

BEFORE THE QUEENSTOWN LAKES DISTRICT COUNCIL

IN THE MATTER OF the Resource Management Act 1991

AND

IN THE MATTER OF Queenstown Lakes Proposed District Plan Hearing
Stream 14 (Wakatipu Basin)

STATEMENT OF EVIDENCE BY JOHN CLIFFORD KYLE
(SUBMITTER 433 AND FURTHER SUBMITTER 1340)

13 June 2018

1. INTRODUCTION

QUALIFICATIONS AND EXPERIENCE

- 1.1 My name is John Kyle. I am a founding director of the firm Mitchell Daysh Limited.
- 1.2 My qualifications and experience are set out in paragraphs 1.1 to 1.6 of my statement of evidence for Hearing Stream 1B of the Proposed Queenstown Lakes District Plan (PDP), dated 29 February 2016.
- 1.3 I confirm my obligations in terms of the Code of Conduct for Expert Witnesses contained in the Environment Court Practice Note 2014. I confirm that the issues addressed in this brief of evidence are within my area of expertise. I confirm that I have not omitted to consider material facts known to me that might alter or detract from the opinions that I express.
- 1.4 Mitchell Daysh Limited has been commissioned by the Queenstown Airport Corporation (QAC) to provide resource management advice with respect to the PDP. My firm prepared the submissions and further submissions on behalf of QAC.
- 1.5 This hearing specifically relates to submissions regarding the Queenstown Planning Maps contained in the PDP for the Wakatipu Basin – including mapping submissions on Stage 1 that were deferred to this hearing.

SCOPE OF EVIDENCE

- 1.6 By way of summary, in this statement of evidence I will:
- 1.6.1 Provide an overview of the background context of Queenstown Airport;
 - 1.6.2 Provide an overview of the relevant national and regional policy framework;
 - 1.6.3 Discuss the NZ Standard 6805:1992;

- 1.6.4 Set out a response to submissions seeking an alternative land use zone which will enable the intensification of Activities Sensitive to Aircraft Noise (ASAN¹) within or in close proximity to the Outer Control Boundary (OCB) at Queenstown Airport²; and,
- 1.6.5 Set out a response to the s42A report on Queenstown Planning Maps contained in the PDP for the Wakatipu Basin – including mapping submissions on Stage 1 for this area not yet heard.
- 1.7 QAC's interest in this hearing is in the capacity as a further submitter. Accordingly, this statement of evidence sets out a high level response based on the information that can be derived from the primary submissions. I understand that a rebuttal opportunity will be available to respond to any new information that is presented by submitters in support of their submissions.
- 1.8 QAC no longer has an interest in the following submissions:
- 1.8.1 Felzar Properties Limited (Submitter 229);
- 1.8.2 Don Moffat (Submitter 239);
- 1.8.3 Sam Strain (Submitter 351);
- 1.8.4 Sanderson Group Limited (Submitter 404);
- 1.8.5 Bill and Jan Walker Family Trust (Submitter 532);
- 1.8.6 Lynette Hamilton (Submitter 670);
- 1.8.7 Justin Crane and Kirsty McTaggart (Submitter 688);
- 1.8.8 Susan Todd (Submitter 690);
- 1.8.9 D Boyd (Submitter 838); and

¹ Activities Sensitive to Aircraft Noise (ASAN) means any residential activity, visitor accommodation, community activity and day care facility as defined in this District Plan including all outdoor spaces associated with any educational facility but excludes police stations, fire stations, courthouses, probation and detention centres, government and local government offices.

² Submissions 528, 850, 842, and 655.

1.8.10 Scott Crawford (Submitter 842).

1.9 Therefore, I do not address these submissions in this evidence.

DOCUMENTS REVIEWED

1.10 In preparing this brief of evidence, I confirm that I have read and reviewed:

1.10.1 QAC's submissions and further submissions on the PDP;

1.10.2 Other relevant submissions;³

1.10.3 The section 42A report prepared for the Wakatipu Basin Hearing and the relevant expert evidence (dated 30 May 2018);

1.10.4 The evidence of Ms Tregidga and Mr Day (dated 9 June 2017);

1.10.5 The Queenstown Airport Master Plan Options Report;

1.10.6 The National Policy Statement on Urban Development Capacity 2016 (NPS-UDC);

1.10.7 The relevant sections of the operative and decisions version of the Regional Policy Statement for Otago (the Operative RPS and the Proposed RPS respectively); and

1.10.8 Decisions regarding rezoning proposals heard during Stage 1 of the PDP.

2. BACKGROUND CONTEXT

2.1 The significance of Queenstown Airport and the planning framework within which it operates has been previously described in the following statements of evidence:

2.1.1 John Kyle, Statement of Evidence Hearing Stream 1B, dated 29 February 2016;

³ Submissions 528, 850, 842, and 655.

- 2.1.2 Mr Mark Edghill, Statement of Evidence Hearing Stream 1B, dated 29 February 2016;
 - 2.1.3 Ms Rachel Tregidga, Statement of Evidence Hearing Stream 8, dated 18 November 2016;
 - 2.1.4 Ms Rachel Tregidga, Statement of Evidence Hearing Stream 13, dated 9 June 2017.
 - 2.1.5 Mr Chris Day, Statement of Evidence Hearing Stream 13, dated 9 June 2017.
- 2.2 These five statements of evidence provide the contextual basis for some of the opinions I express in this evidence.

3. STATUTORY AND NON-STATUTORY CONSIDERATIONS

RESOURCE MANAGEMENT ACT 1991

- 3.1 Section 75 of the Resource Management Act 1999 (“RMA” or “the Act”) requires that a district plan must give effect to:

- (a) any national policy statement; and;*
- (b) ...*
- (c) any regional policy statement.*

- 3.2 Of particular relevance to this hearing is the NPS-UDC and the Proposed and Operative RPS.

NATIONAL POLICY STATEMENT ON URBAN DEVELOPMENT CAPACITY 2016

- 3.3 With respect to the NPS-UDC, there is a requirement under section 61(1)(da) of the RMA for regional policy statements to be prepared in accordance with any national policy statement. Despite there being a timing misalignment between decisions being issued on the Proposed RPS (1 October 2017) and the NPS-UDC becoming operative (1 December 2016), it appears that the Otago Regional Council was cognisant of the pending NPS-UDC when issuing its final decision. Specifically, Objective

4.5 and the attendant policies seek to ensure that urban growth and development is well designed, reflects local character and integrates efficiently with adjoining urban and rural environments.⁴

3.4 Policy 4.5.1 specifically states (my emphasis added):

Manage urban growth and development in a strategic and coordinated way, by all of the following:

- a) *Ensuring there is sufficient residential, commercial and industrial land capacity, to cater for the demand for such land, over at least the next 20 years;*
- b) *Coordinating urban growth and development and the extension of urban areas with relevant infrastructure development programmes, to provide infrastructure in an efficient and effective way;*
- c) *Identifying future growth areas and managing the subdivision, use and development of rural land outside these areas to achieve all of the following:*
 - i) *Minimise adverse effects on rural activities and significant soils;*
 - ii) *Minimise competing demands for natural resources;*
 - iii) *Maintain or enhance significant biological diversity, landscape or natural character values;*
 - iv) *Maintain important cultural or historic heritage values;*
 - v) *Avoid land with significant risk from natural hazards;*
- d) *Considering the need for urban growth boundaries to control urban expansion;*
- e) *Ensuring efficient use of land;*
- f) *Encouraging the use of low or no emission heating systems;*
- g) *Giving effect to the principles of good urban design in Schedule 5;*
- h) *Restricting the location of activities that may result in reverse sensitivity effects on existing activities.*

⁴ Objective 4.5 of the decisions version of the Proposed RPS, dated 1 October 2016.

- 3.5 In my view, this policy provides clear guidance that territorial authorities need to ensure that sufficient land is available to meet residential, commercial or industrial demand over the next 20 years (sub-paragraph (a)). However, such opportunities should not give rise to reverse sensitivity effects on existing activities or infrastructure development programmes.

REGIONAL POLICY DOCUMENTS

- 3.6 The Operative and Proposed RPS provide policy directives around the sustainable management and use of infrastructure. I have addressed both of these documents in my earlier statements of evidence⁵ therefore I do not intend to repeat that information here. I would like to highlight however, Policy 4.3.4 of the decisions version of the Proposed RPS (dated 1 October 2016)⁶ which aims to (my emphasis added):

Protect infrastructure of national or regional significance, by all of the following:

- a) Restricting the establishment of activities that may result in reverse sensitivity effects;*
- b) Avoiding significant adverse effects on the functional needs of such infrastructure;*
- c) Avoiding, remedying or mitigating other adverse effects on the functional needs of such infrastructure;*
- d) Protecting infrastructure corridors from sensitive activities, now and for the future.*

- 3.7 In my view, this policy provides a clear direction to Otago's territorial authorities that the future operation and use of regionally or nationally significant infrastructure⁷ should be protected from activities that may give rise to reverse sensitivity. This is of particular relevance to this

⁵ Paragraphs 4.11 and 4.12, Statement of Evidence of John Kyle, dated 29 February 2016; Paragraphs 4.2 to 4.11, Statement of Evidence of John Kyle, dated 18 November 2016.

⁶ Policy 4.3.4 is currently subject to three appeals. The scope of these appeals is such that this policy is likely to become more restrictive if the appeals are successful.

⁷ Policy 4.3.2 identifies ports and airports and associated navigational infrastructure.

hearing. A number of submitters are seeking to rezone land in a manner that would provide for the intensification of ASAN immediately beyond Queenstown Airport aircraft noise boundaries. Such development has the potential to give rise to adverse reverse sensitivity effects on QAC and could compromise the use of corridors (i.e. flight paths) both now and into the future.

THE NEW ZEALAND STANDARD ON AIRPORT NOISE MANAGEMENT AND LAND USE PLANNING

3.8 The New Zealand Standard for Airport Noise Management and Land Use Planning NZS6805:1992 (the NZ Standard) is recognised as the key guiding document for managing aircraft noise at New Zealand Airports.

3.9 I have previously provided an overview of the NZ Standard in my statement of evidence for Hearing Stream 1B of the PDP⁸. Mr Day has subsequently provided a detailed overview and interpretation of the NZ Standard in his statement of evidence for Hearing Stream 13.⁹ As with my previous evidence for Hearing Stream 13¹⁰, I do not intend to repeat that evidence, however I do wish to highlight the following key recommendations described in the NZ Standard:

3.9.1 That all new residential activities, schools, hospitals and other noise sensitive uses within an airport's Air Noise Boundary (ANB) should be prohibited.¹¹

3.9.2 that all new residential activities, schools, hospitals and other noise sensitive uses within an airport's OCB should be prohibited unless a district plan permits such uses.¹²

⁸ Paragraphs 5.11 to 5.31, Statement of Evidence of John Kyle, dated 29 February 2016.

