



**PUBLIC EXCLUDED  
COUNCILLOR WORKSHOP**

**AGENDA & SUPPORTING MATERIAL**

**Commencing at 11.00am  
Wednesday 5 February 2025  
Council Chambers**

<b>MEETING</b>	<b>PUBLIC EXCLUDED COUNCILLOR WORKSHOP</b>		
<b>Date</b>	Wednesday 5 February 2025	<b>Time</b>	Commences at 11.00am
<b>Location</b>	Council Chambers		

<b>AGENDA</b>			
11.00am – 12.00pm	Upper Selwyn Hutts – <b>Documents 1a, 1b and 1c</b>	Tim Harris	

Meeting ends –12.00pm

# Upper Selwyn Huts

## Engagement Update

Image Source: Wikipedia, Turnagra.



# Background

Fisherman's huts constructed in 1880's for limited use, over time and accelerated by the Canterbury Earthquakes many huts are now permanent residences. The land is Crown land and Selwyn District Council is responsible for administering this on behalf of the Crown.

Following discussions from December 2017 – May 2019 connected to wastewater conversations at the time Council unanimously determined on **8 May 2019**, that 'Hut licences and subsequent renewals are short term and ultimately for a finite period' .

Safety concerns led to a decision to remove the Upper Selwyn Huts.

These concerns include:

- The huts were not designed for permanent habitation and are not set up for safe permanent residency. There are challenges with compliance and safety for the residents which needs to be addressed.
- Expected increased weather events will limit access into and out of the area. This poses a danger to the USH Community being cut-off from support during emergency events and increases the risk to Civil Defence teams.
- The two other lakeside communities face similar challenges and there is merit in having an approach that has some consistency.

Since May 2019, there have been ad hoc conversations and ongoing extensions to the Deed Of Licence, until 14 July 2024 when the decision was made by this Council to work through a consultation and engagement process with the community.

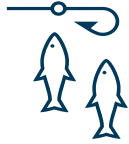


# Community Profile



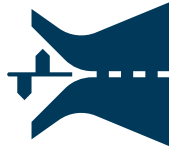
96

Total number of properties



12

Holiday homes



7

Roads

- 1. Spackman Avenue
- 2. Anderson Ave
- 3. Moorhouse Ave
- 4. Billens Ave
- 5. Bruce Ave
- 6. Olliver Ave
- 7. Meddings Ave

## Property Ownership



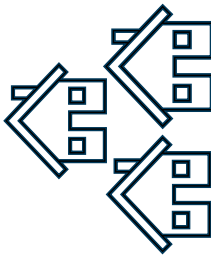
1 Property

79



2 Properties

4



3 Properties

3

Total Capital Value \$7,680,000

	Capital Value	Improvement Value
Lowest	\$42,000	\$15,000
Highest	\$116,000 / \$350,000	\$116,000 / \$232,000
Average	\$77,000 / \$80,000	\$50,000 / \$51,885

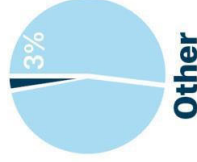
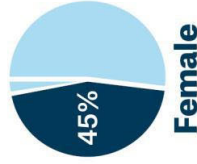
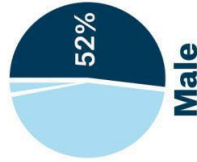
Upper  
Selwyn  
Huts





Median age **59.3 years**

**43%** of the population are aged between **60 - 74**



**Ethnicity**

88% European  
8% Māori  
2% Other

**Education**

28% No qualification  
72% Level 1 Certificate or above  
3 people hold PhD's

**Marital Status**

18 people partnered  
60 people single  
(divorced, widowed, never married)

**Employment**

34% Full time  
7% Part time  
6% Unemployed  
53% Not working

Upper  
Selwyn  
Huts



# Engagement

- 4 Licence holder meetings (last one December 2024)
- 4 Committee meetings
- 5 Drop ins with over 20 hours of conversations involving around 25 people
- One family session
- Over 450 emails
- Over 2000 website views



# Community Meeting Topics



## Engagement direction

Summary and recap of what led us to here. Scene setting and commitment to move forward.



## Agreed priorities and trigger points

Interactive discussion with the community on what signals, triggers, and adaptation thresholds could be adopted or adapted to suit the community.



## Refining the options

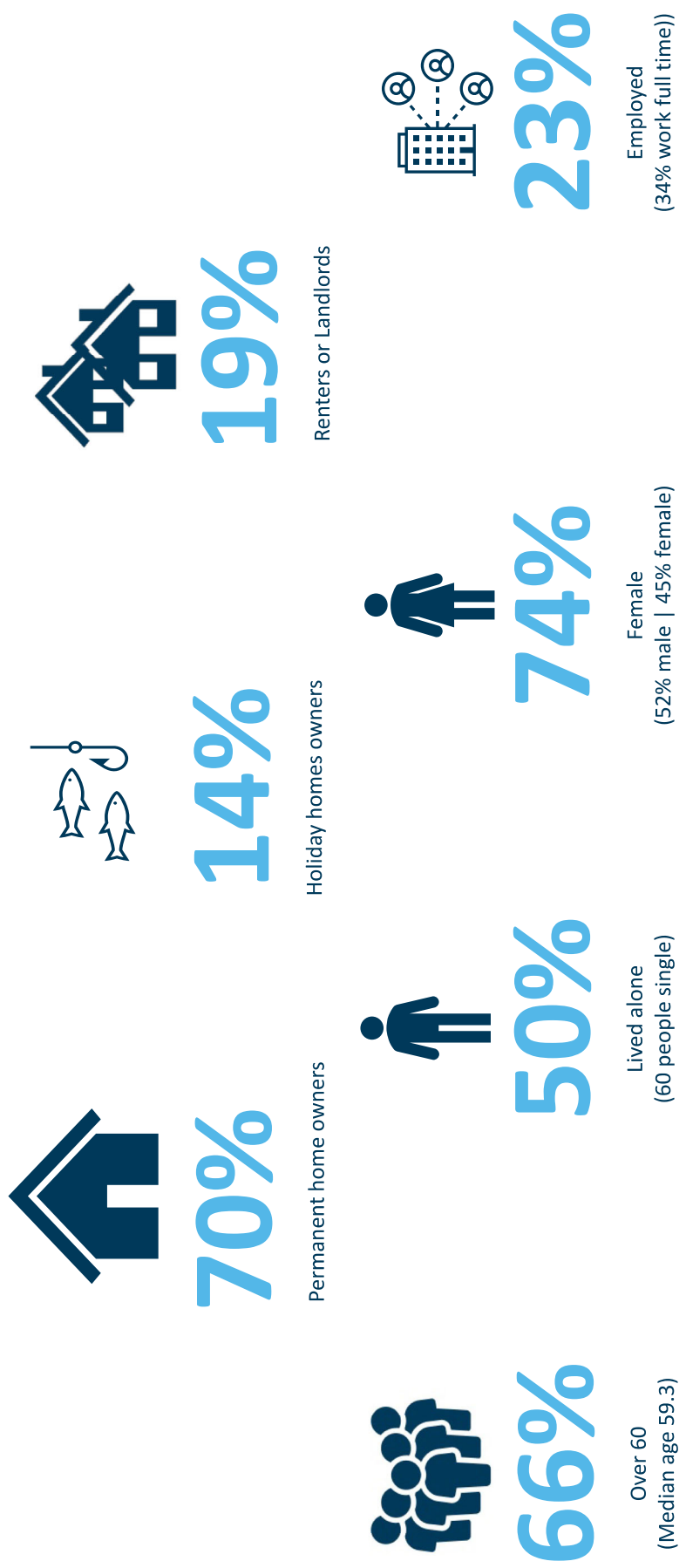
Using the feedback received in sessions 1 and 2 to further refine the options to best suit the needs of the community.



## Agreed approach

The final session will be an opportunity to hear from the scientists and engineers on the flood risk to the settlement. It will be the last session prior to the drafting of the Statement of Proposal.

# Who we've spoken to (compared to Census data)



# Thoughts from the Community

Need for greater certainty

Bias news coverage

Emotional and financial investment concerns

Knew the licences were finite but did not expect them to NOT be renewed

Very limited or no savings – coupled with low earning potential

Healing and relaxation benefits

Relying on the equity and now struggling to sell

Change in character since fences have been installed

Upper  
Selwyn  
Huts





# Feedback



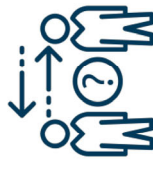
Deed of Licence



Building Inspection



Wastewater Pipeline



Settlement Retreat



Climate Change Risk



Mitigation



District Wide Rate



Heritage Status

Upper  
Selwyn  
Huts

# Stakeholder Update



## Lower Selwyn Huts

Concession process is underway for those who wish to stay on the reserve.



## Greenpark Huts

Progressing as planned and still on track to move out later this year.



## Department of Conservation

View remains that Selwyn District Council administer the land. We continue to keep them up to date.



## Te Taumutu Rūnanga

Continue to be connected.

**Upper  
Selwyn  
Huts**



## Next Steps:

- Final License Holder Session
- Drafting of documents including updated Deed of Licence
- Formal engagement around March/April 2025

## Confirmation of direction from Council



# Upper Selwyn Huts Climate Assessment

Andrew Dark  
Aqualinc Research Ltd  
7<sup>th</sup> December 2024

**aqualinc**

# Presentation outline

- What did the assessment cover?
  - How it relates to district-scale climate assessments
- Lake Levels – method and results.
- Groundwater – method and results.

