purchase of property would happen over time, on a voluntary basis where possible, and in line with relevant legislation.

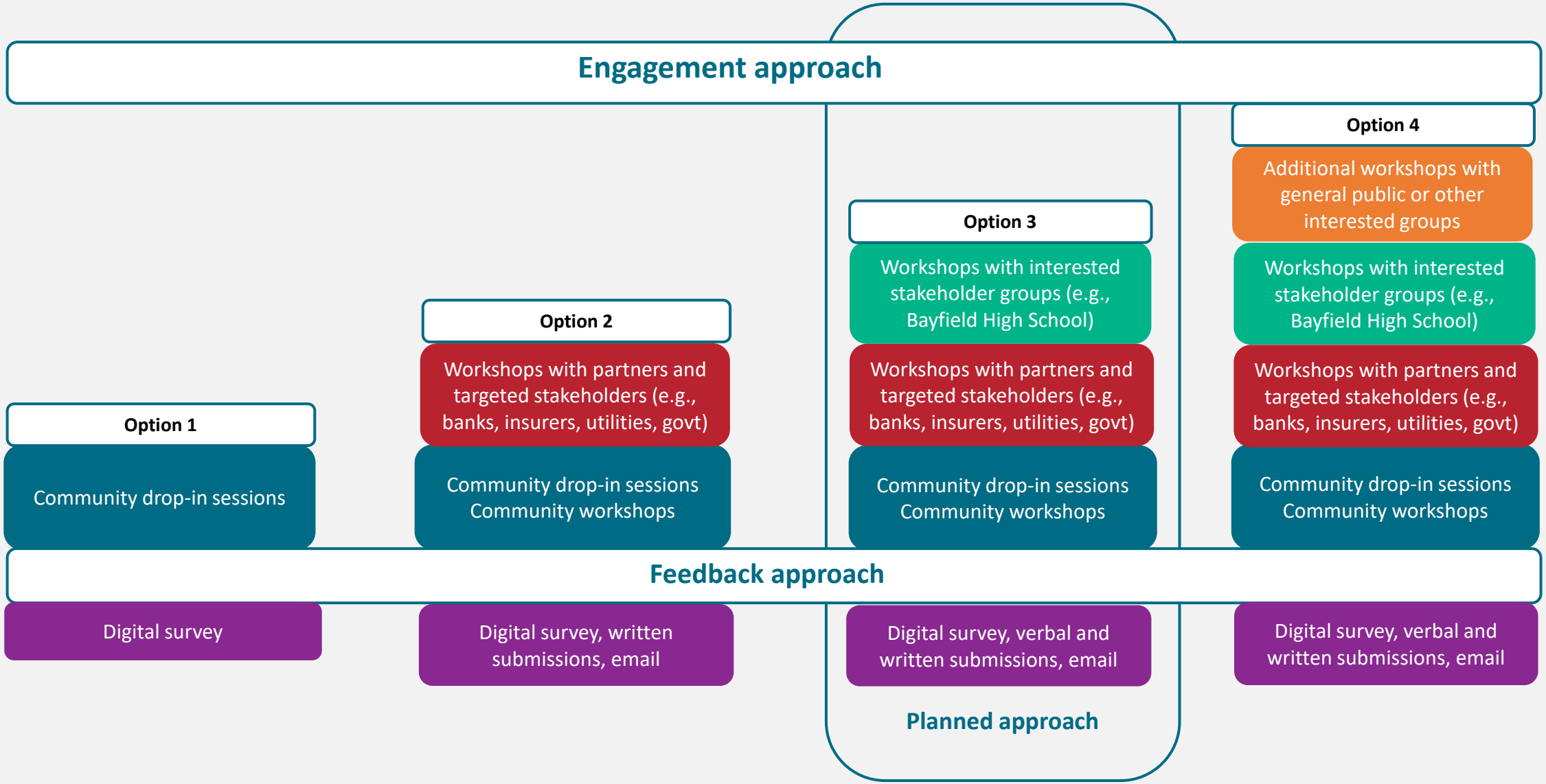
For more information

Please visit the South Dunedin Future webpage, email southdunedinfuture@dcc.govt.nz, or call (03) 477 4000. Details about community drop-in sessions and workshops can be found on the other side of this flyer.