⁹ Paragraphs 21 to 33, Statement of Evidence of Chris Day, dated 9 June 2017.

¹⁰ Statement of Evidence of John Kyle, dated 9 June 2017.

¹¹ Paragraph 26, Statement of Evidence of Chris Day, dated 9 June 2017 and Table 1 of the NZ Standard.

¹² Paragraph 25, Statement of Evidence of Chris Day, dated 9 June 2017 and Table 2 of the NZ Standard.

- 3.9.3 That all alterations or additions to existing residences or other noise sensitive uses within an airport's ANB and OCB shall only be permitted if fitted with appropriate acoustic insulation.¹³
- 3.9.4 That all existing residential properties are provided with appropriate acoustic insulation to ensure a satisfactory internal noise environment.¹⁴
- 3.10 In my view, the NZ Standard provides clear guidance regarding how noise sensitive activities should be managed within an Airport's aircraft noise boundaries. This approach is supported by acoustic expert Mr Day.¹⁵

QUEENSTOWN AIRPORT MASTER PLAN OPTIONS REPORT

- 3.11 Late last year QAC released its Master Plan Options Report. Based on the results of this report, forecasting shows that there is demand for Queenstown Airport to accommodate up to 7.1 million passenger movements per annum by 2045. In response to this demand, QAC has put forward three potential growth options for the airport:
- 3.11.1 Option 1: expand the existing terminal (and provide for up to 3.2 million passenger movements per annum);
- 3.11.2 Option 2: Build a new terminal to the south of the runway (and provide for up to 5.1 million passengers per annum); or,
- 3.11.3 Option 3: Build a new terminal north of the runway (and provide for up to 5.1 million passengers per annum).
- 3.12 A copy of this report is as attached as **Appendix A** to this evidence.
- 3.13 QAC's operative aircraft noise contours¹⁶ enable passenger growth for approximately 2.5 million passengers per annum.

¹³ Table 1 and 2 of the NZ Standard.

¹⁴ Table 1 of the NZ Standard.

¹⁵ Paragraph 31, Statement of Evidence of Chris Day, dated 9 June 2017.

¹⁶ As introduced via Plan Change 35 and the associated Notice of Requirement to Alter Designation 2.

- 3.14 As foreshadowed in the Master Plan Options Report, QAC has been undertaking further investigations into the impact that forecast passenger demand would have on the noise contours at Queenstown Airport. I understand this work is well advanced and is likely to be shared with the community in the coming months. I also understand that QAC intends to seek leave to serve a copy of this material on the Panel and to submitters when it is publicly available.
- 3.15 With such significant growth on the horizon, I consider it appropriate to adopt a cautious approach for rezoning requests beyond the OCB, as the built form outcomes arising from the PDP are likely to extend well beyond the life cycle of the PDP.
- 3.16 By the time the hearing comes about to hear this evidence, the work of QAC with respect to the future management of aircraft noise on land around Queenstown Airport will likely have advanced further. I am happy to update the Panel with any relevant updates at the hearing.

4. WAKATIPU BASIN REZONING REQUESTS BEYOND THE OCB AT QUEENSTOWN AIRPORT

- 4.1 QAC filed further submissions in opposition to the following original submissions relating to land within the Wakatipu Basin:
- 4.1.1 Shotover Country Limited (Submitter 528);
 - 4.1.2 Bridesdale Farm Developments Limited (Submitter 655);
 - 4.1.3 Scott Crawford (Submitter 842);
 - 4.1.4 R and R Jones (Submitter 850).
- 4.2 Within this statement of evidence, I do not deal with the specifics of each of the submissions opposed by QAC. All of the submissions involve an element of ASAN enablement, for which rezoning in the manner sought would inevitably bring more people to the effect of aircraft noise.

- 4.3 Of the above four submissions, three are located outside of the operative OCB.¹⁷ One is located partially within the OCB.¹⁸ All fall within an area affected by aircraft noise as described by Mr Day in his statement of evidence for Hearing Stream 13.
- 4.4 As set out by Mr Day, it is important to recognise that aircraft noise effects do not stop at the OCB.¹⁹ Aircraft noise is still experienced, albeit to a lesser degree, beyond the ANB and OCB. Rezoning currently vacant and undeveloped land and/or enabling the intensification of existing rurally and residentially zoned land will simply bring more people to the aircraft noise effect both now and into the future.
- 4.5 All too often the experience in New Zealand (and off shore) is that insufficient foresight has been applied to the protection of significant assets such as airports, meaning unwise land use decisions are taken to allow sensitive uses to encroach on the footprint of impact created by such infrastructure. Already ports, airports and other industries in New Zealand have had operations curtailed due to reverse sensitivity effects. Whilst I accept that balancing is often necessary between competing land uses, early recognition that facilities such as airports inevitably grow and develop is important and should inform land use planning decisions. The best form of protection available to avoid potential reverse sensitivity effects is to avoid development “coming to the effect” in the first place.
- 4.6 In my view, adopting a cautious approach when responding to submissions that are outside, but in close proximity to the existing OCB, will ensure that properties which may be located within the new noise contours are identified and appropriately considered through the PDP process.
- 4.7 It is on this basis, and the evidence of Ms Tregidga and Mr Day regarding passenger growth and possible future noise effects that I do not support the rezoning requests that would enable intensifications of ASAN within

¹⁷ Submissions 528, 655 and 842.

¹⁸ Submission 850.

¹⁹ Paragraph 81 to 86, Statement of Evidence of Chris Day, dated 9 June 2017.

close proximity of the OCB.²⁰ In my view, rejecting these rezoning requests would ensure that Queenstown Airport, which is infrastructure of regional and national significance, is protected both now and into the future (ORC Proposed RPS Policy 4.3.4).

- 4.8 Furthermore, the land subject to submission 850 is partially located within the operative OCB. It would be consistent with the operative District Plan²¹, the NZ Standard and the Stage 1 decisions with respect to rezoning submissions located within the OCB for submission 655 to be rejected, at least insofar as it relates to the operative OCB.

5. SECTION 42A REPORT

- 5.1 The section 42A reports recommend rejecting all four submissions. The section 42A report officers do not identify aircraft noise effects as a reason for rejecting these submissions.
- 5.2 In my view, the section 42A report officers have not afforded appropriate weight or given due consideration to the earlier discussed Proposed RPS provisions or the forecast passenger growth when undertaking their evaluation of the rezoning proposals. Notwithstanding this, I support the overall recommended outcome with respect to the submissions which is for the relevant rezoning proposals to be rejected.

6. CONCLUSIONS

- 6.1 The built form outcomes that will result from submissions seeking to “upzone” land within the PDP will extend beyond the planning horizon of the PDP. Given the considerable number of submissions seeking to “upzone” land just beyond the existing OCB, QAC took a long term, cautious approach when filing further submissions to ensure that its operations and functioning is protected from increased reverse sensitivity effects beyond the lifecycle of the plan.

²⁰ Outlined in submissions 528, 850, 842, and 655.

²¹ As amended by PC35 and confirmed by the Environment Court on 9 May 2018.

- 6.2 Unanticipated and unprecedented growth at the Airport combined with recent passenger forecasting has demonstrated that the 2037 noise contours are likely to be reached much earlier than anticipated. QAC's cautious approach is therefore justified in my view and is supported by both expert acoustic advice and by the statutory and non-statutory framework within which the PDP has to be considered.
- 6.3 I consider that, in order to protect the long-term viability of the airport and to protect the community from the increasing effects of aircraft noise, both now and into the future, all rezoning requests that seek to enable the intensification of ASAN should be rejected.

John Kyle

13 June 2018

Appendix A

Master Plan Options Report



MASTER PLAN OPTIONS

**Let's start
talking
about
tomorrow**





**What can
happen in
30 years?**



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40 Summary

Why have a Master Plan?

Global air travel is growing rapidly and we have a key role to play in how this growth is managed across our region. Queenstown Airport has seen unprecedented growth over the past 5 years and annual passenger arrivals and departures have increased from 600,000 to close to 2 million since 2005. So how do we plan for growth? What is sustainable for the airport and for our community?

ABOUT QUEENSTOWN AIRPORT

As New Zealand's fourth busiest airport by passenger numbers, Queenstown Airport is considered a strategic national asset with a vital role to play in the region's growth and prosperity. It's the air gateway to the lower South Island for nearly 2 million residents, visitors and businesses each year, connecting our region to key cities across New Zealand and east coast Australia.

The airport plays an important role in the local economy, supporting a thriving tourism industry as well as providing business and employment opportunities on site with 60 tenant businesses and 700 staff.

Queenstown Airport Corporation is responsible for the management of Queenstown Airport. The company is owned:

- 75.01% by Queenstown Lakes District Council
- 24.99% by Auckland International Airport Ltd

PLANNING AHEAD

To support the long term growth of our region and its continued attractiveness as a place to live, work and play, we need to provide sustainable air connectivity and a world-class airport experience. We also need to be a good neighbour with a strong social, economic and environmental focus.

Having a Master Plan is crucial to help us forecast the speed of growth and consequent infrastructure requirements over the next 30 years. Our Master Plan will also help others in the region with their own planning for infrastructure, accommodation, tourism, business and alternative developments.

THE PROCESS

We approached this exercise with an open mind and a clean sheet approach which didn't restrict our thinking to the airport we have today, or our current facilities.

Instead, we looked at potential demand forecasts and the different options we have for accommodating this growth.



We asked questions like:

- **How much growth is sustainable?**
- **Should we move the airport?**
- **What impact will growth have on our community and region?**

We now have options to share with the community and our stakeholders.



MASTER PLAN

Put the plan into action

Engage local, national & global expertise, & develop work plan

Implement

Set-up

Develop final plan taking into account engagement feedback

Identify final option & take to detailed design

Forecast demand & collect data

Work with leading experts to collate data & evaluate

Engage with community

Analyse airport infrastructure

Discuss & seek feedback on options

Property & planning analysis

Develop & evaluate options

Analyse economic & social impact

Based on analysis & in consultation with key stakeholders

Land, noise, traffic, investment analysis





Help us shape tomorrow

This document lays out a range of options for how the airport could develop. Each option will have different benefits and potential impacts on the community and the regional economy. We're keen to see what you think so that together we can decide on the airport's future.

We're gathering views through community visits around the region as well as via our website.

That way we can be sure we're talking to locals and businesses based in our region, as well as people who have holiday homes here and are regular visitors.

We want an end result which is sustainable, adaptable, affordable and memorable - in other words an asset we are all proud of.

Your views will help us shape our tomorrow and we will take them into account when we finalise our Master Plan.

Developing our Master Plan has brought up a number of questions. Here are a few we have thought about.