# What did the assessment cover?

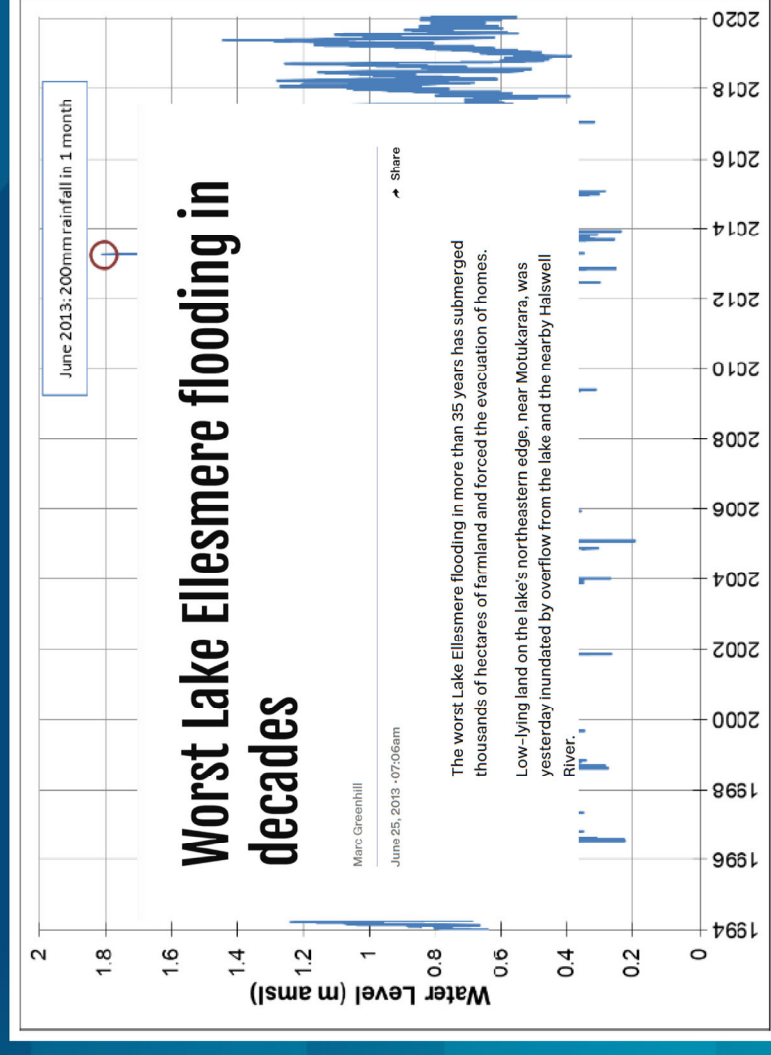
- Previous district-scale assessments
  - 2016, 2020, 2023
  - Identified relevant issues but limited detail due to district-wide focus
- Te Waihora / Lake Ellesmere water levels
  - Sea level rise
- Shallow groundwater and groundwater flooding
  - Future climate
  - Sea level rise
- River flooding was not specifically in scope.





# Te Waihora / Lake Ellesmere levels

- Levels are in the 0.4 – 1.2 m range 95% of the time.
- June / July 2013
  - Lake level reached 1.8 m above sea level
  - Due to high rainfall and inability to open the lake outlet
- Key assumption:
  - If this combination of events occurred again with a higher sea level, the lake level will end up higher.



# Sea level rise projections

- NZ SeaRise project (<https://www.searise.nz>)
  - Location-specific sea level rise projections for the whole NZ coast.
  - Includes vertical land movement
  - A range of projections:
    - Different emissions pathways
    - Confidence intervals (we've considered the *most likely* range)

Scenario	Year	Percentile		
		17 <sup>th</sup>	50 <sup>th</sup>	83 <sup>rd</sup>
SSP2-4.5 + VLM (medium confidence)	2050	0.10 m	0.26 m	0.42 m
	2100	0.32 m	0.64 m	0.98 m
SSP5-8.5 + VLM (medium confidence)	2050	0.14 m	0.29 m	0.46 m
	2100	0.55 m	0.90 m	1.30 m

# Mapping method

- 2023 digital elevation model from LiDAR aerial survey
  - Highly accurate ground levels
- Mapped area lower than 1.8 m above sea level
- Added sea level rise and re-mapped:
  - SSP2-4.5 and SSP5-8.5
  - 2050 and 2100

## Mapping Results

- Inundation extent for SSP2-4.5
- Mid-century:
  - Days Road access
- Late-century:
  - More widespread flooding

SSP2-4.5 + VLM in 2050



SSP2-4.5 + VLM in 2100





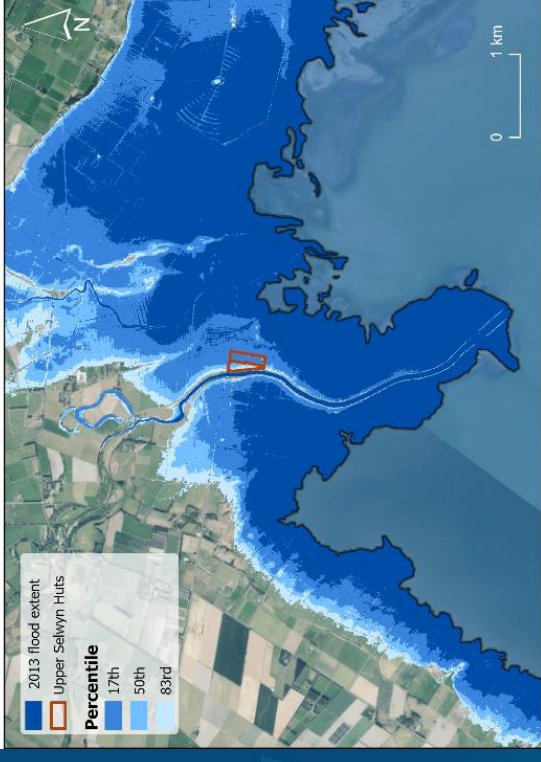
## Mapping Results

- Inundation extent for SSP5-8.5
- More wide-spread flooding predicted

SSP5-8.5 + VLM in 2050



SSP5-8.5 + VLM in 2100





# Mapping Results

- Water depth with 2050 sea level rise

SSP2-4.5 + VLM (50th percentile) in 2050



SSP5-8.5 + VLM (50th percentile) in 2050



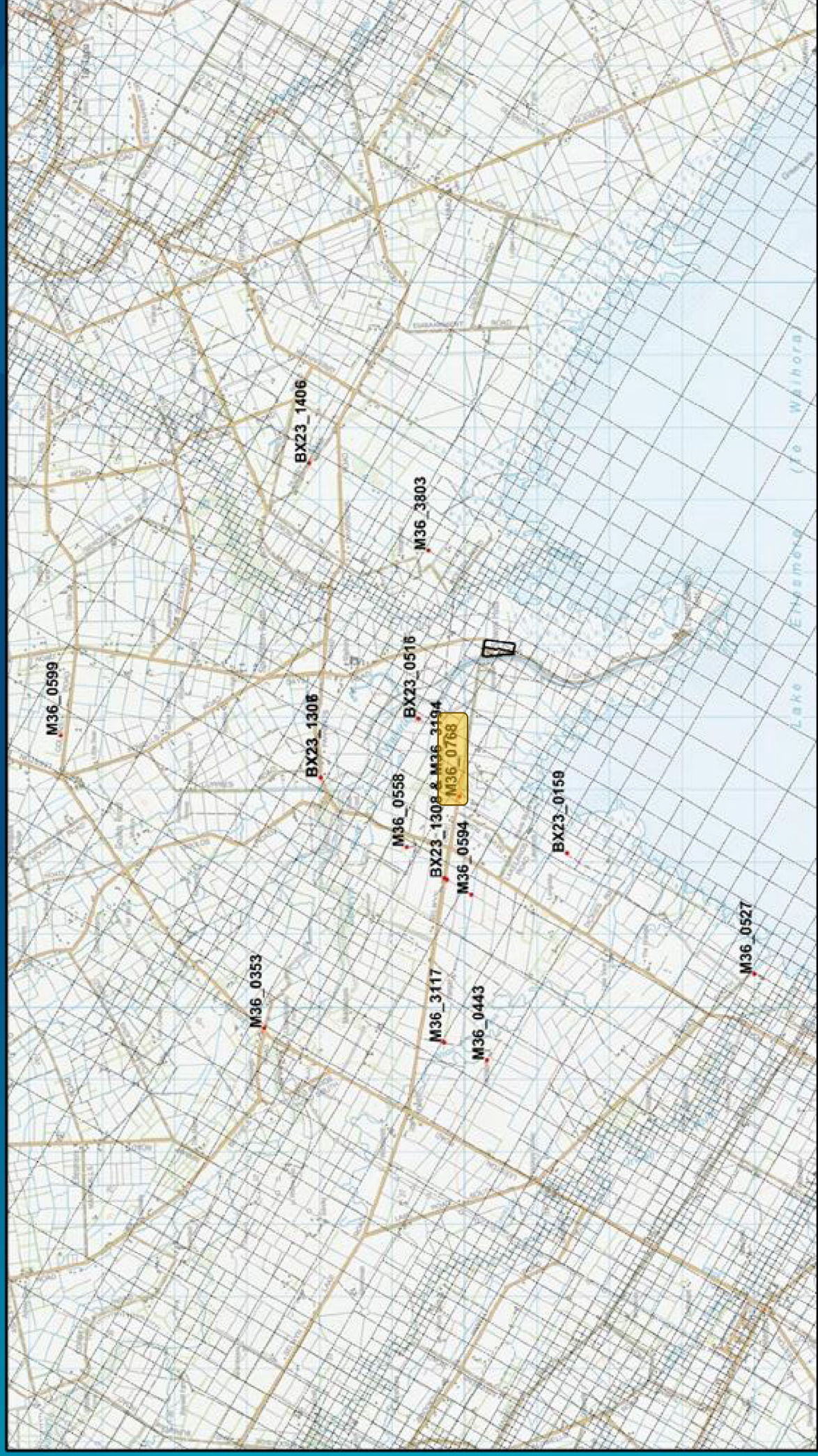
## Te Waihora levels: key messages

- A 2013-type event with higher sea levels will result in a greater extent and depth of flooding.
- Issues with access to Upper Selwyn Huts in scenarios where the huts themselves are not flooded.
- Climate change could result in worse impacts than those shown.
- Questions?