[INSERT QR CODE]

South Dunedin Future Programme

Planned approach to community engagement



South Dunedin Future Programme

Planned approach to community engagement

Option 1

What it means

- Simple, streamlined engagement approach for partners, stakeholders and the whole community.
- Engagement primarily takes place online or through print channels with minimal face-to-face engagement available.
- Primarily a passive/neutral form of engagement.

Risks

- Limited depth of feedback on complex or high-impact details presented in digital or print form.
- Community understanding may remain surface-level.
- High potential for confusion or misinterpretation without deeper engagement.
- May miss large cohort of community due to digital aspects of survey/information gathering.

Option 2

What it means

- Builds on option 1 by adding facilitated in-person sessions with targeted stakeholders to explore information in detail.
- Workshops support more in-depth conversations, with potential for more informed and comprehensive feedback.
- Targeted workshops help ensure feedback is collected from key stakeholders.

Risks

- Proactive engagement required with targeted stakeholders – potential perception of 'special treatment' of some stakeholders.
- Possible risk of creating bias in engagement results by targeted some stakeholders and not others.
- Increased complexity in delivery and resourcing for engagement programme.

Option 3

What it means

- Expansion of targeted workshops help ensure feedback is collected from wider range of key stakeholders.
- A mix of proactive and reactive engagement – high touch engagement seeking to involve as many partners, stakeholders and the community as possible.
- Potential for in-depth feedback captured as part of digital and verbal survey collection.
- Consistent with approaches taken throughout SDF engagement to date.

Risks

- Increased complexity in delivery and resourcing for engagement programme.
- Potential for perceptions of special treatment, bias of results, or expectations of undue influence of process or outcome.

Planned approach

Option 4

What it means

- Engagement is focused on speaking with and obtaining feedback from as many individuals and groups as possible.
- Public, targeted and interested stakeholders are prioritised.
- Stakeholders could be involved in multiple workshops across engagement period.

Risks

- Highly complex, resource and time intensive, and requires reactive capacity that may exceed DCC resources. Potential to over promise and under deliver, leading to dissatisfaction and/ or disengagement.
- Risk of prioritising quantity of feedback over quality, limiting more in-depth analysis and understanding of what are complex and nuanced issues.

South Dunedin Future Programme

Calendar of communications and engagement

1 June **King's Birthday**	2	3	4 DCC Council Meeting	5	6	7
8 Council presentation slides sent to Councillors	9	10 **DCC Cr Workshop** **ORC Cr Briefing** ORC Council papers and agenda finalised.	11	12 ORC Council agenda / SDF reports sent to Councillors. Advanced reports sent to selected stakeholders.	13	14
15 ORC regular agenda published.	16 Advanced media briefing Advanced briefings with key stakeholders.	17 Council agendas public (ORC as supplementary) Media embargo lifts (4am) Issue SDF communications Publish Council papers, SDF technical reports.	18 Anticipated media reporting on reactions to SDF reports. Follow up interviews.	19 Anticipated media reporting on reactions to SDF reports. Follow up interviews.	20	21
22	23	24 **ORC Council Meeting**	25 **DCC Council Meeting** Issue comms on Council decisions	26	27	28
29	30 June	1 July Community engagement period opens (subject to Council approvals).	2	3	4	5