- 1 What growth **can** our region accommodate and what demand do we **want** to accommodate?
- 2 What are the environmental and community impacts of delivering this growth?
- 3 How much growth can we facilitate at our existing airport?
- 4 How can we grow the airport to meet the forecast demand?
- 5 What are our options for meeting this demand elsewhere?



**How you
can help
us shape
tomorrow**

Read the information provided in this guide and on our website

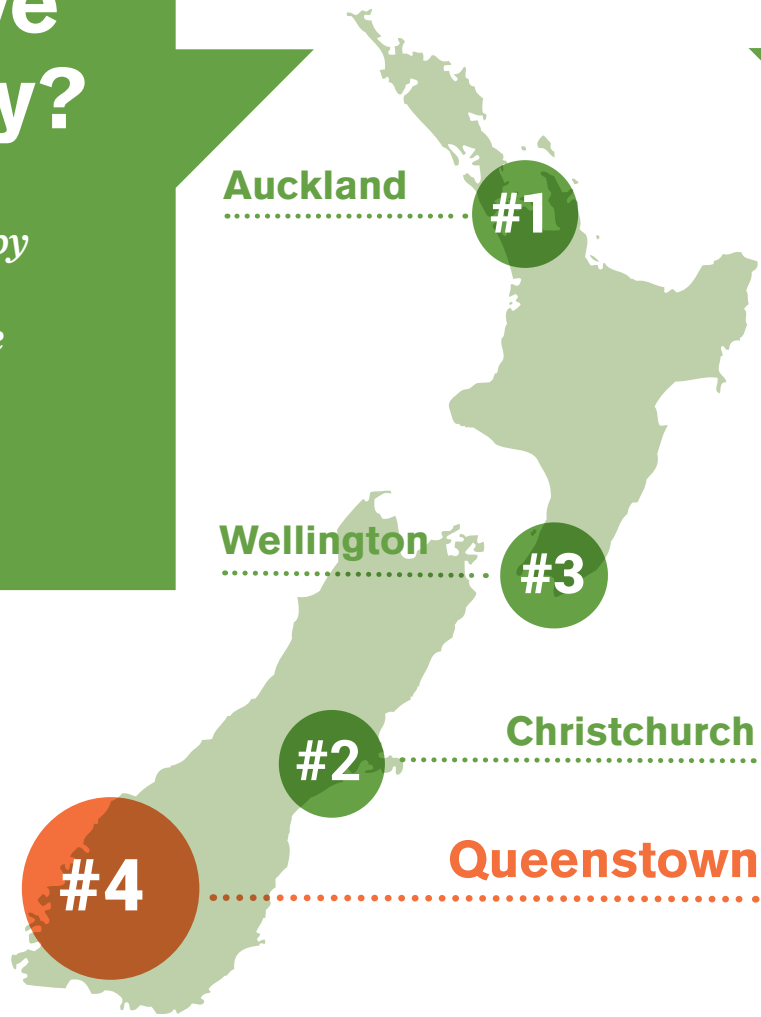
Provide your feedback via our website queenstownairport.co.nz/masterplan

Talk to us at our community Fly-In visits around the region – we'll let you know when we're coming to your area.

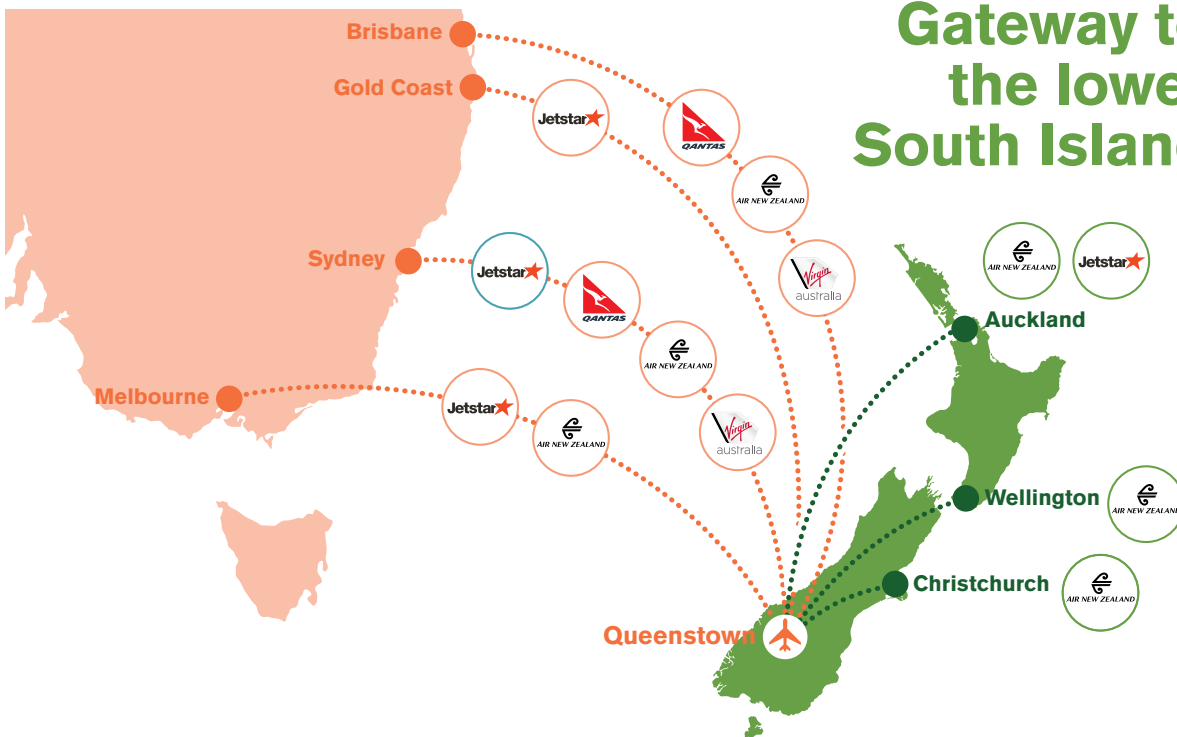
Become involved through tourism, business or resident groups to bring us a collective view on what's important.

How do we look today?

Queenstown is the fourth busiest airport by passenger numbers in New Zealand and is the gateway to the lower South Island.



Gateway to the lower South Island



Total aircraft landings

1 July 2016 - 30 June 2017 compared to previous year



Scheduled airline landings **7,277** ▲ 7%



Helicopter landings **13,606** ▲ 12%



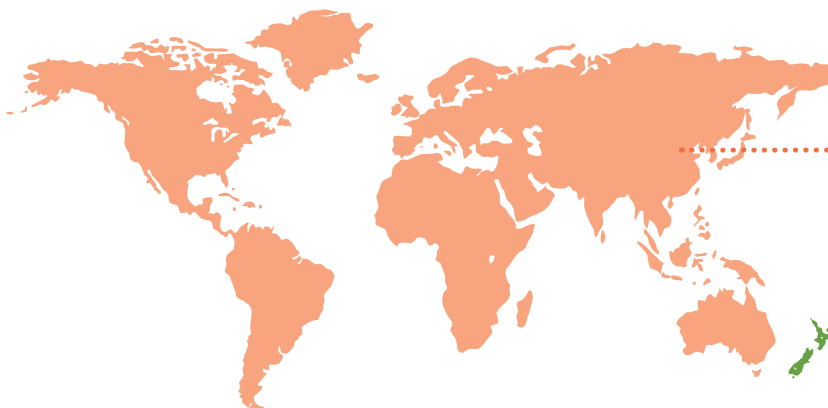
Fixed wing landings **6,530** ▲ 13%



Private jet landings **243** ▲ 14%

Total passenger movements 1.89m ▲ 15%

1 July 2016 - 30 June 2017 compared to previous year



532,285

International passengers

▲ 12%

1,360,158

Domestic passengers

▲ 16%



Passenger numbers explained

Airports report passengers and aircraft as “movements”.

- Passenger movements count both arrivals and departures i.e. 1 passenger is counted as 2 movements – their arrival and then their departure. This means that the actual number of visitors/residents arriving into the region via the airport is approximately half the number of passengers.
- Domestic passenger numbers include international visitors travelling on domestic flights.



Our Master Plan guiding principles

We have adopted four principles to help guide our thinking:

1 SUSTAINABLE
Support a safe, commercially-focused, environmentally-conscious and community-orientated business.

2 ADAPTABLE
Allow for staged growth and innovative solutions aligned to visitor and community needs.

3 AFFORDABLE
Recognise the economic challenges and opportunities associated with growth.

4 MEMORABLE
Provide our visitors with an exceptional service experience representing the best of the region and a sense of place.



Why is demand forecasting an important first step?

Accurate demand forecasting is essential to develop a Master Plan. It helps us consider key questions like how many more passengers and aircraft movements do we need to plan for and when? It also raises questions, such as how much more volume do we want to accommodate, regardless of demand, and can our wider community and infrastructure accommodate this growth?

BUILDING A ROBUST FORECAST

To forecast demand we consulted globally recognised experts who provide aviation forecasts and route analysis to airlines and airports around the world.

We also took into account potential demand for helicopters, small aircraft and private jets.

This analysis helped us get an informed long-term view of where aircraft and passenger traffic will come from between 2016 and 2045, the frequency of flights and passenger numbers and what this might mean for airport infrastructure i.e. terminal size, car parking etc.

APPROACH

The demand forecasting took into account practical considerations at the airport, such as our operating hours of 6am to 10pm and current runway length.

We optimised airline schedules to Queenstown using software which builds itineraries based on worldwide published airline schedules. The demand forecasts are based on itineraries that allow for minimum connection times and known passenger preferences and behaviours.

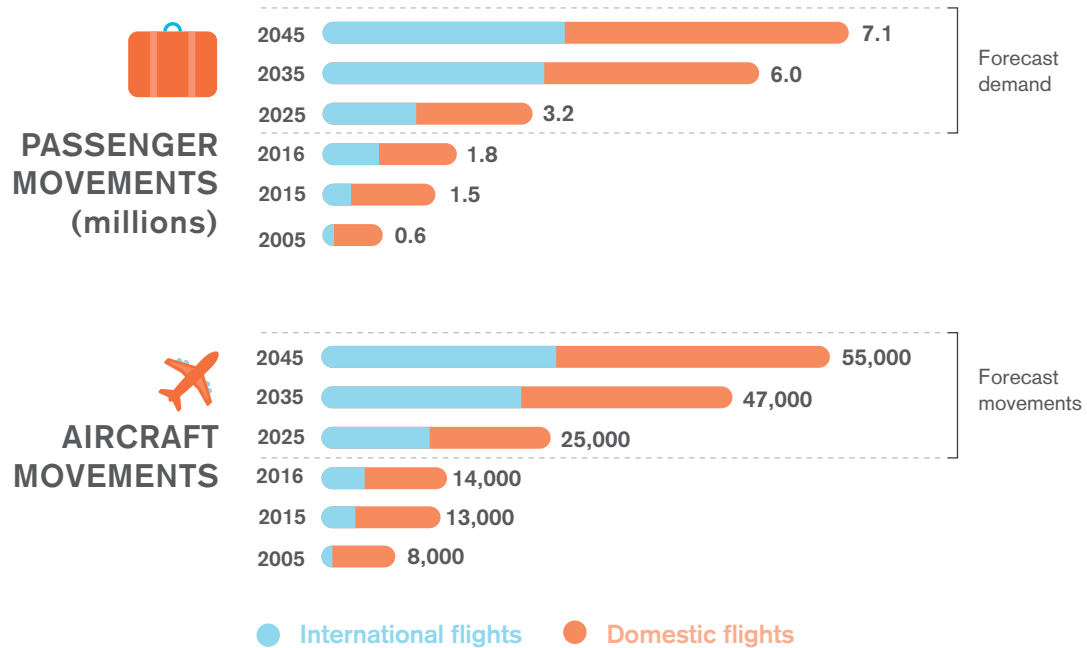


Striking a balance:

We want to strike a balance between growth for the airport and regional economy with the effects of increased passenger numbers on the community. We have evaluated the demand forecast with this in mind.