# Groundwater

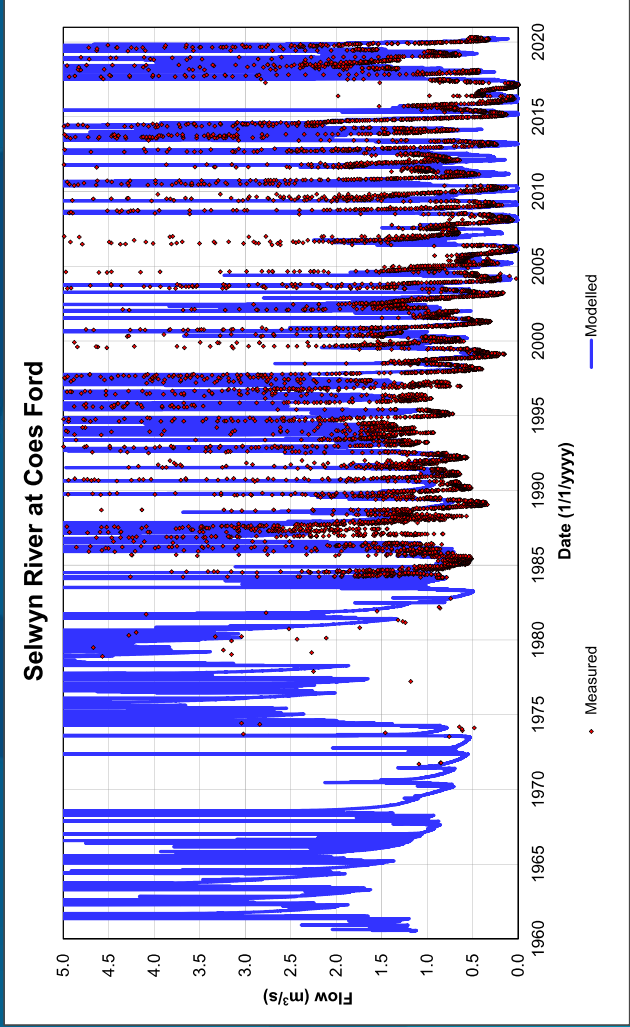
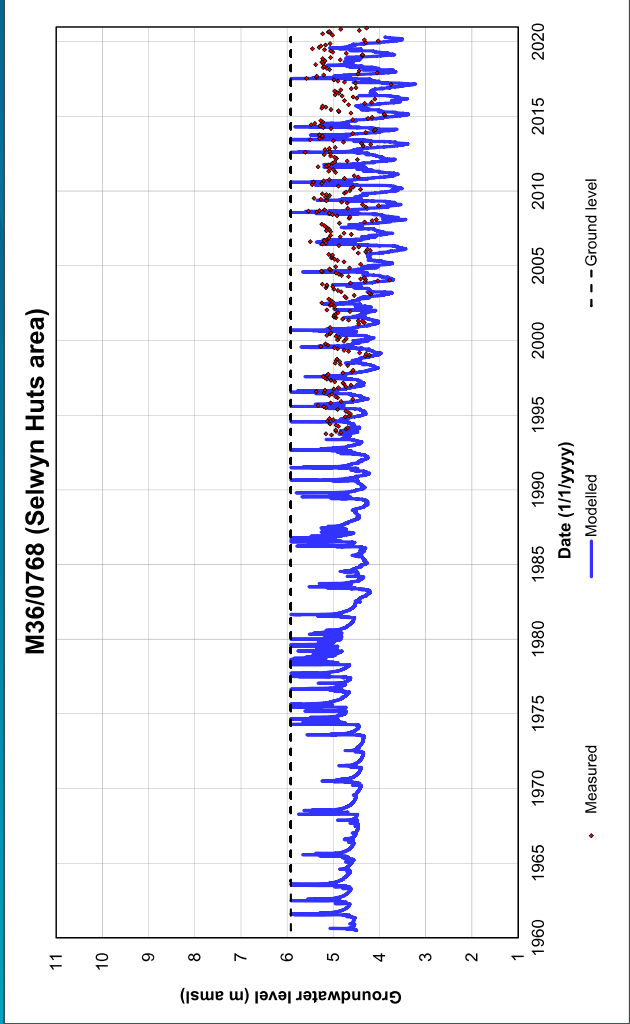
- Shallow groundwater as a hazard:
  - Groundwater flooding: can be longer-lasting than river floods
  - Damage to road materials and building foundations
  - Health issues from rising damp
  - Damage to crops and other plants
- Numerical simulation of the groundwater system
  - Model developed over 20+ years
  - Local refinement of the model for this project
  - Calibration to measured data, back to 1960
  - Simulation with projected future climate (from NIWA) to 2100







# Model calibration to measured data





# Model scenarios

- Future climate
  - With and without sea level rise (using SSP5-8.5 median projection)
- Steady-state simulation:
  - Gives averaged water level surfaces – good for understanding spatial extent of impacts
- Long-term time-varying simulation:
  - Shows how groundwater levels vary at a point over time

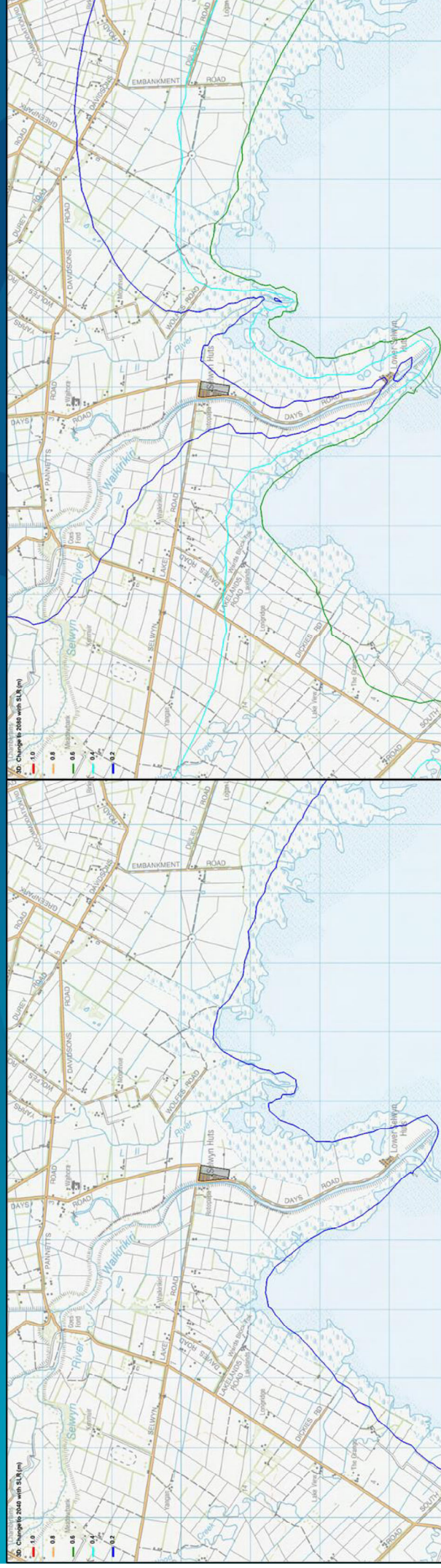
## Historical modelled groundwater levels

- Areas where groundwater is within 0.3 m of ground level (on average).
- Note that levels vary over time.
- Areas outside of the shaded zone may also experience groundwater close to the surface at times.



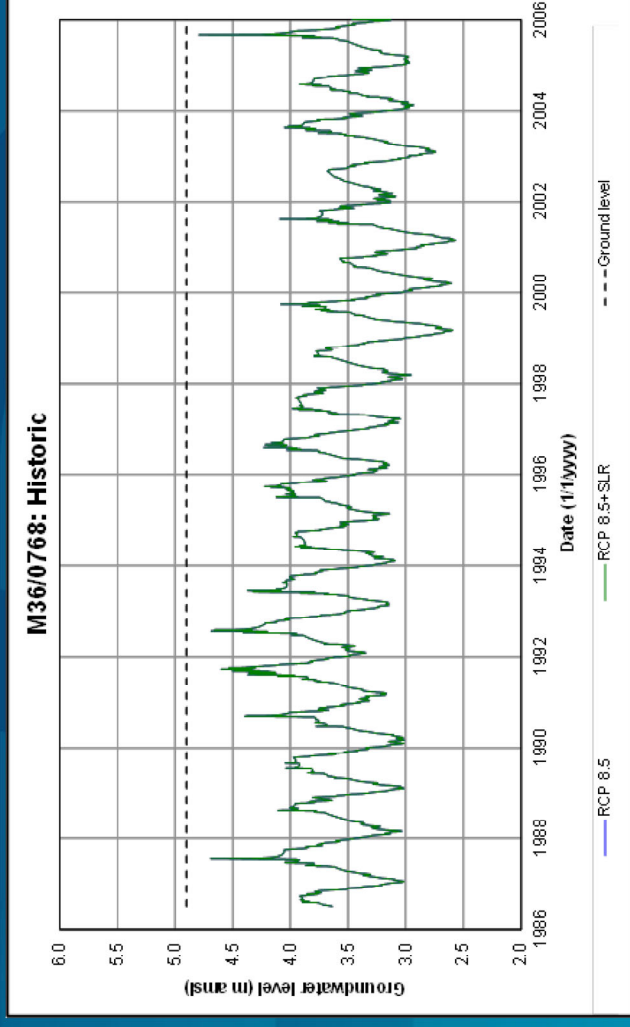
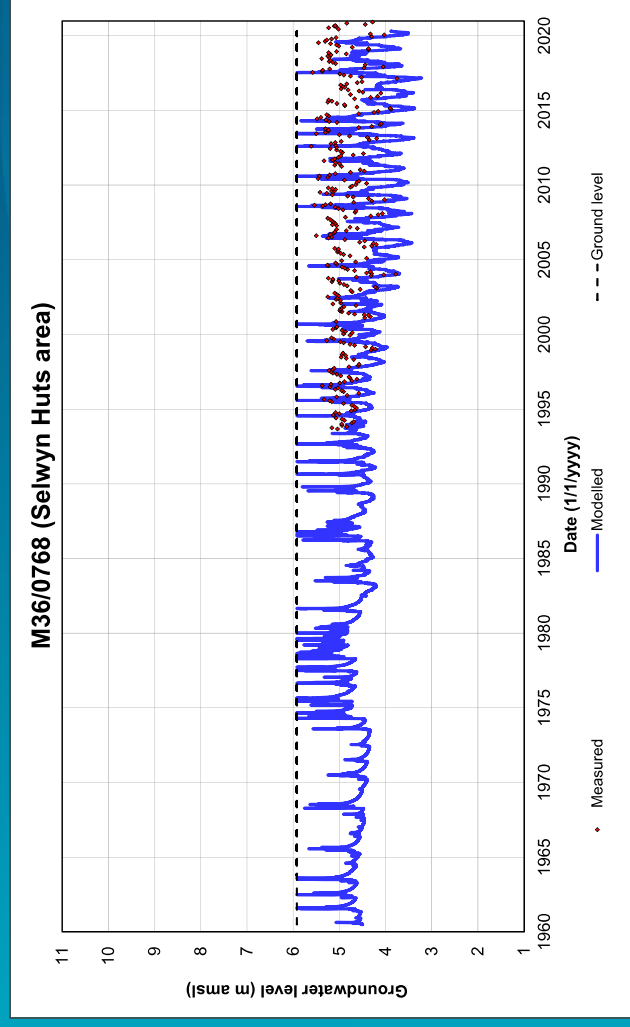