South Dunedin Future Programme

Calendar of communications and engagement

29	30 June	1 July Community engagement period opens (subject to Council approvals).	2 Public Drop-in Session @ South D Library (9:30am-7:30pm)	3 Public Drop-in Session @ South D Library (9:30am-4:00pm)	4 Public Drop-in @ South D Library (10am-3pm)	5
6 Public Drop-in Session @ South D Library (9:30am-5:00pm) School holidays start	7 Public Drop-in Session @ South D Library (9:30am-5:00pm)	8 Public Drop-in Session @ South D Library (9:30am-5:00pm)	9	10 **Matariki**	11 **Matariki Wknd**	12 **Matariki Wknd.**
13	14	15 NZ Science Festival	16 Public Drop-in Session @ South D Library (12pm-7:30pm)	17 Public Drop-in Session @ South D Library (11am-4:00pm)	18 Public Drop-in @ South D Library (10am-3pm)	19 School holidays end
20 Public Drop-in Session @ South D Library (11am-4:00pm)	21 Public Drop-in Session @ South D Library (11am-4:00pm)	22 Public Drop-in Session @ South D Library (11am-4:00pm)	23	24	25	26
27	28	29	30 Public Drop-in Session @ South D Library (12pm-7:30pm)	31 Public Drop-in Session @ South D Library (11am-4:00pm)	1 August Public Drop-in @ South D Library (10am-3pm)	2
3 Public Drop-in Session @ South D Library (11am-4:00pm)	4 Public Drop-in Session @ South D Library (11am-4:00pm)	5 Public Drop-in Session @ South D Library (11am-4:00pm)	6	7	8	9 Community engagement period closes

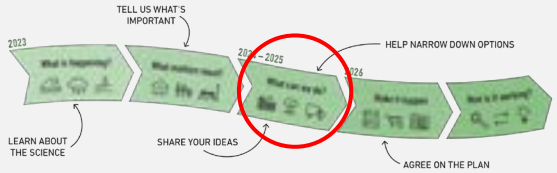
South Dunedin Future Programme

Final stage of SDF programme and transition to implementation

- Overview of key stages of SDF programme
- Integrating final stage of SDF programme into LTP 2027-37 process
- Short term components of 3 proposed futures are all very similar
- Using LTP process to quickly transition to implementation from 1 July 2027

South Dunedin Future Programme

Developing a climate adaptation masterplan for South Dunedin



Steps 1 & 2

Best Practice Research & Adaptation Approaches

(16 Generic Adaptation Approaches)

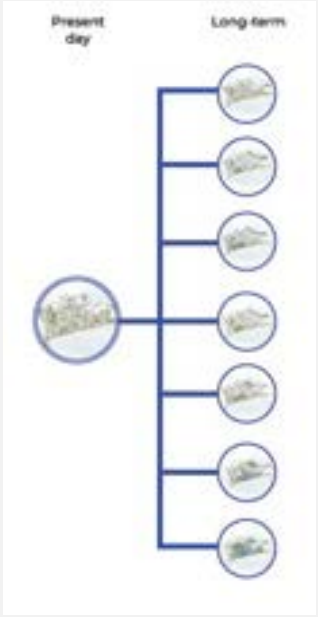
2023/24

Drawing on best practice and crowd sourced ideas, an initial list of 16 generic approaches for helping South Dunedin adapt to flooding and climate change was developed. The approaches were categorised as protect, accommodate, retreat, and avoid. Community engagement occurred in early 2024, with feedback informing further analysis.

Step 3

7 Potential Adaptation Futures

(Longlist)



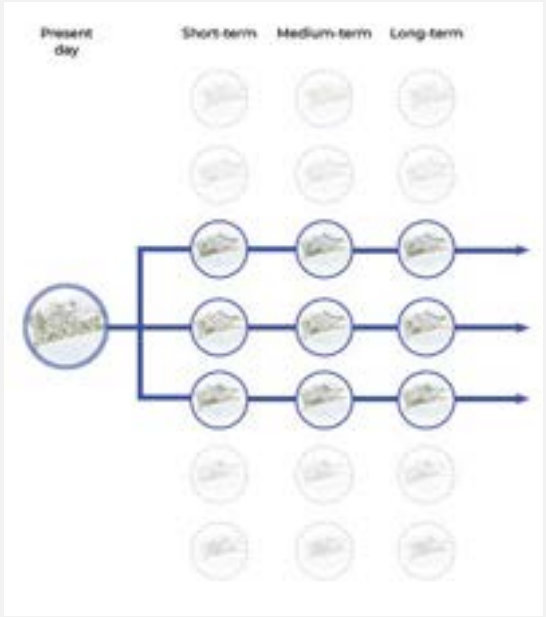
2025

The 16 approaches were combined in different ways to form 7 Potential Adaptation Futures for South Dunedin. The 7 futures represented a spectrum of potential responses. Community engagement occurred in April/May 2025.