What does the demand forecasting tell us?

Here are the snapshots for commercial airline passengers and aircraft. These include potential demand from domestic and international travellers.



Our demand forecasting tells us that by 2025, passenger movements could reach 3.2 million (around 1.6 million visitors/residents).

This means in peak season on a peak day:



1,580 international passengers coming and going



1,150 domestic passengers coming and going



13 aircraft movements at peak hour

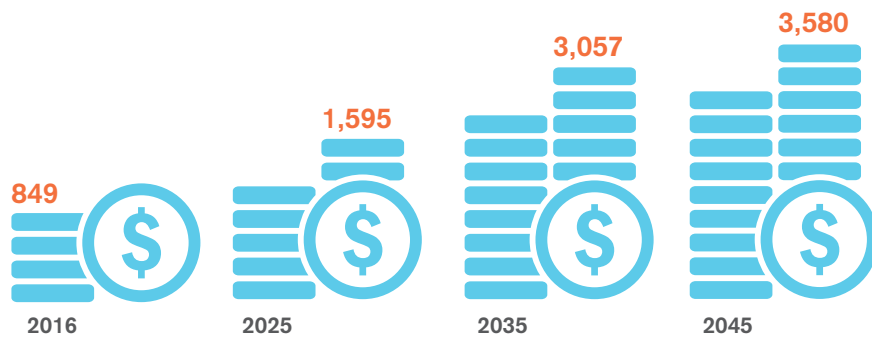


The number of flights increases and spreads across the airport's operating hours with the busiest time of day continuing to be between 14:30 and 16:00.

What are the potential economic benefits to the region?

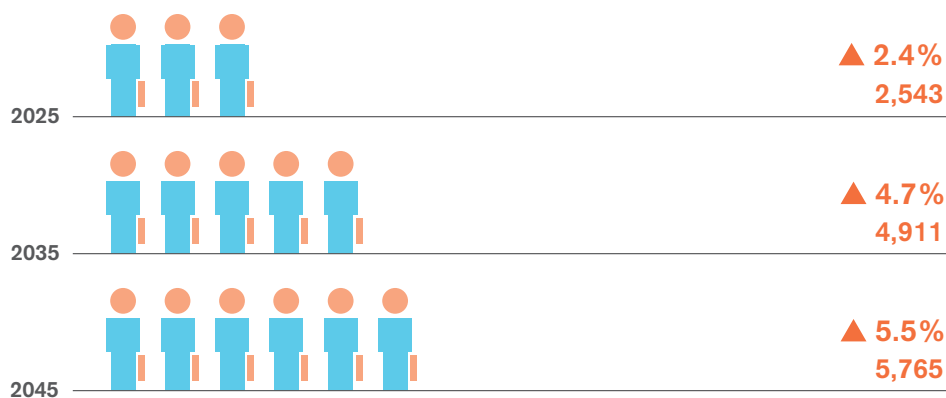
Based on demand, the potential benefits are:

Tourism spend (\$ millions) by Queenstown Airport passengers in the Queenstown Lakes district



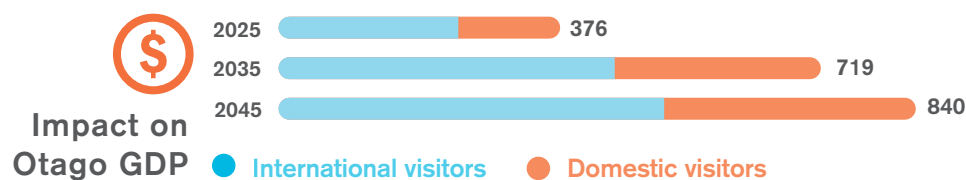
Source: Queenstown Airport

Employment in Otago region (increase in jobs from 2015)



Source: New Zealand Institute of Economic Research (NZIER)

Impact on Otago Gross Domestic Product (\$ millions) (increase in GDP from 2015)



Source: New Zealand Institute of Economic Research (NZIER)

What are the current economic benefits?

5.4 million
2016-17 ANNUAL DIVIDEND TO LOCAL COMMUNITY



203m
ANNUAL ECONOMIC BENEFIT TO THE REGION



OVER 700
STAFF WORKING WITHIN THE AIRPORT COMMUNITY

What's the right number?



While our analysis shows potential demand of around 7 million passenger movements (3.5 million visitors/residents) each year by 2045, we believe about 5 million passenger movements (2.5 million visitors/residents) per year is more sustainable for Queenstown Airport.



General aviation is very much part of the airport's history, community and character.



What about general aviation and private jets?

The Master Plan options ensure that the airfield design continues to support general aviation (GA) operations for small aircraft, helicopters and private jets, with potential for shared facilities.

Our thinking needed to take general aviation trends into account:

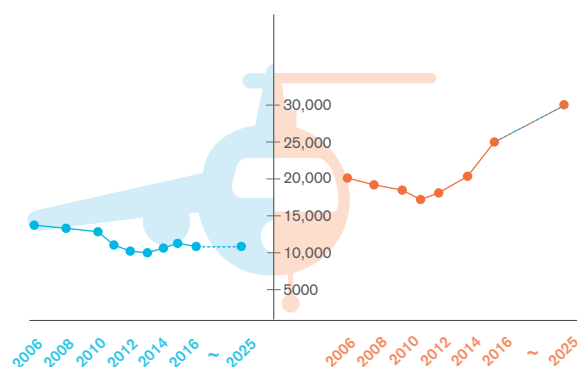
Fixed wing operators are tending to scale up their fleet to larger, modern, more efficient aircraft in order to accommodate more passengers.

Helicopter fleets are likely to expand in numbers, rather than aircraft size.

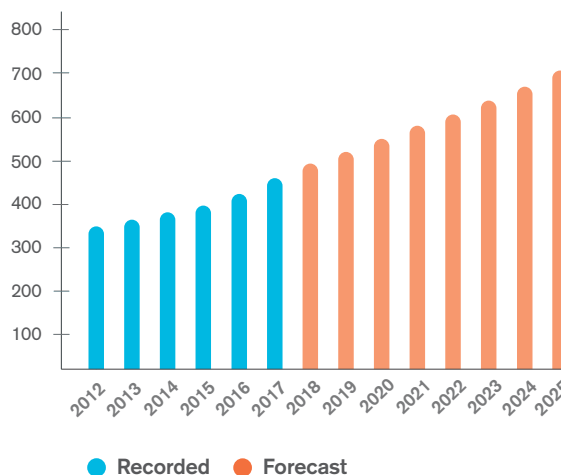
Helicopter movements have trended upwards while fixed wing aircraft movements have trended slightly downwards over the past 10 years.

The attractiveness of the region is stimulating demand in the private jet market and the larger aircraft coming on stream have the ability to fly longer distances. This is making Queenstown directly accessible from Australia, Asia and the United States for private jets.

Annual fixed wing & helicopter movements



Private jet movements





What are the constraints to growth?

A sustainable airport has to take into account financial, social and environmental considerations so we serve the needs of travellers and our community, operate profitably and return dividends to our shareholders, and mitigate our environmental impacts as far as possible.

LAND

- Additional property would be required beyond the airport's current landholdings to allow for either new terminal development and/or related facilities to be developed.
- The use of any landholdings is governed by either the airport's designation or its underlying zoning which would need to be varied to accommodate airport activities.

NOISE

- The District Plan identifies noise boundaries which protect the operational capability of the airport while managing effects from aircraft noise on the community.
- We call these the Air Noise Boundary (ANB) and the Outer Control Boundary (OCB). The Airport must be managed so that the noise from aircraft operations does not exceed 65 dB Ldn beyond the ANB, and 55 dB Ldn beyond the OCB.
- Hours of operation to remain unchanged from 6am to 10pm.
- If monitored noise nears the airport's currently consented levels, a plan change would be required to update the noise boundaries.

DESTINATION INFRASTRUCTURE

- Current visitor and worker accommodation and transport issues need to be addressed.
- Regional infrastructure needs to keep pace with forecast population and visitor growth.
- A long-term master plan for the district is a critical success factor and needs to be developed in a collaborative way.

COMMUNITY SUPPORT

Our business success and growth are closely linked to New Zealand's tourism and visitor industry.

In turn, the industry depends on the airport to provide sustainable air connectivity and a world-class visitor experience to help it achieve its goals.

We play an important role in supporting these goals, but it is just as important to us that the wider community supports what we are doing and want the opportunities that growth can bring.

What's the right balance?