## Modelled changes to average groundwater levels



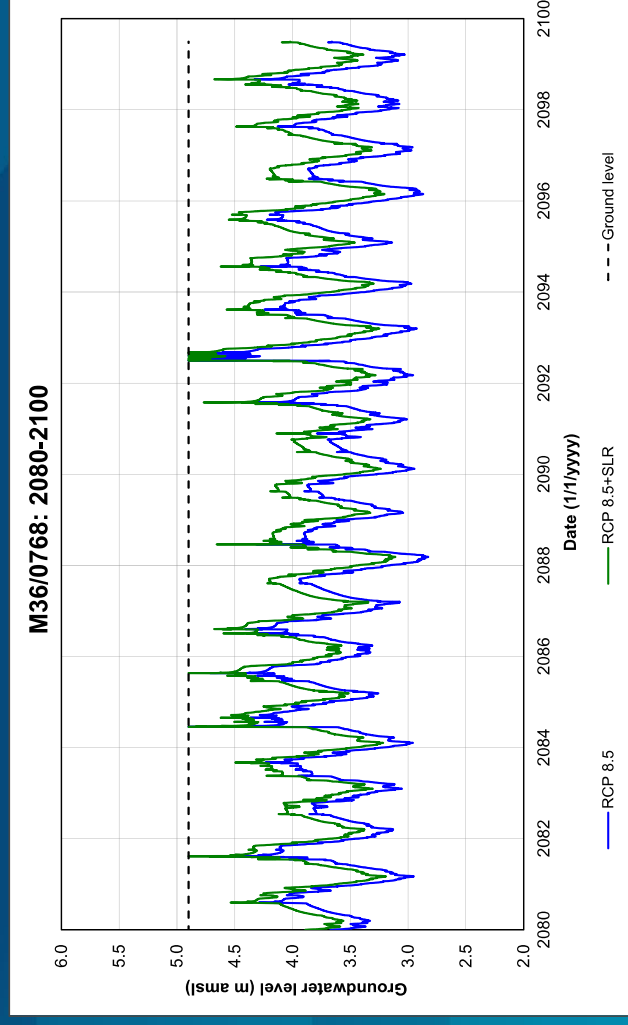
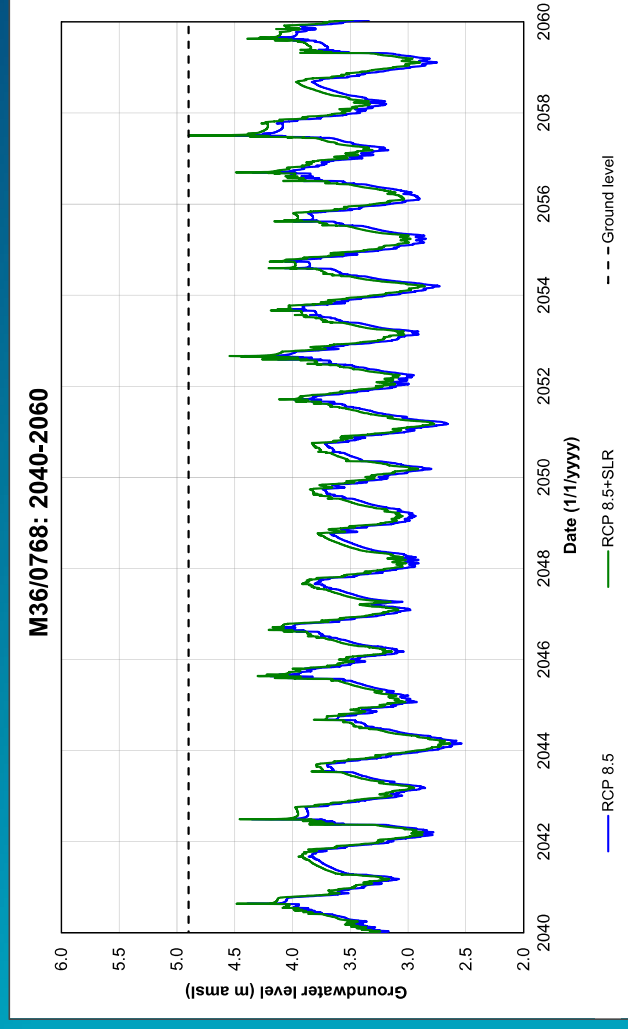
- Changes to the average result in changes to extremes: very high groundwater levels will occur more frequently, for longer.

# Modelled groundwater levels over time



- Simulation based on **modelled** historic climate gives lower levels overall than simulation with **measured** past climate (calibration scenario).
- **Changes** between scenarios are the key result

# Modelled groundwater levels over time: historic period



- Slight reduction in water levels without sea level rise.
- Sea level rise results in overall rise: increased frequency and duration of high groundwater levels.



# Groundwater: key results

- Shallow groundwater on the lower plains is tightly linked to Te Waihora / Lake Ellesmere levels.
- Higher lake levels as a result of sea level rise will result in higher groundwater levels:
  - Higher frequency of very high groundwater levels
  - Longer duration of groundwater at very high levels
- Greater potential for hazard and nuisance impacts:
  - Groundwater flooding
  - Damage to infrastructure and buildings
  - Health impacts
- Questions?

## Upper Selwyn Huts Engagement Summary

<b>Date:</b>	23 January 2025	Level 2, Wynn Williams Building
<b>Project name:</b>	Upper Selwyn Huts	47 Hereford Street
<b>Project no:</b>	IA325600	Christchurch Central 8013
<b>Attention:</b>	Tim Harris	PO Box 1147
<b>Company:</b>	Selwyn District Council	Christchurch 8140
<b>Prepared by:</b>	Monique Eade	New Zealand
<b>Reviewed by:</b>	Andrew Henderson	T +64 3 940 4900
<b>Document no:</b>	IA325600-NC-MEM-0002	<a href="http://www.jacobs.com">www.jacobs.com</a>
<b>Revision no:</b>	1	
<b>Copies to:</b>	Sarah Carnoutsos, Chris Mene	

## Introduction

Jacobs were engaged to support Selwyn District Council engage with the Upper Selwyn Huts and occupants on the proposed Deed of Licence. The proposed Deed of License was proposed to be a finite agreement with a transition from the huts included in the Deed of Licence. This would mean that at the expiry of the Deed of Licence residents would be required to retreat from the settlement.

One of the key drivers for retreat was the anticipated impacts from climate related hazards. SDC have since received technical presentations from Environment Canterbury and Aqualinc that show the risk is not as significant as previously thought. Given this, the work and related engagement process, are currently on hold pending further direction from the Council after a review of the updated information.

This memorandum has been prepared to summarise the engagement and work undertaken to date.

## Technical Memorandum

## 1. Who lives at the Upper Selwyn Huts?

The 2023 census<sup>1</sup> provides an official count of the population of New Zealand. It is undertaken every five years. The 2023 census provides a summary of make-up of the Upper Selwyn Huts. There are limitations with the census data, but we have found the results are broadly representative of those we engaged with through this project or who we are aware of through engagement with others through the project.

### 1.1 Population

The 2023 census shows that there is a population of 93 people residing at the Upper Selwyn Huts. The median age at the Upper Selwyn Huts is 59.3 years old, compared with 38.1 years for the rest of New Zealand. Of note there are no residents recorded as being in their 20s within the Upper Selwyn Huts. This is consistent with what we found through engagement; however, this figure is dissimilar from the rest of New Zealand. Figure 1 shows the breakdown of the population by age group.

The Upper Selwyn Huts overwhelming identify as being European (96.8%)<sup>2</sup> with 9.7% identifying as both Māori and European.

9.1% of the Upper Selwyn Hut population between 30-64 years have an activity limitation<sup>3</sup> compared to 5.4% nationally. 12.5% of the Upper Selwyn Hut population between 65 years and over have an activity limitation compared to 17% nationally.

A high proportion of the settlement are non-partnered (76.9% compared to 45.3% nationally).

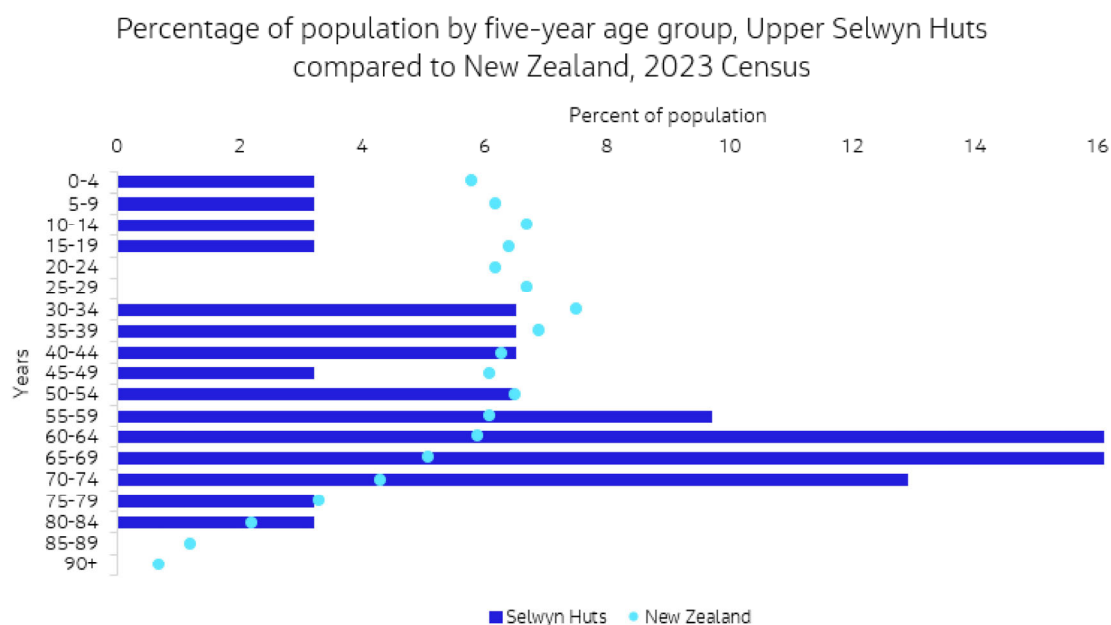


Figure 1: Percentage of population by 5-year age group, Upper Selwyn Huts and New Zealand

<sup>1</sup> (Stats NZ, 2024)

<sup>2</sup> Combined New Zealand European (90.3%) and Other European (6.5%)

<sup>3</sup> Activity limitation includes: difficulty seeing, hearing, walking or climbing stairs, remembering or concentrating, washing all over or dressings, and communicating.

## Technical Memorandum

### 1.2 Housing stock

The 2023 census data shows that 60% of the dwellings are two-bedroom homes, 20% are single bedroom homes and 20% are three-bedroom homes. On the night of the census 60 homes were occupied and 33 were unoccupied.

78.9% of houses are recorded as having one usual resident. 15.9% have three usual residents or more including six homes that are recorded as having children.

### 1.3 Income

The median personal income is \$25,600 compared to \$41,500 per year nationally. Those living at the Upper Selwyn Huts between 30-64 years old earn disproportionately less than the New Zealand median (\$32,200 vs \$57,900). There is no recorded income for those under 30 years old as there are no individuals registered within this age group. Figure 2 shows a breakdown of income.

28.6% of the settlement are in full time employment compared with 51.2% nationally. 57.1% of the settlement are not in the labour force.

85% of households own their own homes or the home is held in a family trust. This suggests that approximately 15% of homes within the settlement are used as rentals.