Step 4

3 Proposed Adaptation Futures

(Shortlist)



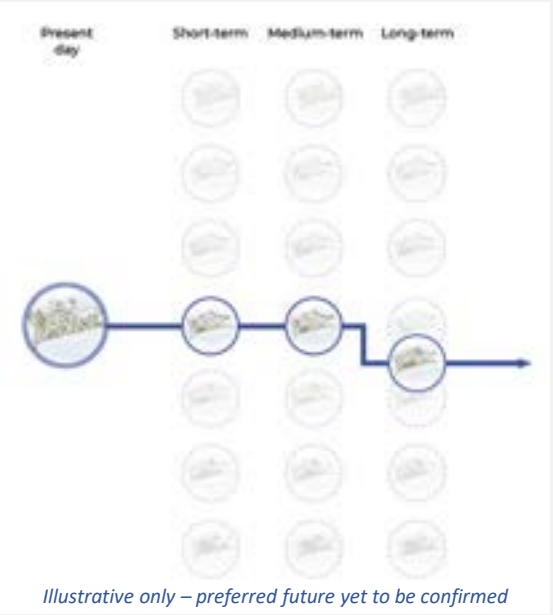
2026

Following a shortlisting process, stormwater and groundwater modelling was undertaken for 3 futures to determine an appropriate mix of infrastructure, green and blue space, and land use change required to manage risk in different areas of South Dunedin. Community engagement is planned for July/Aug 2026.

Step 5

Preferred Adaptation Future

(Climate Adaptation Masterplan for South Dunedin)



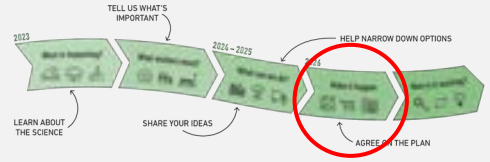
Illustrative only – preferred future yet to be confirmed

2027

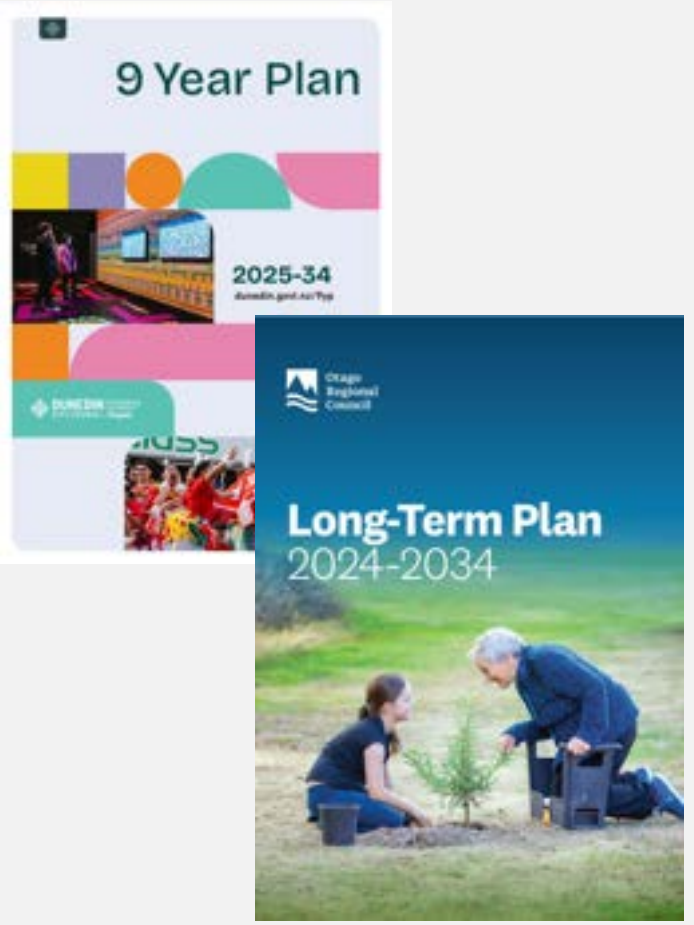
Following community engagement, further assessments, modelling, and economic analysis will refine the options and identify a single preferred future that best manages risk while enabling long-term opportunities. This future will form the basis of the Climate Adaptation Masterplan for South Dunedin.