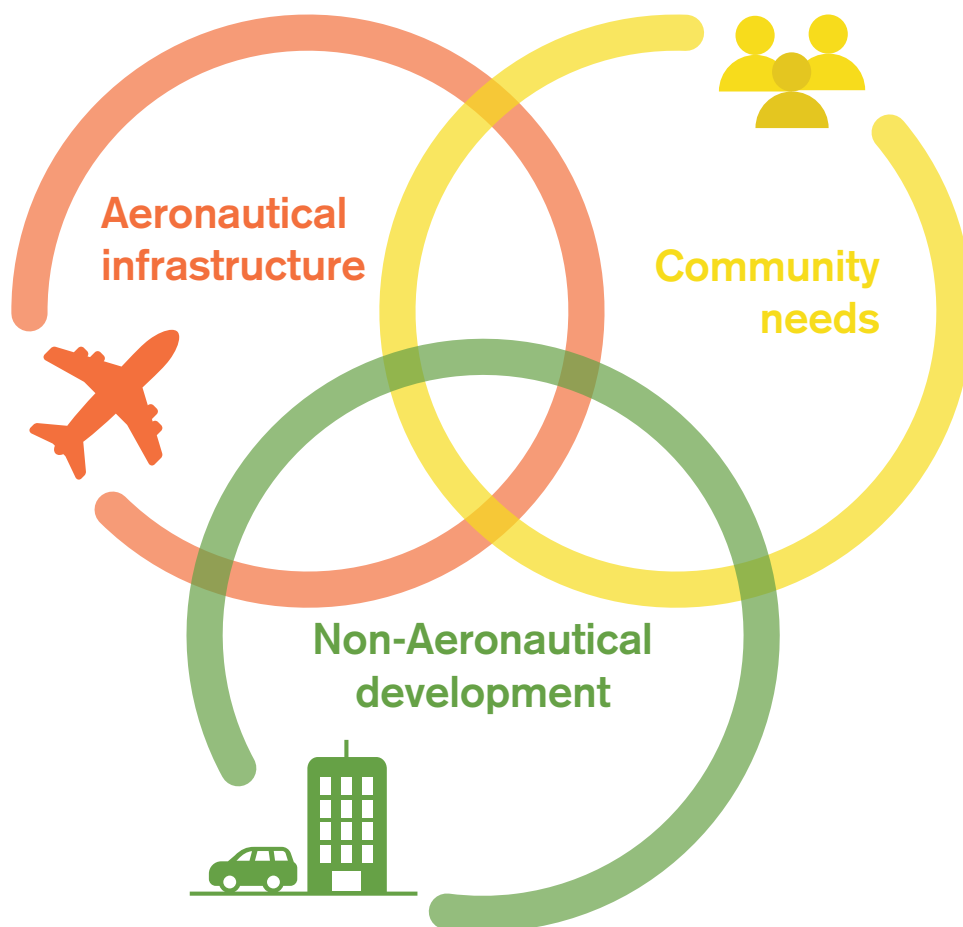
How do the Master Plan options look, feel, sound and cost?

For our customers

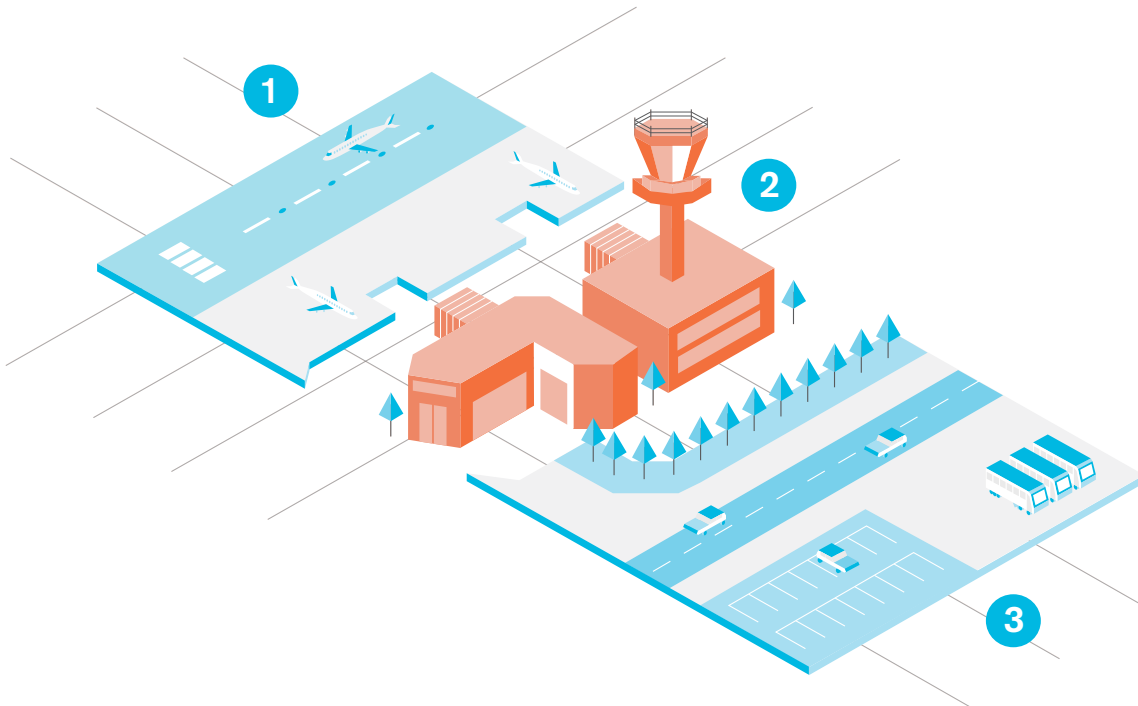
For our stakeholders

For our airport and local communities

For our wider region and nation



What infrastructure do we need to consider for the airport?



1 AVIATION

Airfield

- Runways
- Taxiways
- Apron
- Runway End Safety Area (RESA)
- Boundary fencing & security
- Airfield & apron lighting
- General aviation / private jet operations & facilities
- Aircraft maintenance
- Rescue Fire
- Air Traffic Control
- Airlines & ground handlers
- Cargo operations
- Aviation refuelling
- Airline catering
- Aircraft engineering
- Snow clearing & de-icing
- Utilities

2 TERMINAL

Customer facilities and services

- Infodesk, first aid, family facilities
- Toilets, lockers, trolleys
- Gate/ airline lounges
- Retail
- ATMs & currency exchange
- Food & beverage
- Check-in area
- Arrivals hall, baggage carousels
- Rental car kiosks
- Technology - Flight Information Displays, Wi-Fi
- Safety & security

Passenger security / facilitation

- Passport control (Customs)
- Biosecurity (MPI)
- Security screening & airfield security (AVSEC)
- NZ Police
- CCTV

3 SURFACE TRANSPORT

Ground transport & car parking

- Safe access & egress
- Public parking
- Rental car pick up and drop off
- Public pick up and drop off areas
- Shuttles
- Public transport
- Coaches
- Taxis
- Luxury transport
- Staff parking

What are the options for meeting demand?

We have taken a clean sheet approach to consider what options are available to accommodate the forecast growth.

We looked at:

QUEENSTOWN AIRPORT

Develop existing Queenstown site

- Extend runway to accommodate wide-body aircraft
- Build full or partial heavy parallel taxiway
- Expand existing terminal facilities
- Develop split terminal facilities (existing terminal + new terminal)
- Relocate & develop new single terminal

NEW AIRPORT

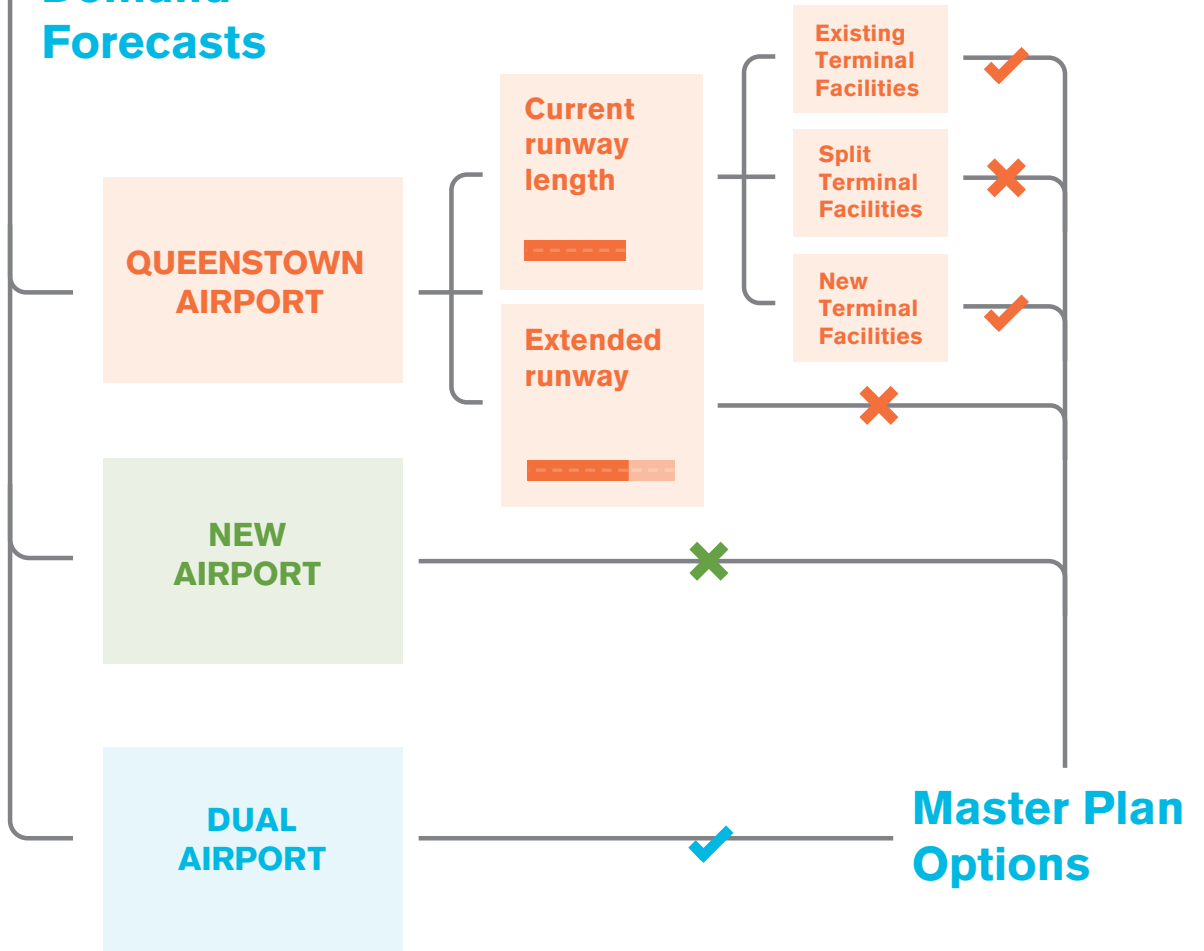
Relocate or supplement Queenstown site

DUAL AIRPORT

Develop Queenstown and Wanaka airports



Demand Forecasts



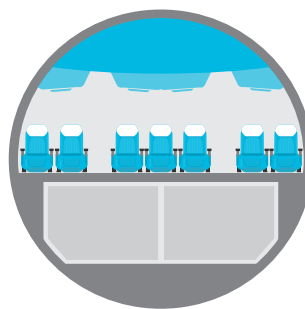
Should we extend the runway to accommodate larger aircraft?

Growing demand from passengers needs to be met with growing capacity from airlines. As part of our planning, we looked at whether using larger aircraft was a good way to accommodate growth. To do this, the runway would need to be extended.

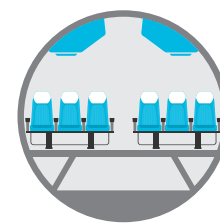
Services to and from Queenstown are currently provided by narrow-body jets such as the Boeing 737 and Airbus 320. These aircraft can service all major New Zealand destinations as well as the east coast of Australia.