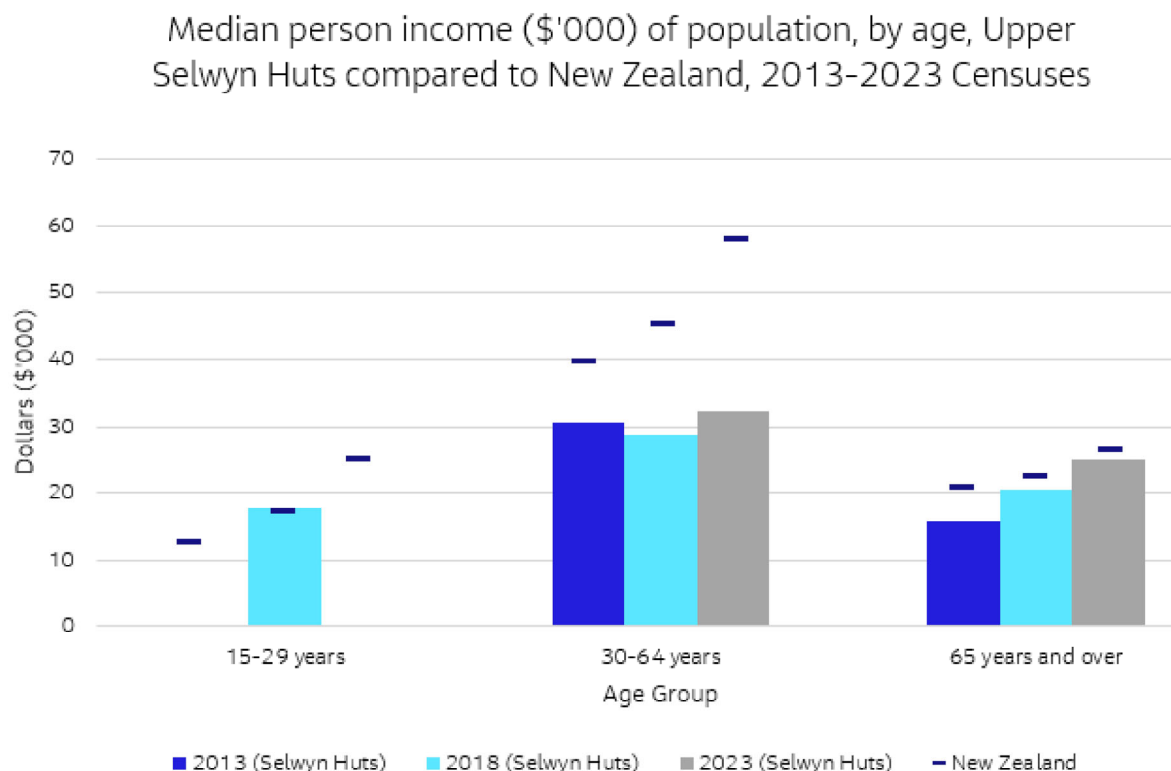


Figure 2: Medium personal income Upper Selwyn Huts compared to New Zealand

Technical Memorandum

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## 2. Engagement summary

The following engagement sessions were held over a three-month period (August-December 2024).

### 2.1 Review of the inbox

Feedback was provided to the [huts@selwyn.govt.nz](mailto:huts@selwyn.govt.nz) inbox. Jacobs reviewed all feedback received prior to 26 August 2024 and was provided with additional feedback received after this date where the additional feedback raised issues that had not already been identified in the earlier feedback. Overall, the feedback included responses from 105 individual hut owners or occupiers. We do not have addresses for all respondents so cannot confirm how many individual huts this represents. A total of 455 feedback points were summarised. This summary is provided in Appendix A. This feedback informed the August-December engagement.

### 2.2 Committee meetings

Monique Eade and Chris Mene met with the Upper Selwyn Huts Residents' Committee four times over this period. The Committee requested in-person meetings held on the weekends at the Upper Selwyn Huts. The meetings were scheduled for two hours but generally ran a little over this.

It is our experience that the Committee represent a portion of the community but are not necessarily representative of the whole Upper Selwyn Huts community. This view was expressed by a number of the community and was apparent from the differing views gathered throughout this process. With this in mind the Community Meetings proved a useful mechanism for engaging with a group of the community but should not be seen as a substitute for engaging with the community as a whole.

The Committee requested the following topics be covered off as part of the engagement:

1. When discussing the term of the Deed of Licence, the Committee want the Upper Selwyn Huts to be referred to as a Local Purpose Hut settlement.
2. Replacing the Council owned reticulation system and adding this cost to the Districtwide Rate.
3. Building inspections
4. Trigger points for climate change
5. Mitigation options
6. Relocation/compensation if previously agreed climate change trigger points mean we must leave
7. Historic significance of the settlement
8. Compensation for our legal fees
9. Removal of the word 'finite' from all documents.

The extent to which these topics have been covered off is discussed in the sections below.

Meetings with the Committee were held on:

- Chris' initial meeting with the Committee – Upper Selwyn Huts Community Room
- Saturday 21 September 2024 – Upper Selwyn Huts Community Room
- Saturday 9 November 2024 – Upper Selwyn Huts Community Room
- Saturday 30 November 2024 – Upper Selwyn Huts Community Room



## Technical Memorandum

## 2.3 Licence holder meetings

Three Licence Holder Meetings were planned, but due to the volume of content requested to be covered by Licence Holders this was extended to four meetings. Attendance ranged between 22 and 40 people, although not everyone in attendance signed the register, and the head counts should be considered indicative only due to people arriving late. A mixture of weeknight and weekend meetings were requested however there was no obvious difference in the numbers of those attending between the Wednesday night and Saturday morning meetings.

There was a small group who attended all of the meetings and this group was joined by a few others at each session. We received feedback that not everyone felt comfortable attending the Licence Holder Meetings and/or feared speaking openly in the public forum.

Licence Holder Meetings were held on:

- Wednesday 28 September 2024 – Soldiers Memorial Hall
- Saturday 19 October 2024 – Lincoln Events Centre
- Wednesday 27 November – Selwyn District Council
- Saturday 7 December – Lincoln Events Centre

Minutes and presentations are available on the SDC website for all meetings.

## 2.4 Drop-in sessions

The drop-in sessions were scheduled for four hours each and generally ran for five hours each. They were very well attended with back-to-back people in all sessions. For the later sessions we ran two parallel streams to cater for the demand. The sessions helped to understand the range of people within the community and variety of views.

We met with 49 different people at these sessions who represent approximately 35 unique huts. Table 1 provides an indicative summary of who we met with versus who is recorded as living in the settlement through the census data. Additional to the hut owners and occupants we also spoke to one local water contractor and one potential purchaser.

We know of at least eight houses that are rented out but only spoke to 3 landlords and 1 renter. The census data suggests approximately 14 houses are rentals based on the number of people who do not own their house.

**Table 1: Attendance at the Drop-in sessions compared to the 2023 Census Data**

Indicator	Census data	Who we spoke to
<b>Permanent residents</b>	93 people usually resident.	45 people who resided at the huts permanently across 28 different huts.  80% of the people we spoke to live permanently at the huts.
<b>Live alone</b>	77% do not have a partner/spouse.	53% of the people we spoke to live alone.

## Technical Memorandum

<b>Median age</b>	Median age is 59.3 which means 50% of the population is over 60.  12.8% of the population is under 20.	53% of the people we spoke to were over 60.  14% of those we spoke to were under 18.
<b>Rentals</b>	15% of residents don't own their home (approximately 14 huts).	We spoke to 3 landlords and 1 renter. We know of at least 8 huts that are currently rented out.
<b>Housing tenure</b>	Approximately 50% of the houses had changed hands since the 2019 finite decision.	47% of those we spoke to had owned their house for less than 5 years. 17% had an historic connection with the community and the hut had been passed down through the generations.
<b>Families</b>	12 families (includes couples with or without children).	We spoke to 11 families including 5 with children living at the settlement.
<b>Male</b>	51.6% of the settlement are male.	41% of those we spoke to were male.

The table above highlights that we have spoken to a wide range of hut owners and those we spoke to broadly aligned with the census data of who lives at the settlement. By the final engagement session, we found that the range of views being expressed mostly repeated views we had heard in earlier sessions suggesting that we had heard a fairly comprehensive range of views.

A summary of some of the themes is provided in Section 2.4.1.

Drop-in sessions were held on:

- Tuesday 1 October 2024 – Upper Selwyn Huts Community Room
- Monday 7 October 2024 – Upper Selwyn Huts Community Room
- Tuesday 5 November 2024 – Upper Selwyn Huts Community Room
- Monday 11 November 2024 – Upper Selwyn Huts Community Room
- Saturday 30 November 2024 – Upper Selwyn Huts Community Room (including separate kids' session).

### 2.4.1 Summary of drop-in feedback

The drop-in sessions were held in confidence and the information provided below has been summarised to ensure individuals are not personally identifiable. Monique and Chris took detailed notes in these sessions. These are held confidentially to protect the individuals providing the feedback. Our notes were collated and aggregated to provide the summary of what we heard below. It needs to be qualified that as these are not quoted verbatim and that they summarise our best understanding of what we heard. While best endeavours were made to ensure the accuracy of what we heard there is the potential that views have been misinterpreted.

The views summarised below were shared by more than one member of the community.

## Technical Memorandum

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### Theme 1 – Changing community

The community is diverse and includes people from a variety of backgrounds. 50% of the huts have changed hands since 2019 and this has changed the makeup of the community. There are currently concerns that different members of the community are pushing their own agenda onto the community.

Many are critical of the Council for allowing the huts to be occupied permanently and for allowing the huts to be rented out. It is recognised by members of the community that it is unlikely that these decisions can be reversed but they consider that these changes have caused some of the issues. There are mixed views as to whether the move to allow permanent occupation and renting have been for the better. Some are worried that the settlement is deteriorating; more fences, less community activities, more mess accumulating on sections. Some feel fences are being erected to hide the activities that are occurring behind the fences which others have built fences to put a barrier between themselves and their neighbours due to clashes with their neighbours. Some said neighbours have been bullied into leaving the settlement. Some fences have blocked off alleyways and a number of alleyways no longer get mowed. Others said the changes have enabled a supportive community to form. Despite this, others have not expressed a strong preference to stay in the same community if they do have to move.

Several were critical of the decision to allow people to own multiple properties as they feel that public land should not be able to be used to generate an income. There have been issues with antisocial behaviour linked to some of the tenants in the past and some suggested that those renting through an agency has worked better in general (noting some exceptions). There was also concern that renters are generally less involved in the community which jeopardises the perception of a tight-knit community.

### Theme 2 – Low-income settlement

Many licence holders bought licenses in the settlement as an investment for their future. They do not want to retire with a mortgage or cannot afford to pay rent or a mortgage elsewhere. Despite being mortgage-free living at the Upper Selwyn Huts there are some who struggle to make ends meet day-to-day and have little or no savings to retire with. Some have made employment/retirement decisions based on the expectation that they can live out their days mortgage-free at the settlement. They enjoy being independent and have no desire to rent or live in social housing elsewhere. They like owning their own hut as they can save, and living at the huts has meant they can avoid the poverty trap of renting. There is a very mixed understanding of what a Deed of Licence entails with several purchasing their licence based on an understanding that licences were in perpetuity.

If they can no longer reside at the huts some will be homeless. Others have family they can move in with but don't want to burden their children. They had intended to sell their hut to provide an inheritance to their children or gift their hut to their children. Some are worried about leaving their children in debt.