South Dunedin Future Programme

Aligning SDF implementation with Long Term Plan

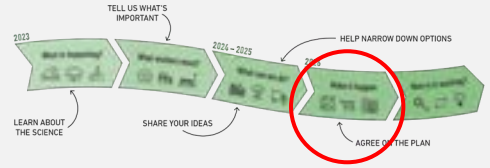


- **Purpose:** Use the upcoming LTP process to "ground-truth" the SDF work and enable an accelerated implementation of the climate adaptation master plan from 1 July 2027.
- **Situation:** SDF has identified a suite of short-, medium-, and long-term actions across three proposed adaptation futures. Critically, short-term actions are largely common to all futures, so planning for implementation can begin now.
- **Proposed approach:** Align the final SDF stage (preferred future and masterplan) directly with the LTP 2027–36 process. Working with infrastructure and planning teams to confirm what can realistically be delivered over the next 10–30 years. Once approved by Councils, use that data to populate short-term (2025-50) period of the masterplan; recalibrate later periods.
- **Outcome:** An adaptation master plan for South Dunedin (100 years); 'short-term' (next 25-30 years) actions included in Infrastructure Strategy and Water Services Delivery Plan; approved LTP budgets and workplans initial tranche of projects (next 10 years) ready to start in July 2027.



South Dunedin Future Programme

Connecting short, medium, long term

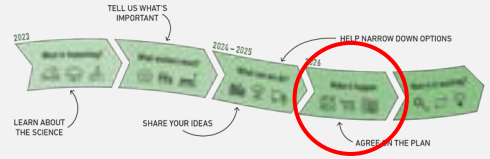


All three futures are broadly similar in the short term, focusing on infrastructure upgrades and preparing for potential land-use change.

Larger changes emerge over the medium term, including land raising, new development patterns, and expanded green and blue spaces. By the long term, major capital works reduce, while new housing in lower-risk areas supports future growth.

South Dunedin Future Programme

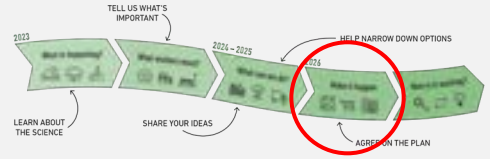
Short term actions are similar across all Futures



- **New and upgraded pump stations** added to divert flows from Hillside Road and MacAndrew Road to the harbour, including an upgrade of the Tainui pump station.
- **New rising mains** proposed along Midland Street, Orari Street, and Royal Crescent.
- **New pump station** at Hillside Road–Burns Stre
- et to service Forbury Corner, freeing capacity downstream and discharging to the Wilkie Road Conduit.
- **Trunk main upgrades** on Bay View Road, Marlow Street, and upper Hillside Road, plus a new Kirkcaldy Street trunk main to divert MacAndrew Road flows.
- **Network reconfigured** so flows are diverted upstream of the Tainui Pump Station, enabling conversion of Royal Crescent trunk main to a rising main.
- **Forbury Aqueduct twinned** from Forbury Road to the ocean outfall to increase capacity.
- **Overflow basin proposed at Tonga Park** to manage excess flows from the Forbury Road Aqueduct.
- **New stormwater storage proposed at Forbury Park**, with a Council Street trunk main to relieve pressure on Bellona Street.
- **Additional wider network upgrades** (mains, sump leads, megapits) included to further reduce flooding and maximise use of new infrastructure.
- Preparing for proposed land-use changes and redevelopment through:
  - **planning measures** (re-zoning, resource and building consent requirements, etc.)
  - **property acquisition** (strategy, delivery vehicle, funding and financing, etc.)
  - **project and development partnerships** (central govt, private sector, iwi, etc.)