Aircraft are classified by codes which relate to the runway length needed for safe take-off and landing, and the wing span of the aircraft. This also influences how many aircraft can sit alongside the terminal. For example, Boeing 737s and the Airbus 320s are classified as Code C or narrow-body aircraft and need a minimum runway length of approximately 1,800m.

We looked at what we would need to accommodate wide-body (Code E) aircraft such as the Boeing 777X or 787 or the Airbus A350. They would offer the advantage of opening up new longer haul non-stop markets as well as more capacity per flight for passengers. These aircraft require a minimum runway length of 2,600 metres.



Wide-body aircraft



Narrow-body aircraft

OUTCOME:

The Master Plan options assume maintaining a narrow-body jet operation and no change to the runway length and type of aircraft servicing Queenstown.

Why we are not going to extend the runway

Based on environmental, economic and social impacts, Queenstown Airport's runway (outlined in white below) will not be extended during the 30-year period to accommodate wide-body aircraft. We do not believe that this would be consistent with the sustainable development of the airport.



QUEENSTOWN AIRPORT

What are the viable options for Queenstown Airport?

Taking into account airport requirements and community needs, we have come up with three options to grow Queenstown Airport. Any of these options would require further aeronautical, operational and safety assessments.

1 **Expand the existing terminal** up to 3.2m passenger movements
(1.6m visitors/residents) per annum

2 **Build a new terminal to the south of the runway** up to 5.1m passenger movements
(2.5m visitors/residents) per annum

3 **Build a new terminal to the north of the runway** up to 5.1m passenger movements
(2.5m visitors/residents) per annum

ALL OPTIONS ASSUME:

- Current consented operating hours (6am to 10pm)
- Current runway length
- No wide-body aircraft
- No more than 5.1 million passenger movements (2.5 million visitors/residents) per annum to 2045





OPTION 1: EXPAND THE EXISTING TERMINAL

**Up to 3.2 million
passenger movements
per annum**

Further expansion would be needed to accommodate potential forecast growth of 3.2 million passenger movements (1.6 million visitors/residents) per annum.

SUMMARY OF DEVELOPMENT

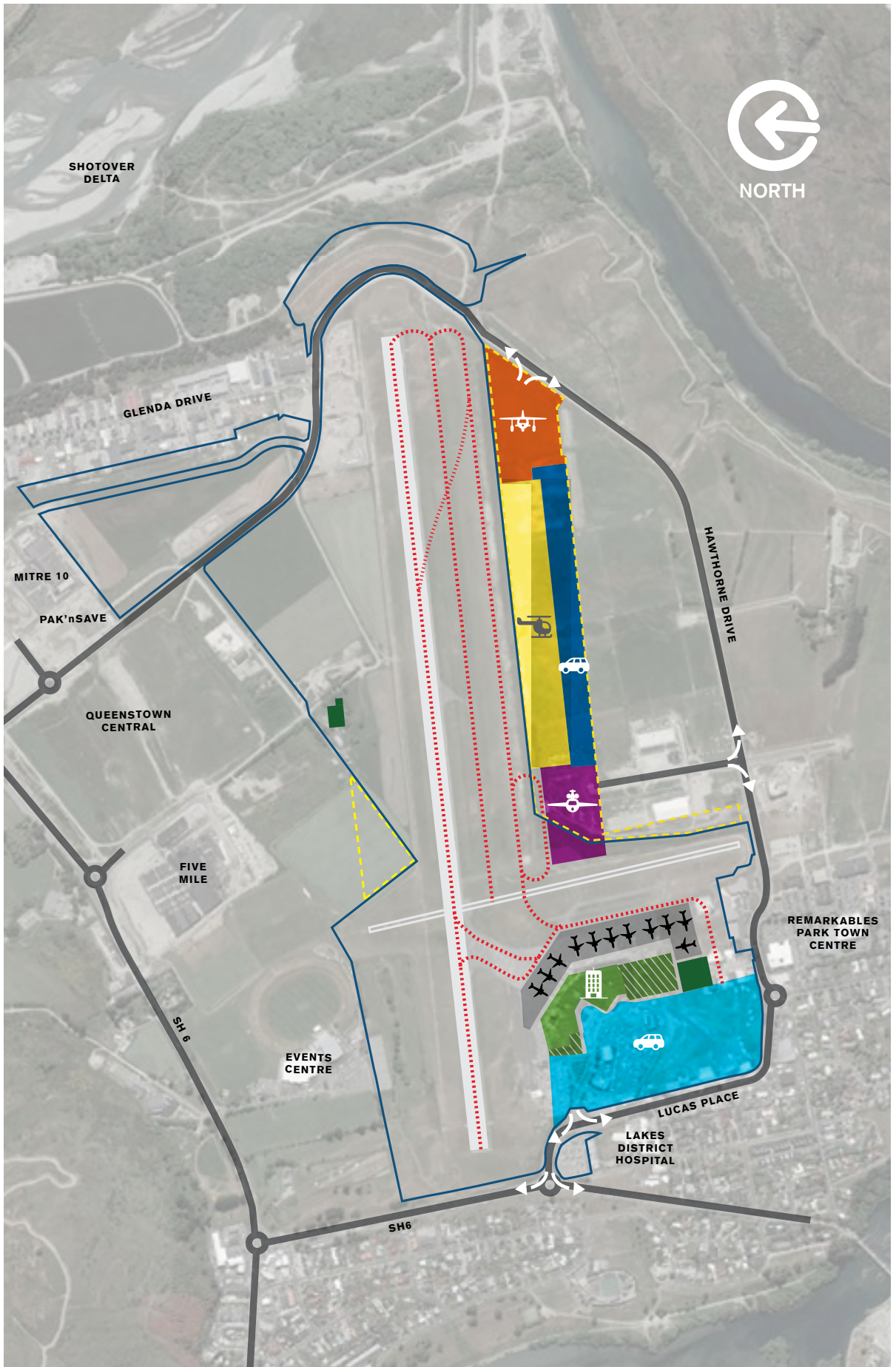
Expansion of existing terminal footprint

11 aircraft stands

New partial heavy parallel taxiway

Purchase of additional land for general aviation and helicopter precincts

Customer parking adjacent to terminal



- | | | |
|--------------------------------------|------------------------------------|-------------------------------|
| Existing Landholding | Supporting Aircraft Infrastructure | GA Precinct (Fixed Wing) |
| New Landholding | Taxiway / Taxi-lanes | GA Surface Access & Terminals |
| Existing Terminal Area | Main Runway | Private Jet Precinct |
| Expanded Terminal Area | Crosswind Runway | Commercial Aircraft Stand |
| Main Terminal Transport/Parking Area | GA Precinct (Helicopters) | |



OPTION 2: BUILD A NEW TERMINAL TO THE SOUTH

Up to 5.1 million
passenger movements
per annum

Should we build a new terminal? It has its advantages. This enables us to develop a facility to grow beyond 3.2 million passengers per annum. It also offers the memorable visitor experience we are aiming for, coupled with operating efficiencies which add to that experience.

SUMMARY OF DEVELOPMENT

New terminal to the south of the runway

13 aircraft stands

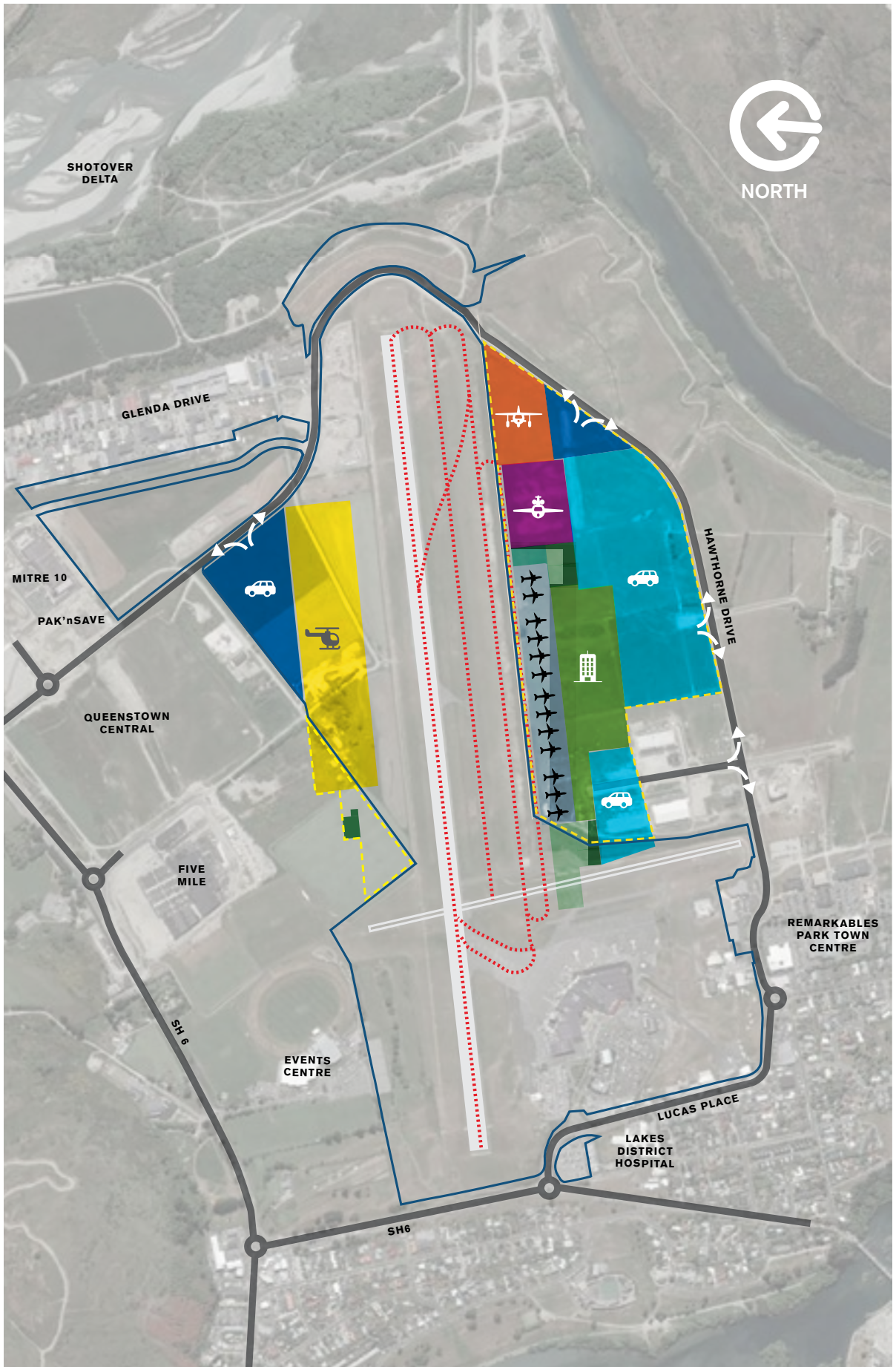
New partial heavy parallel taxiway

Purchase of further land in addition to Option 1

Helicopter precinct located to the north

Fixed wing precinct located to the south,
adjacent to main terminal

Customer parking adjacent to terminal



- Existing Landholding
- New Landholding
- Terminal Area
- Main Terminal Transport/Parking Area
- Supporting Aircraft Infrastructure
- Taxiway / Taxi-lanes
- Main Runway
- Crosswind Runway
- GA Precinct (Helicopters)
- GA Precinct (Fixed Wing)
- GA Surface Access & Terminals
- Private Jet Precinct
- Commercial Aircraft Stand