The settlement has a high proportion of single occupant dwellings. Of these some have moved after separating from their long-term partner or being widowed. Any settlement money was used to purchase at the Upper Selwyn Huts, and they have limited earning potential to re-establish themselves elsewhere. Several commented that there is a real shortage of low-cost housing or rentals in Selwyn and many preferred to live in Selwyn due to work commitments.

### Theme 3 – Health and social issues

The community is made up of a high proportion of single occupiers. Those we spoke to said the community is very supportive, and that they look after each other. Some of these occupiers have physical or mental health issues which would mean they may struggle to live in other communities without this support. Some noted that the 'country feel' of the area has been healing for those recovering from health issues. The stress from the process has caused some additional health challenges, with some opting to move away to protect their health.

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It was acknowledged that some in the community have alcohol and/or drug dependencies or have social issues. However, the community expressed that these are the minority, and the community should not be judged based on them. There was concern that without the support of the community some residents may end up in prison.

It was also noted that some community members have limited reading or writing capacity and others will need support to make future decisions for themselves.

### **Theme 4 – Mixed understanding of what a Deed of Licence entails**

Some chose not to get LIMs prior to purchasing their licenses and others were advised by their lawyers not to buy but chose to do so anyway. Most love living at the huts and do not regret their decision to buy. There is a split in opinion as to whether living on a reserve is a "privilege" or a "right."

Many understood that a Deed of Licence was not land ownership and there was the chance a time would come that the licence would not be renewed. However, there was an expectation that given the licence had been renewed for over 100 years that this would continue to be the case. Others bought not aware that a Deed of Licence did not guarantee them permanent residence. There is a strong sense of ownership and belonging.

Some advocated for much clearer messaging and guidance from Council for those looking to purchase at the Upper Selwyn Huts. It needs to be clear that people are purchasing the hut only and the right to locate the hut on the site for the term of the licence.

### **Theme 5 – Deed of Licence Terms**

Many raised concerns with the details of the Deed of Licence. Many asked for a 30-year term. This was often to enable them to sell, or to live out their days at the settlement. Some suggested that the previous Deed of Licence was fine it just needed better enforcement. The community believed that if these conditions were enforced the community would be a tidier place. For example, the number of cars parked on properties.

Many did not like the idea of having to pay to remove their hut from the site due to their emotional connection to the place. They were unwilling to see their home destroyed. Others thought this was only fair and that it shouldn't be on the rest of the District to fund this.

Some found the Code of Conduct belittling, but others have complained about the behaviour of other residents. Some felt that the reason the licences were finite was due to the conflict between some members of the community and the Council.

### **Theme 6 – Building inspections**

There is concern that the building inspections are a way of terminating leases prematurely. The community expressed a strong mistrust in Council. Some are still questioning the legality of the building inspections and do not want this to occur at all.

Some do see the merit in inspections as they note the settlement has a lot of substandard housing. Some are open to receiving advice on what can be done to improve the safety or warmth of their house as they don't want non-compliance to be a reason for terminating the licence. Some are also concerned that they will not be able to afford to pay for the repairs if the house fails the inspection.

Those in support of the inspections feel electrical inspections should be included in the inspections due to the potential fire and health and safety risk. There has also been concern raised about the dampness of some houses due to groundwater or the diversion of water from other properties.

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### Theme 7 – Triggers-based approach

A triggers-based approach to retreat is outlined in Section 4. This approach was new to most community members. There is some fear that Council would set harsh or unrealistic trigger points.

There are mixed views in the community about climate change. Some do not believe in climate change while others believe the IPCC<sup>4</sup> are being too conservative in their modelling. Some have observed differences in the local climate including ponding and increase in waterlogged soils and increased dampness in houses.

Some have experienced self-initiated retreat from other areas due to a deterioration of conditions. Their view was when the conditions deteriorated to a certain point people would leave of their own accord. Those who had been part of the Christchurch red-zone retreat also commented that it was a painful process that they did not want to repeat.

Some did not want a proactive plan and felt that Council should just address individual issues as they arose.

Near the end of the process, it was suggested by some that climate change related triggers should be set and when reached compensation should not be offered as due warning had been provided. This differs from the view of the Committee who are advocating for triggers and full compensation when the triggers are reached.

### Theme 8 – Districtwide rate

Some of the community expressed concern that they are being discriminated against by not being included on the districtwide rate. They feel they will be significantly better off on the districtwide rate. There are mixed feelings about paying for the wastewater pipe with some happy to pay and others feeling it should be something Council provides. Either way there was a belief that since the pipeline would have a life of 50 years the community should be able to stay for this time.

### Theme 9 – Relationships

There are some divisions within the community and their enjoyment and/or health suffers at times due to these neighbourhood disputes. Some were unwilling to attend the public meetings due to the likely presence of other community members. Some fear engaging in the process at all due to the opinion of others in the community.

It is clear from the feedback that the Committee does not represent everyone within the settlement. Many expressed that the drop-ins had been a good opportunity to express their own individual views. Even some who were sympathetic to the Committee and supportive of the work of the Committee expressed different views to those being championed by the Committee. The Committee have spent a significant sum of money collected from the community on the process and there are concerns among the community about how this money is being spent including the visibility of this spending.

Some community members expressed a concern that misinformation was being spread within the community. This was creating paranoia and anxiety to build within the community.

Some members of the community have significant mistrust in the Council. They note the negative views of the previous mayor and feel that some Councillors have not shown an interest or taken the time to understand their situation. They quote various Councillors and or staff saying negative things about the community. These views have been exacerbated by an unclear reason for the need to retreat and the lack of transparency on the cost of the wastewater pipe. They were critical that the Mayor and CEO were not leading the discussions. Some are not supportive of the current Council making a decision about their future.

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<sup>4</sup> Intergovernmental Panel on Climate Change

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### Theme 10 – The future

We asked some about what the future looked like for them if they were unable to stay at the Upper Selwyn Huts.

There is a mix in views as to what Council's responsibility is in this situation. Some had strong views that it was not up to Council (or the rest of the District) to organise and pay to relocate the community. Others thought they should be fully compensated for their loss and any relocation should be into a warm, dry home in a good location.

Many liked the Licence to Occupy model as it enabled them to enter the housing market at an affordable price and they can now save for their future. They viewed it as paying rent in advance and bought with this view in mind.

Many liked the idea of land banking as it gave them an asset for the future. Others thought it was better to allow the community to spread themselves amongst existing communities to allow them to integrate into existing communities and prevent any discrimination. Some were happy with social housing provided they had a guaranteed place to call home.

Some wanted the process wrapped up quickly with a clear plan so they could move on and start planning for their future. Others did not feel a plan was necessary and were keen to address issues as they arose.

Generally, the community want to live as well as they can for as long as they can at the Upper Selwyn Huts.



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### 3. Technical presentations

A triggers-based approach requires an understanding of the risk to the settlement. The Environment Canterbury River Engineers presented to the community on 27 November to explain how the Selwyn River and Te Waihora were managed. The presentation is available on the SDC website.

A report on the groundwater hazard (Aqualinc, 2024) was also prepared and presented to the community. This was presented to the community on 5 December and is also available on the SDC website.

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## 4. Triggers summary

A triggers-based approach to retreat started to be explored with the community. This work was not completed due to the change in direction however the information informing the initial discussion with the community is outlined below. This supports the slides presented to Licence Holders on 19 October 2024.

A triggers-based approach is current advocated for in the Ministry for the Environment's Coastal Hazards and Climate Change Guidance when adapting to climate change related hazards.

It is a useful approach as it considers the impact of the hazard and when the impact of this hazard will be actualised. It is commonly used where there is uncertainty relating to when impacts will be experienced. Using this approach, we are able to plan to adapt prior to the impact being experienced but do not need to assign a timeframe (or may prescribe an indicative range only). This contrasts with the more traditional approach of reacting to an impact. Acting proactively aims to prevent the loss of life or property that can result from waiting for the disaster.

A triggers-based approach relies on the development of Adaptation Thresholds, Triggers and Signals.

- **Adaptation Thresholds** describe the situation where the management approach is no longer delivering the desired outcome. The thresholds need to respond to community values, risk exposure and agreed levels of service.
- **Triggers** are the point at which we need to progress a change in the management approach. They allow sufficient lead in time to ensure the new option can be undertaken prior to the threshold being met.
- **Signals** provide early warning that a trigger is approaching. They indicate that we should start thinking about early engagement on the change.

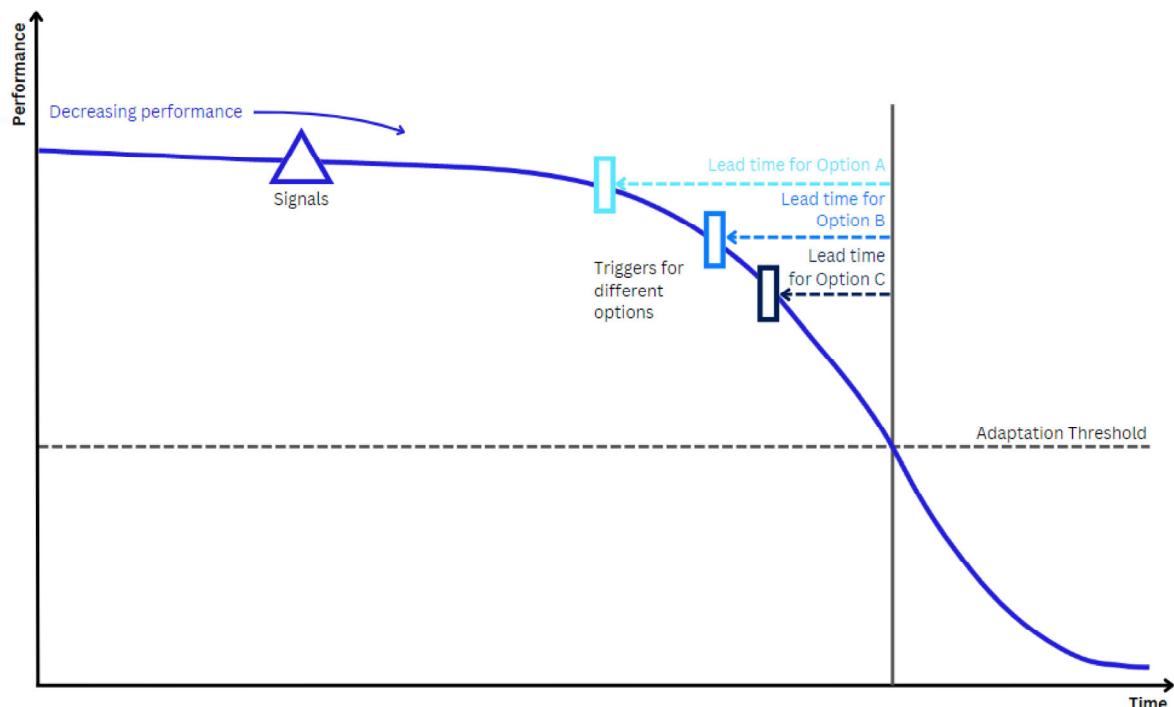


Figure 3: Figure 2: Graph showing signals and triggers in relation to the adaptation threshold (adapted from (Ministry for the Environment, 2024))

Figure 4 illustrates how this works in practice.