South Dunedin Future Programme

Stage 5 - Preferred future, masterplan, and implementation



Jul
Oct
Jan
Apr
Jul

3 Proposed Adaptation Futures

Short term component of futures informs LTP work

Community engagement

Engagement analysis

MCA

Preliminary preferred future

Technical advice to DCC/ORC teams to help scope SDF short-term actions in LTPs

Supports development

Informs

Council paper on preferred future

Technical work to refine preliminary preferred future

Technical advice to DCC/ORC teams to help develop + cost SDF short-term actions (if any)

Supports development

Draft preferred future

SDF LTP Consultation Content

Input

Technical work to finalise preferred future and adaptation masterplan

Audit Consultation Docs

Informs

Informs

Informs

Council paper on adaptation masterplan

Finalise adaptation masterplan

Masterplan implementation

LTP Project and Budget Options I Y2-10 Budgets
Infrastructure Strategy and Water Services Strategy

Council Budget Meeting

Develop LTP + WSS Consultation Documents

Community Consultation

Hearings

Adopt

DCC LTP implementation

Direction and foundations

Scoping and development

Building and drafting

Consultation and hearings

Deliberations, finalisation, and adoption

ORC LTP implementation

Key

SDF

DCC LTP

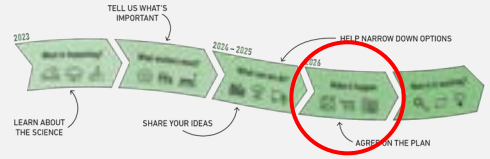
ORC LTP

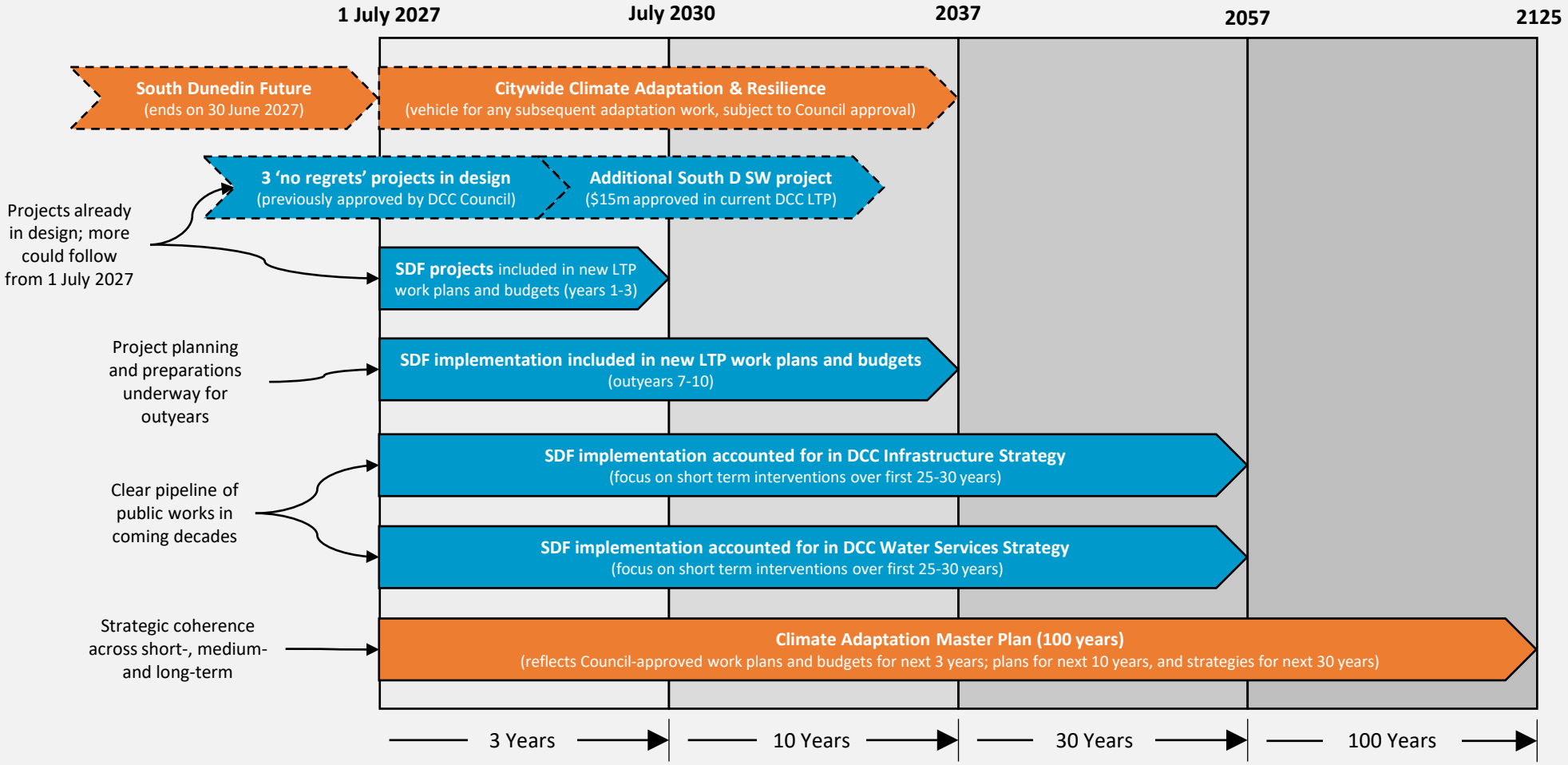
2026

2027

South Dunedin Future Programme

What would happen after South Dunedin Future?

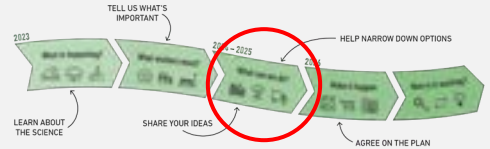




South Dunedin Future Programme

Council Presentation: 3 Proposed Adaptation Futures (10 June 2026)

South Dunedin Future Programme



Previous reporting to Councils

Report title	DCC report details	ORC report details	Key update(s) or decision(s)
SDF – Programme Update	Item 8, DCC Council, 23 November 2021	HAZ2109, ORC Council, 24 November 2021	Note current state assessment and planned activities during programme definition stage (4).
SDF – Interim Update	Item 8, Planning & Environment Committee, 4 April 2022	OPS2215, ORC Strategy and Planning Committee, 13 April 2022	Note key activities undertaken and pending workshop with Councillors. (3)