OPTION 3: BUILD A NEW TERMINAL TO THE NORTH

**Up to 5.1 million
passenger movements
per annum**

SUMMARY OF DEVELOPMENT

New terminal to the north of the runway

13 aircraft stands

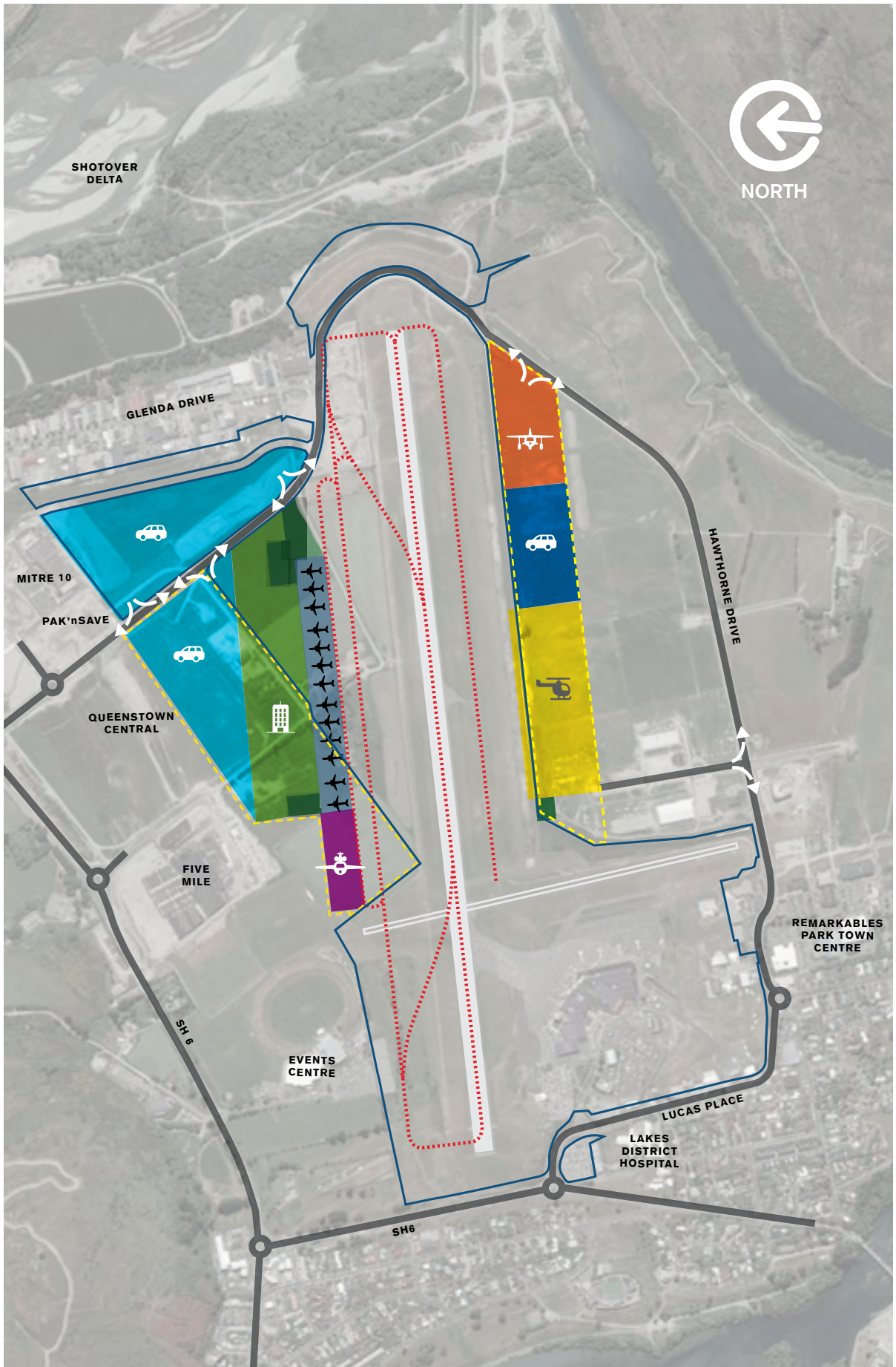
New partial heavy parallel taxiway














Additional taxiway for general aviation and private jets

Purchase of additional land to the north

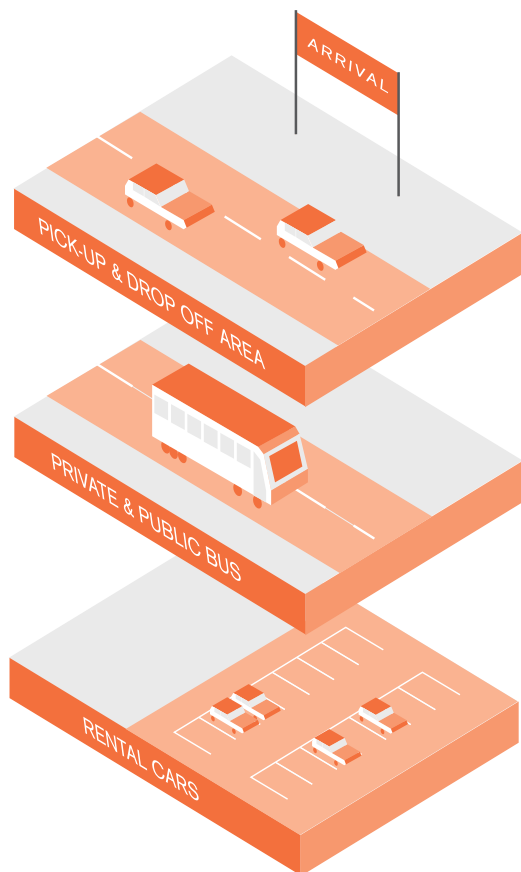
Purchase additional land to accommodate general aviation and helicopter precincts to the south

Customer parking adjacent to terminal



- | | | |
|--|---|---|
|  Existing Landholding |  Taxiway / Taxi-lanes |  GA Surface Access & Terminals |
|  New Landholding |  Main Runway |  Private Jet Precinct |
|  Terminal Area |  Crosswind Runway |  Commercial Aircraft Stand |
|  Main Terminal Transport/Parking Area |  GA Precinct (Helicopters) | |
|  Supporting Aircraft Infrastructure |  GA Precinct (Fixed Wing) | |

What about future transport needs?



Pick-up/drop-off and taxi activity accounts for approximately 36% of passenger movements so there is strong demand for convenient kerbside arrangements.

Bus use is roughly split evenly between private bus (shuttle and coach) and public bus services.

Currently 1/3 of all passengers using the airport arrive or leave in rental cars.

PLANNING THE FUTURE

Transport to and from the airport is an integral part of the customer experience.

We have improved traffic flow and continue to develop a range of parking facilities to meet demand, both now and in the future, that respond to community needs.

Enhanced options for arriving and departing passengers now include free pick-up and drop-off areas, dedicated coach and shuttle transfer areas, and a Park and Ride facility.

Broader planning of roading infrastructure and public transport is being considered by the Queenstown Lakes District Council, the Otago Regional Council and the New Zealand Transport Agency.

Together, we've formed the Transport Governance Group and are working to deliver a series of initiatives to provide transport solutions in the short, medium and long term future.

TECHNOLOGY AND BEHAVIOUR SHIFTS

We are closely monitoring technology and customer behaviour shifts to ensure that we are adaptable to different modes of transport - either by land or water - and that our infrastructure is adaptable and affordable to meet changing needs.

These changes will be considered as part of the detailed design of the final Master Plan option.

MULTI-STOREY CAR PARKING

Multi-storey car parks are not off the table but looking ahead at transport, technology and potential customer behaviour shifts over the next 10-20 years, we would prefer to keep surface car parking in order to remain flexible.



What about noise?

The District Plan identifies aircraft noise contours which protect the operational capability of the airport while managing the effects from aircraft noise on the community.

These contours are shown on the District Plan maps as the Air Noise Boundary and Outer Control Boundary. The airport is managed so that noise from aircraft operations does not exceed 65 dB Ldn beyond the Air Noise Boundary and 55 dB Ldn beyond the Outer Control Boundary.

In 2008, we reviewed and updated the location of the aircraft noise contours to provide for the then projected growth in passenger numbers and associated aircraft operations until the year 2037.

Since then, both the region and the airport have experienced a period of unprecedented growth. We anticipate that the boundaries will be reached earlier than 2037.

NEXT STEPS

We are currently doing more work to understand when the existing contours are likely to be reached and what effect the passenger demand forecasts will have on the future location of the aircraft noise boundaries. If the results show that projected aircraft operations are likely to exceed the existing noise contours ahead of time, then we would need to apply for a District Plan change to accommodate future forecast demand.

This would involve public consultation, with plenty of opportunities for people to tell us what they think before we formally lodge an application.