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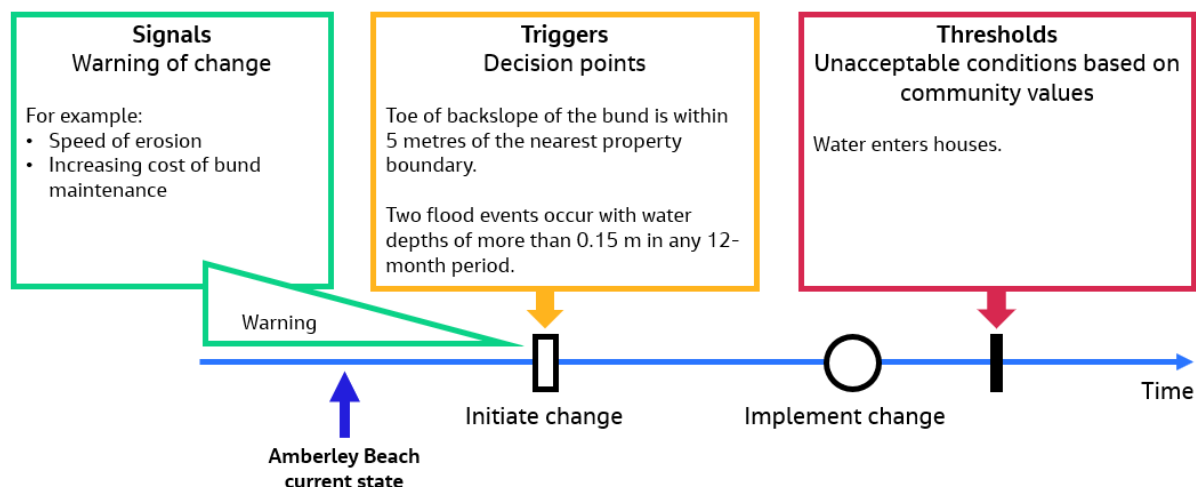


Figure 4: Hurunui example of threshold, triggers and potential signals

## 4.1 Developing adaptation thresholds for Upper Selwyn Huts

Adaptation thresholds are the point when the current hazard management approach is no longer tolerable. This point may differ for property owners, asset managers and recreational users. By determining this point, we can plan actions when more certainty on timeframes is available. A triggers-approach works best when there is a gradual increase of impacts over time as opposed to a single “tipping point”.

In proposing adaption thresholds we reviewed the literature from both New Zealand and global sources to understand what level of hazard exposure is tolerable to some populations elsewhere in New Zealand. Judgement was used to select seven key thresholds that may be suitable for the Upper Selwyn Huts community. These were used as the basis for community discussion and are included below. Additional work is required to develop these further if a triggers-based approach were to be adopted.

Based on initial discussions with some community members a trigger-based approach may be difficult to agree on as some have said it is ok if water flows through their homes, they can't access their home for a couple of days, or they can no longer obtain insurance. This is likely to make agreeing on thresholds challenging unless they are solely based on scientific recommendations, government direction and/or national or international best practice.

### 4.1.1 Threshold 1: Water is 0.3 m deep at an agreed location

#### *Flooding of houses*

Most of the houses at Upper Selwyn Huts are very low lying. We have not measured how high individual properties are above the ground but visual observations and discussions with residents suggest that some houses are built directly on the ground while others have very minimal clearance. Some of the more recent houses have been built at greater elevation and are at less risk.

The settlement appears flat, but the reserve does have a slight gradient which will affect where water ponds and how much clearance any particular house requires. LiDAR data<sup>5</sup> is available for the settlement but has not been used to determine where the low points are at this stage. This could be used to help refine a trigger in future and agree on a location to measure flood depths.

<sup>5</sup> 2023 survey data held by LINZ

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### *Flooding affecting roads*

New Zealand does not have specific guidance on the depths of water suitable for passenger cars and people. However, the AR&R Flood Safety Guidelines (Australian Institute for Disaster Resilience, 2017) and the United Kingdom DEFRA/ Environment Agency Framework and Guidance for Assessing and Managing Flood Risk for New Development (DEFRA, 2005) show that static water becomes unsafe for pedestrians and small cars above 0.3 m. There is also a need to consider flow velocity, turbidity and debris. It is a complex equation that needs to be investigated more fully in determining the potential threshold.

### *Proposed thresholds*

To implement the threshold and subsequent trigger an agreed publicly accessible point would need to be established. Some consideration would need to be given to how the water level at this site compares to the rest of the settlement. For example, if it is a high point then 0.2 m of water might be the right height whereas if the location is a low point in the settlement, we would expect deeper water to be measured in this location and the agreed level may be 0.4 m to accommodate this.

As per the figure below different water levels will have different impacts on people, vehicles, and homes. The light blue shows a water depth of 0.2 m. This does not flood the house on the left as the house is built 0.3 m off the ground. This depth of flooding would however enter into the house on the right which is built directly on the ground. Similarly, the size and physical capacity of residents impacts the ability to safely navigate flood waters. For reference, the purple shows how 1 m of flood water would impact the same houses and people.

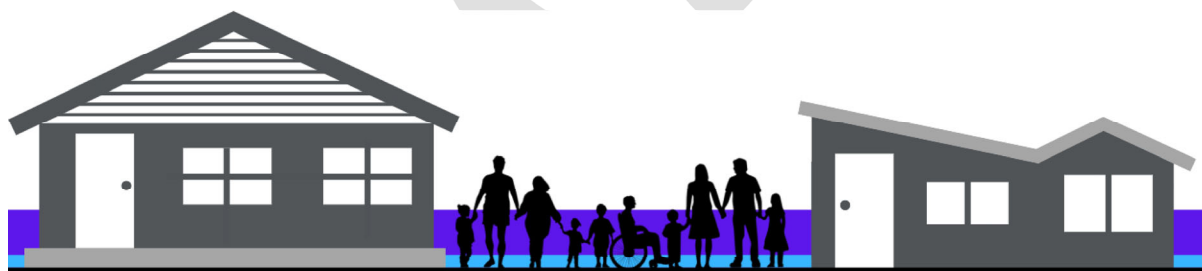


Figure 5: Impact of flood depth on people and houses showing a 0.2 m and 1.0 m depth

### **4.1.2 Threshold 2: Water ponds for more than 20 continuous days at an agreed location**

Prolonged ponding can be evidence of high groundwater levels. Increased groundwater has a number of impacts on residential land use.

#### *Homes*

High groundwater levels can cause rising damp leading to increased moisture and mould in homes. It is anticipated that many homes within the Upper Selwyn Huts community have a poor ground moisture barrier given the date and method of construction. Moist and mouldy homes have negative health effects on residents and prolonged damp can threaten the structural integrity of buildings.

#### *Utilities*

Rising groundwater levels can compromise infrastructure such as pipes, roads, and power poles. Underground utilities, especially gravity driven stormwater and wastewater laterals and septic tank systems, are vulnerable to buoyant forces inhibiting functionality and to infiltration and inflow which can reduce the performance of these assets. In order to perform maintenance on underground services, dewatering may be required. High groundwater levels impact sealed and unsealed roads over time leading to deterioration of the road surface.

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The electrical lines servicing the Upper Selwyn Huts community are a mix of wooden and concrete power poles. Increased groundwater levels can reduce the service life of wooden power poles.

### *Drainage*

Groundwater ponding above the ground surface indicates saturation, reduced permeability or high groundwater levels. This exacerbates the risk of flooding from other sources as the water is unable to drain away which may lead to deeper or longer lasting flood waters. Given the Upper Selwyn Huts are a low-lying community with limited fall to the sea this may limit opportunities to significantly improve drainage.

### *Health*

Emergent groundwater can also pose health risks associated with persistent stagnant water. The stagnant water can provide a breeding ground for bacteria and mosquitos and can omit an odour. The stagnant water is also likely to cause certain vegetation to die off.

### *Proposed thresholds*

The depth of stagnant water is less important than the length of time that water ponds for. If the water ponds for several days, dissipates and then returns this is also less harmful than if it ponds continuously.



Figure 6: Stagnant water ponding outside a house

### **4.1.3 Threshold 3: Vehicle access to the huts is cut off continuously for over 24 hours**

There are no services within the Upper Selwyn Huts. Residents must travel to nearby towns for groceries, medical care, employment, and education services. Access to the settlement is also important to enable residents to evacuate if required.

Before the settlement is impacted by flooding the road is impacted. Changing levels of risk could increase the depth and duration of potential road closures. When the road is shut residents may be unable to leave the Upper Selwyn Huts to reach hospitals, family, or to return to collect belongings or animals. External assistance may also be unable to reach the settlement.

### *Proposed thresholds*

Any threshold would need to consider the minimum standard of access. For example, access via 4WD may be sufficient in an emergency to enable critical supplies to be delivered or evacuations to be made. Alternatively, a self-sufficient community may be comfortable being cut off for several days. This may depend on the make-up and vulnerability of those within the community.



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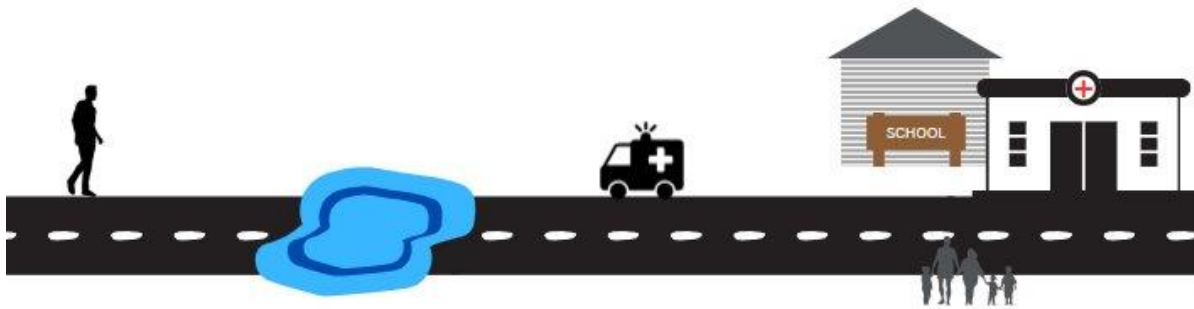


Figure 7: Settlement separated from services by deep water

#### 4.1.4 Threshold 4: The first dwelling is unable to obtain flood insurance

Insurance is an important aspect of a sustainable community and is a vital aspect of resilience to natural hazards. There may come a time when insurance premiums and/or excesses rise. This may make insurance unaffordable for some people. There may come a time when insurance companies are unwilling to provide flood insurance at all no matter what the cost.