SDF – Programme Plan	Item 9, Planning & Environment Committee, 6 July 2022	OPS2223, ORC Strategy and Planning Committee, 13 July 2022	Note and endorse scope, governance, management, collaboration, and approve the SDF Programme Plan. (9)
SDF – Programme Update	Item 9, Strategy, Planning & Engagement Committee, 14 August 2023	HAZ2302, ORC Safety and Resilience Committee, 10 August 2023	Note key activities undertaken. (1)
SDF – Programme Strategy Update	Item 10, DCC Council, 28 November 2023	HAZ2302, ORC Council, 22 November 2023	Note activity update and approve revised SDF Programme Strategy. (4)
SDF – Risk Assessment & Adaptation Approaches	Item 6, DCC Council, 5 December 2023	GOV2343, ORC Council, 6 December 2023	Note South Dunedin Risk Identification Report and 16 Adaptation Approaches, endorse reports for community engagement, and approval for staff to engage. (13)
SDF – Programme Update (July 2024)	Item 9, DCC Council Meeting, 31 July 2024	GOV2419, ORC Council, 24 July 2024	Note key activities undertaken. (3)
SDF – Risk Assessment Update and Programme Changes	Item 10, DCC Council Meeting, 24 September 2024	GOV2430, ORC Council, 25 September 2024	Note information and data gaps causing delay to South Dunedin Risk Assessment. (4)
SDF – Risk Assessment and Potential Adaptation Futures	Item 7, DCC Council Meeting, 18 March 2025	GOV2531, ORC Council, 19 March 2025	Note South Dunedin Risk Assessment and 7 Potential Adaptation Futures, endorse reports for community engagement, and approve staff to engage. (12)
SDF – Community Engagement Results and Programme Update	Item 9, DCC Council Meeting, 30 July 2025	HAZ2504, ORC Council, 23 July 2025	Note the results of the community engagement and SDF work plan. (4)
SDF – Shortlist of Potential Adaptation Futures	Item 10, DCC Council Meeting, 23 September 2025	HAZ2509, ORC Council, 24 September 2025	Note the process and outcome of shortlisting, note Futures 3, 4, and 5 will be advanced, and note work plan. (7)