For more information about what we're doing to manage the impact of aircraft noise on the community please visit our website queenstownairport.co.nz/noise



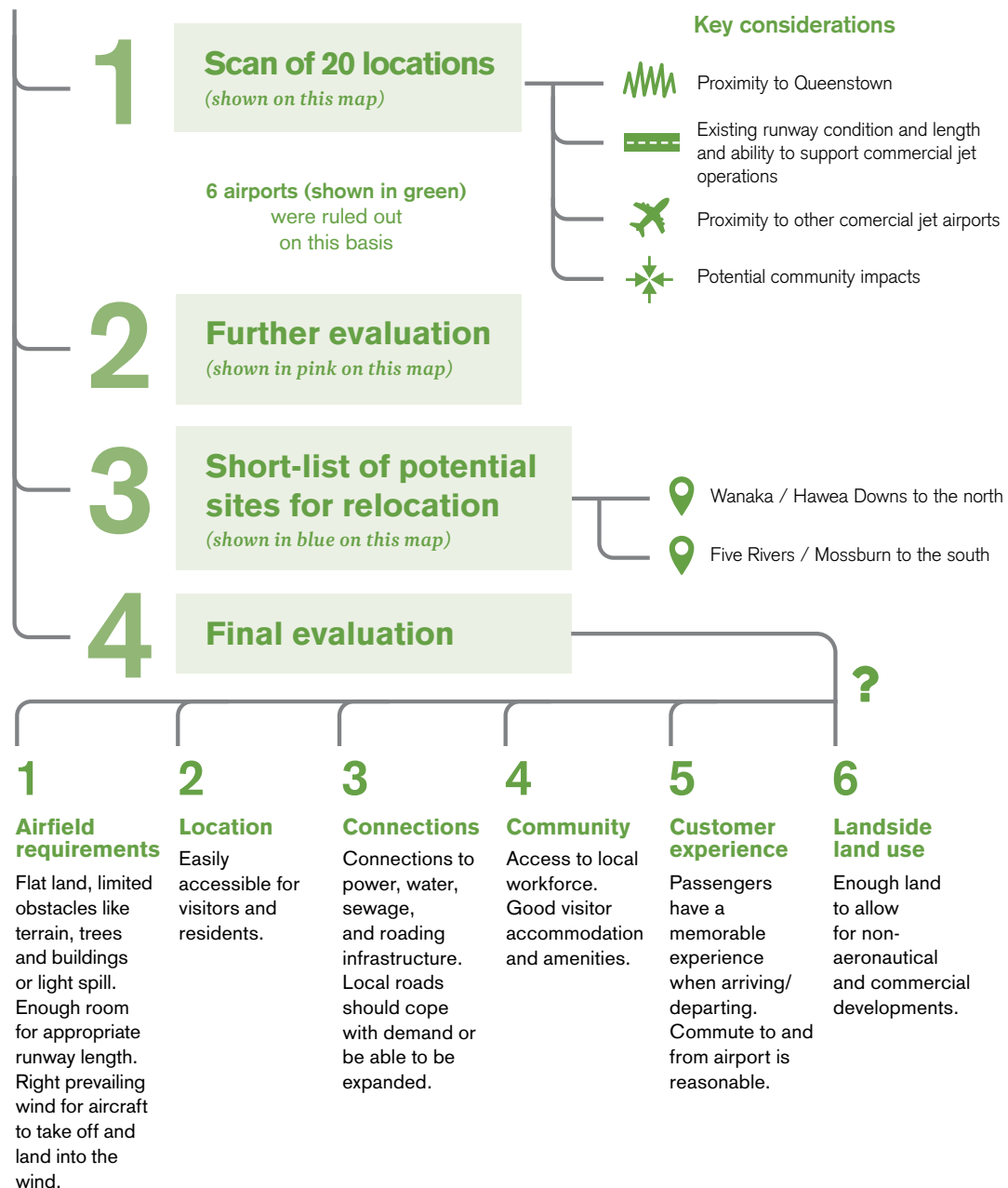
Once we have a better understanding of what the latest passenger demand forecasts mean for the airport's noise contours we'll come back to you and begin a more in-depth discussion.

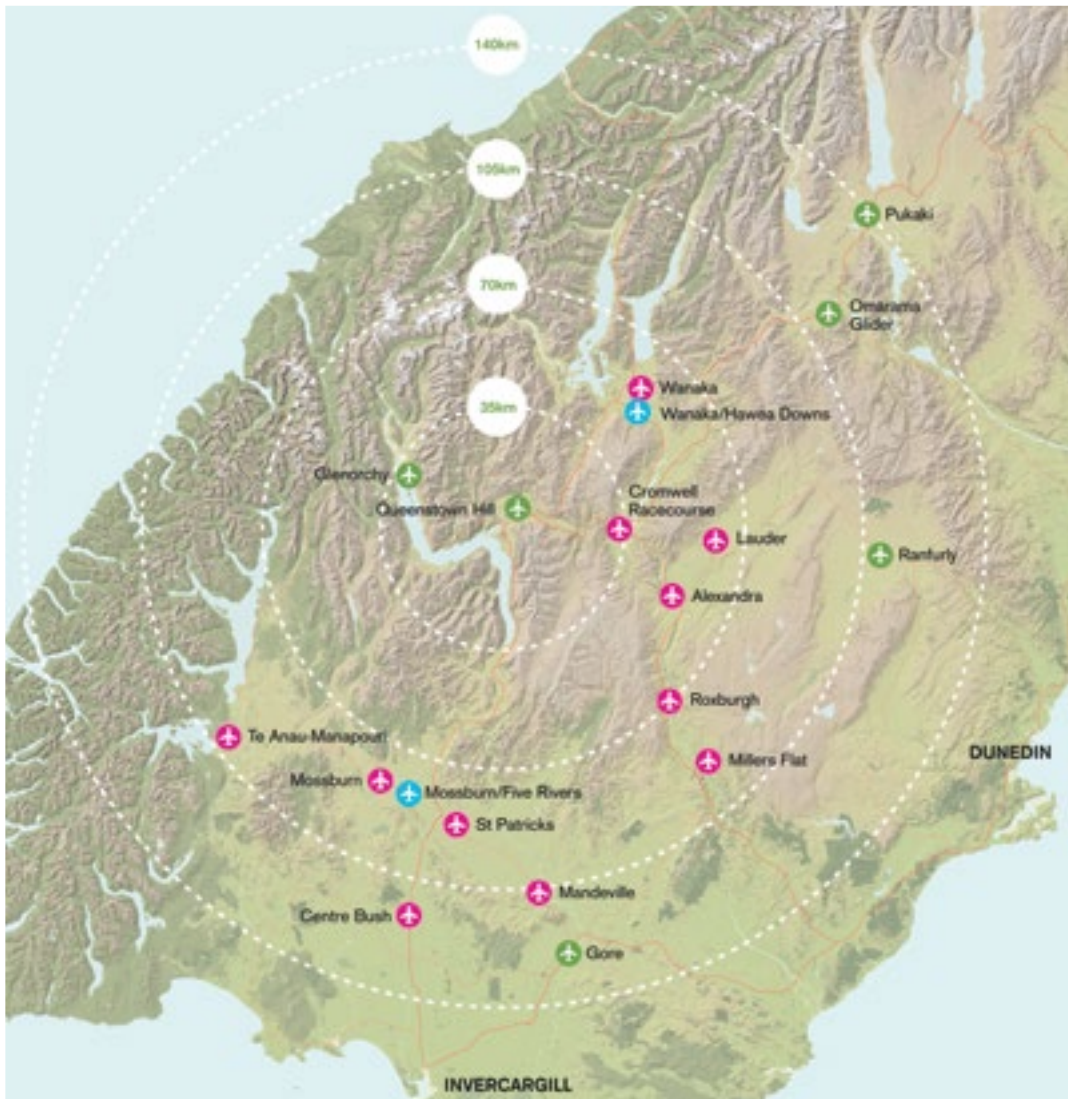


NEW AIRPORT

Should we move the airport?

Moving to a new site has been evaluated. Airports have a number of functional requirements, so we took these into account. A siting study showed that moving the airport was not optimal. Here's the process we went through:





HOW DID THE SHORT-LIST STACK UP?

- Mossburn/Five Rivers** delivered the lowest noise impact on the community and was assessed as being capable of meeting forecast growth. However, it would require a very high capital investment and significant infrastructural development. The distance and roading infrastructure for the volume of traffic to and from Queenstown were also negative factors.
 - Wanaka/Hawea Downs** also delivered capability to handle forecast growth with lower noise impacts, but required very high capital investments both at the airfield and surrounding infrastructure.
- Travel time and customer experience were also factors. The Wanaka/Hawea Downs option was not entirely ruled out but the development of Queenstown Airport and a dual airport model were considered more viable and were taken forward for further consideration.



OUTCOME:

On balance, relocation of the existing airport was ruled out for a number of reasons. These included capital costs, associated roading and other infrastructure requirements, accessibility for customers and workers, as well as environmental impacts.



DUAL AIRPORT

What about Wanaka Airport?

Wanaka Airport complements Queenstown Airport and vice versa. They are both important to the regional tourism industry and the broader economy.

The Queenstown Airport Master Plan options do not include future development plans for Wanaka Airport.

They were prepared ahead of the Queenstown Lakes District Council's decision in April 2017 to grant QAC a long-term lease for Wanaka Airport. However, Wanaka was identified as a complementary airport in our siting study.

We will be talking to the community about the development of Wanaka Airport once the long-term lease is finalised with QLDC.

However, we are interested in hearing any feedback related to Queenstown Airport's Master Plan options and Wanaka Airport's potential future role.



We see Wanaka as a key element of a “one airport business, two complementary airports” approach to support economic growth across the region.

Summary

Based on our work so far, here's where we're at:

Growth is set to continue - Queenstown Airport passenger numbers tripled from 2005 to 2016, and could almost double by 2025.

Working with leading aviation forecast experts, we have developed a robust 30-year passenger demand forecast which shows potential demand to the region (2025 = 3.2m, 2035 = 6.0m, 2045 = 7.1m).

Growth is driven by the attractiveness of the destination and our role is to help facilitate that growth to bring benefits to local/regional/national economies and the communities we serve. But we're all in this together - as a community, what growth can we accommodate and what do we want to accommodate?

We feel that about 5 million passenger movements (2.5 million visitors/residents) per annum over 30 years could be sustainable but want to test that with our stakeholders and communities.

As part of the Master Planning process, a range of options has been researched on how demand could be met. Taking into account airport requirements and community needs, 3 options have been developed for Queenstown Airport:

- Expanding existing terminal facilities
- Relocating and developing new single terminal to the south of the runway
- Relocating and developing new single terminal to the north of the runway

Other decisions we have made for Queenstown Airport as part of the Master Planning process are:

- We will look to progress plans to build a parallel heavy taxiway
- We will remain a narrow-body aircraft airport and will not extend the runway
- We will maintain our consented operating hours (6:00am – 10:00pm)
- General aviation and private jet operations will continue to be a key part of Queenstown Airport
- Various models and sources to fund the future development of the airport will be evaluated

New airport option - based on the results of the siting study, there are no plans to move the airport to a new site.

Dual airport option - we intend to pursue the dual complementary airport model with Queenstown and Wanaka airports. Once the long term lease is finalised with QLDC, we will work with the community on future development plans for Wanaka Airport.



Tell us what you think

After considerable research and engagement with key stakeholders a range of options has been created for the staged development of Queenstown Airport through to 2045. All of the options have different benefits and potential impacts on the communities we serve and the regional economy.

The next stage of the Master Plan process is taking our thinking to date and seeking community views on what a sustainable future looks like and how the airport can achieve the best balance of social, environmental and economic benefits.

We look forward to hearing from you

We'd love to hear what you think about:

The airport's forecasts

The options we have developed

The opportunities you see presented by this Master Plan

Any concerns you have

Any questions you'd like answered

Have your say:

Provide your feedback via our website queenstownairport.co.nz/masterplan

Talk to us at our community Fly-In visits around the region – we'll let you know when we're coming to your area.

Become involved through tourism, business or resident groups to bring us a collective view on what's important.



QUEENSTOWN
airport