##### *Proposed thresholds*

There are a variety of reasons why an insurance company may be unwilling to provide insurance including due to the history of the individual homeowner, or the individual company's current exposure profile. This needs to be kept in mind when making thresholds based on insurance. The threshold could consider when properties that were once insurable no longer are or when insurance is withdrawn. It can be useful to limit this to flood insurance too.

#### 4.1.5 Threshold 5: A major event requires over 30 huts to rebuild

Should a significant event require over 30 dwellings or a third of the settlement to rebuild this could mean a threshold has been exceeded. The significant event could include an earthquake, fire, or major flood. If it is likely that the settlement will not exist long term this is a practical time to restrict new building work to prevent poor investment decisions.

#### 4.1.6 Threshold 6: A flood event causes serious injuries and/or fatalities

The settlement is at risk of a stopbank breach and overtopping. If the stopbank breached perpendicular to the settlement this would cause high velocity flood water to enter the settlement. If such an event were to occur some consideration would need to be given to whether this could be prevented from occurring again.

A trigger could include when the effectiveness of the stopbank is compromised or when the stopbank is no longer providing the desired level of protection.

#### 4.1.7 Threshold 7: Te Waihora is no longer able to be opened to the sea

If the flood risk to the settlement changes then the thresholds may need to be changed as well. Changes in the flood risk could include a change to the level in which Te Waihora is opened to the sea.

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### 4.2 Community feedback on thresholds

Further discussion on thresholds would be required prior to agreeing on community thresholds. Some discussions were had with individuals or small groups on the thresholds however, the feedback below should not be assumed to be representative of the wider community. Key feedback points included:

1. Water flowing through houses was not a major concern as they were willing to clean up and build back. There was an indication that if this started to occur multiple times per year then they might be more concerned, but they could tolerate annual flooding. This is likely not to be tolerable to all if this eventuated. This opinion may vary across the settlement with some able to manage the disruption better than others.
2. Many of the community had insurance but others choose not to. If they lost insurance, they could not afford to move elsewhere so some were happy to forgo insurance.
3. There was not an obvious concern about access to the settlement. Mostly they were happy to use 4WDs to get out of the settlement if needed or would stay put.
4. Some did not want a plan and said they would deal things as they arose. There is a difference in opinion between those who have experienced reactive retreat before and those who have not.

### 4.3 Recommendations on a triggers-based approach

A triggers-based approach is not recommended at this stage as:

- The community's threshold for risk is very high based on early discussion and likely to differ substantially across the settlement. People have suggested that they are ok with water going through their homes and that being able to evacuate was not a key driver. The ability to obtain insurance was also not important to everyone. Triggers would therefore likely be reactive and occur after a significant event.
- A triggers-based approach works best when there is a gradual increase in the risk. This enables communities to avoid the community's thresholds being exceeded. In the case of Upper Selwyn Huts the triggers for retreat are likely to be in response to a shock event given the high tolerance for risk. Reactive triggers for retreat can still be agreed upon. In this case it might be agreed that if a house is destroyed by flood waters no building consent will be granted for a rebuild.
- There is a risk to the Upper Selwyn Huts from flooding, but this risk is no greater than a lot of other areas in the District. The increase in risk is slow over the next 50 years and therefore the thresholds of the community are likely to change in this time given the likely change in demographics over this time.
- Triggers are unlikely to meet the needs of both the community and the Council providing neither group the certainty they want.

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### 5. Exploring options for retreat

Part of the scope of the project was to consider what was needed to retreat the settlement.

Some options were explored at a high level including:

- A living lease
- Land banking
- Compensation
- Social housing
- Rentals
- Support package.

These options were considered based on the following assumptions:

- The Deed of Licence is finite (regardless of whether this involves triggers or a set date).
- The timeframe for retreat is 15-30 years (needed to determine the potential impact on residents)
- Solution does not have to be constrained by what has happened elsewhere.
- There is currently no funding available for any options.
- The solution needs to support equity – people should not be left homeless, but the approach also needs to be fair to those at the Upper Selwyn Huts and the rest of the District.
- The solution should not transfer the situation to those more vulnerable.
- Solution would need to be palatable to all ratepayers and the business case would need to add up.

These options were not explored in detail due to the pausing of the project. They would all require further development if they were to be adopted.

#### 5.1 Option 1 – Living Lease

A living lease was suggested by some members in the community as they wished to live out their time at the settlement. A living lease could be offered to those over a certain age. This would mean that those who wished to live out their time at the settlement could, but the lease would die with them preventing transferring the issue to another owner.

This is unlikely to be a solution for younger members of the settlement or those wishing to protect their historic connection with the settlement. Conditions within the settlement are also likely to deteriorate over time as less is invested in the settlement (if there is a finite date for some), the flood risk gradually increases or the settlement empties out as some residents move on.

#### 5.2 Option 2 – Land banking

Land is purchased by a central party and the residents pay off their section over time. This ensures people have somewhere to move to and help retain some equity.

This may not be palatable to the remainder of the District as residents at the Upper Selwyn Huts don't currently own land. Ratepayers may feel that it is unfair that this group of residents are being gifted land whereas others in the District are unable to afford land as they are paying large portions of their income in rent. Land is also expensive in the Selwyn District and the houses at the Upper Selwyn Huts are affordable and modest. The value of any new section is likely to be significantly greater than the money invested in the original house.

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In the Hurunui example the properties were freehold and the residents owned both the land and the house. Land is cheaper and they were to pay off their new land through their rates at minimal cost to the remainder of the District. The repayments in Selwyn would be significantly higher than those in Hurunui. We have heard from many that affordability is a key driver for living at the huts currently and that they are already struggling with current living costs. Some are unlikely to be able to afford the additional expense. Moreover, given the age of those within the settlement many may struggle to get a mortgage to build. There is an argument that those residents could sell their section to get compensation however there is an equity issue where the compensation they are likely to receive from selling a new section is likely to be greater than the money they invested in their hut.

### 5.3 Option 3 – Compensation

There is currently no government funding for retreat however if funding were to be made available full or partial compensation could be sought. The Expert Working Group on Managed Retreat recommend compensation for those where it is their primary residence and a balance between buyer beware and compensation. The Expert Working Group did not consider a Licence to Occupy. The Upper Selwyn Huts differ from other retreat examples in New Zealand as the Deed of Licence requires the removal of the hut if the licence is not renewed and does not include land ownership.

Compensation would provide some assistance to those needing to find alternative accommodation or help support retirement however as hut values are low many may still struggle to purchase else especially given how many are nearing retirement age.

### 5.4 Option 4 – Social Housing

Social housing includes the provision of low-cost housing where the rent is capped at or below market rate. There is usually the option for long-term rentals, and people are allowed to leave the area when it no longer suits. Access to social housing is usually based on income and some within the settlement earn too much to be eligible. Some in the settlement are also determined they are not willing to rent so this would not be an option for them.

### 5.5 Option 5 – Rent to buy

There are a few examples of rent to buy schemes in New Zealand. The schemes offer affordable rent for a guaranteed term. At the end of the term you have the option to purchase the house without having to compete with the open market. Some of the schemes also gift you a proportion of any increase in property value to put towards the deposit.

There are currently no such schemes in Selwyn however there are in Christchurch. They suit a particular demographic as you usually need to a minimum household income to be able to demonstrate that you can meet the repayments.

### 5.6 Option 6 – Support package

Instead of direct compensation a pool of money is established that is distributed on a case-by-case basis as required. The focus is on helping give people a leg up to support themselves. It could involve providing services such as financial advice, advice for purchasing, support accessing support services or financial assistance for those who need help getting started such as a contribution towards a rental bond.

This may be more palatable to the District as a whole as any money made available is directly supporting those who need it most.



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## 6. Outstanding issues

There are several issues that were fully or partially discussed through the process but were not resolved. These issues are briefly touched on below.

### 6.1 Building inspections

Building inspections were discussed in detail on 19 October 2024. Some of the key reasons why these were necessary were:

- **Addressing complaints:** The number of complainants that relate to the houses at the USH and there being no record of what currently exists and therefore it is difficult to determine what has been done illegally. A record would establish what was there on a fixed date and could be referred back to in future.
- **Fire risk:** The houses are built close together due to the small sections. Sheds, fences, vehicles and other property are located on or up to the boundary. This means that if one house at the Upper Selwyn Huts were to catch fire this could quickly spread to multiple houses due to the abundance of fuel and limited separation distances.

Some of the community do not trust Council to undertake these inspections as they fear any non-compliance with the Building Act 2004 would render them homeless. The reasons for the inspections do not seem to have been resolved with numerous neighbour disputes raised through the engagement period.

### 6.2 Management of the Upper Selwyn Huts

Several members of the community indicated that they weren't happy with how the huts were being managed. Increased management is likely to result in higher costs for Council. Council's resource allocation could be considered as part of the Deed of Licence renewal and the Licence Fee adjusted according.

### 6.3 Historic significance

The Upper Selwyn Huts Committee are currently finalising a report on the historic significance of the settlement. This is likely to be available to Council early in 2025.

### 6.4 Districtwide rates and cost of the wastewater pipeline

These issues were discussed as part of the process but generally sat outside the key topics of engagement.

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## 7. Key findings

Based on the engagement and technical information available the following observations are made which may support the next steps.

1. The available climate change and flooding information does not seem to support the need to retreat in the next 15-30 years (pending a significant event). Given this, the variety of opinions and the high degree of risk tolerance, a trigger-based approach is not likely to meet the needs of Council or the community at this time.
2. Issues around the potential fire risk have yet to be worked through in detail. This may form part of the work on the building inspections.
3. There is a very mixed understanding of what a Deed of Licence is and what rights it entails. SDC have a document entitled "Guide to buying a hut at Upper Selwyn Huts." There is an opportunity to strengthen the advice provided to hut owners. This should include:
  - a. The length of the licence.
  - b. The rights of renewal.
  - c. Indicate that at some time in the future the licence will not be renewed.
  - d. No compensation will be provided at this time.
  - e. The requirement to remove the hut at this time.

This document needs to be in plain English and be provided to all potential purchasers. It is possible that those moving into the Upper Selwyn Huts as permanent residents have limited funds available to them and are less likely to understand the limitations of a Deed of Licence (or be unwilling to pay for sufficient legal advice).

4. The inclusion of the Upper Selwyn Huts on the districtwide rate was consistently raised through the process. As part of the revised Deed of Licence, Council could fully consider whether to include the Upper Selwyn Huts on the districtwide rate. Alternatively, should the settlement not be included, provide clear guidance to the community on the cost of the pipeline to enable the community to budget for the increase in costs.
5. Revisit the licence fee to ensure it is sufficient to meet the needs of Council and the Level of Service expected by the community.

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