

Quarterly and Monthly Transport Indicators – September 2018

Recommendation

That the Board:

- i. Receives this report.

Executive summary

1. The attached Monthly and Quarterly Indicator Reports provide an overview of AT's performance against its Statement of Intent (SOI) performance measures for September 2018, and for the September 2018 quarter. The reports also provide supplementary information on the wider Auckland context as well as AT's public transport, road operations and maintenance, and customer response activities.

Strategic context

2. The past 12 months have shown mixed results for various external indicators, with some metrics showing large decreases year on year, but others experiencing record growth.
3. Auckland population at 30 June 2018 is estimated at 1.696 million, an increase of 2.3%, or 38,600 people, more than the population as at 30 June 2017. This is a smaller increase than in the period between 2013 and 2017, which experienced an average growth of 2.6% per year.¹
4. Although annual net migration into Auckland remains high, the total of 31,417 in the 12 months to September 2018 was 13.7% lower than the 12 months to September 2017.²
5. Auckland employment increased by 4.4% for the 12 months to June 2018 compared with the 12 months to June 2017.³
6. The number of housing consents in Auckland increased by 26.2% in the 12 months to August 2018 compared with the 12 months to August 2017.⁴

¹ Calculation based on data from Statistics NZ, *Subnational Population Estimates at 30 June 2018 (provisional)*.

² Calculation based on data from Statistics NZ, *International Travel and Migration: September 2018*.

³ Calculation based on data from Statistics NZ, *Labour Market Statistics: June 2018*.

⁴ Calculation based on data from Statistics NZ, *Building Consents Issued: August 2018*.

7. GDP in Auckland was up 2.3% for the 12 months to June 2018 compared with the previous year. Growth in New Zealand was 2.7% for the same period. Annual GDP growth in Auckland peaked at 5.4% in the year to December 2016, and has consistently slowed since then.⁵
8. Travel demand over the past twelve months has displayed less growth than the previous two years:
 - Total public transport boardings in the year to September 2018 were 94.0 million, 2.0% ahead of forecast and 4.4% higher for the year to September 2018 compared with the year to September 2017. This is less than the 7.1% growth the year before.
 - Total rail boardings of 20.3 million in the year to September 2018 were 1.1% ahead of forecast, and grew by 0.4% compared with the year to September 2017.
 - The total number of cars registered in Auckland remained relatively unchanged compared with September 2017. The number of cars grew by only 0.5%, an increase of 4,679 cars from 959,300 as at September 2017 to 963,979 cars as at September 2018.
 - Total fuel consumption increased by 1.6% for the 12 months to August 2018 compared with the 12 months to August 2017. However monthly fuel sales in July and August 2018 were lower than their respective volumes in 2017.
 - A total of 20.4 million passenger movements were recorded through Auckland Airport in the 12 months to August 2018, up 5.5% compared with the 12 months to August 2017.⁶
9. In the September 2018 morning peak, 76% of the network operated efficiently at levels of service C or above (50 to 100% of the posted speed limit), one percentage point higher than in September 2017. In the 12 months to September 2018, 77% of the network has been operating efficiently during the morning peak. In general, congestion levels were similar to 2017, which suggests that the Waterview Connection may have offset the 2-3 percentage point annual increase expected this year.

Trends in travel demand

10. This section briefly explores trends in travel demand in an attempt to understand underlying influences, including the potential impact of population growth and petrol prices.
11. Figure 1 illustrates Auckland annual population growth since 2007. Following steady annual growth between 2007 and 2013, population grew very strongly between 2014 and 2017 with 164,000 residents added over four years. Latest population estimates indicate a slight slowing in growth, with an estimated 38,600 residents added to Auckland's population in the year to June 2018.

⁵ Infometrics Quarterly Economic Monitor – June 2018 <https://ecoprofile.infometrics.co.nz/auckland/QuarterlyEconomicMonitor/Gdp>.

⁶ Monthly traffic updates – August 2018 <https://corporate.aucklandairport.co.nz/news/publications/monthly-traffic-updates>

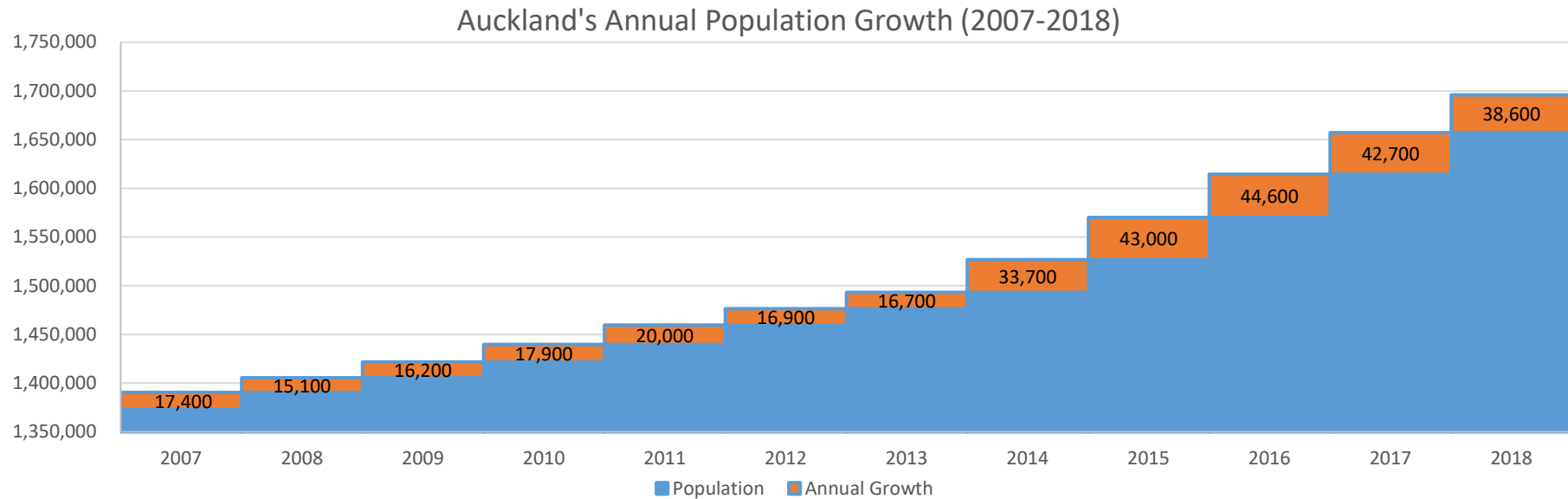


Figure 1: Auckland population and annual growth (measured annually at June 30)

12. Figure 2 illustrates changes since 2007 in New Zealand petrol prices, together with Auckland VKT and public transport boardings.

13. The figure shows the volatility in petrol prices over the past decade, with prices at a low point in early 2009 followed by a period of rapid increase. In the year to April 2011, the price of petrol increased by 20.3%, consistently sitting at this high point (between \$2.10 and \$2.20 per litre) until October 2014. In January 2015, the average cost of petrol in New Zealand fell to \$1.77 per litre, the lowest since 2010. Increased price volatility followed with a series of sharp rises and falls until the end of 2016/17. Since July 2017, the price has increased by 22.4% to a new high of \$2.38 per litre in September 2018, a very similar rise in price to that seen between 2010 and 2011.⁷

⁷ Calculations based on data from Ministry of Business, Innovation & Employment, *Weekly Fuel Price Monitoring – September 2018*

Petrol price, VKT and public transport boardings (indexed at Jan 2007)

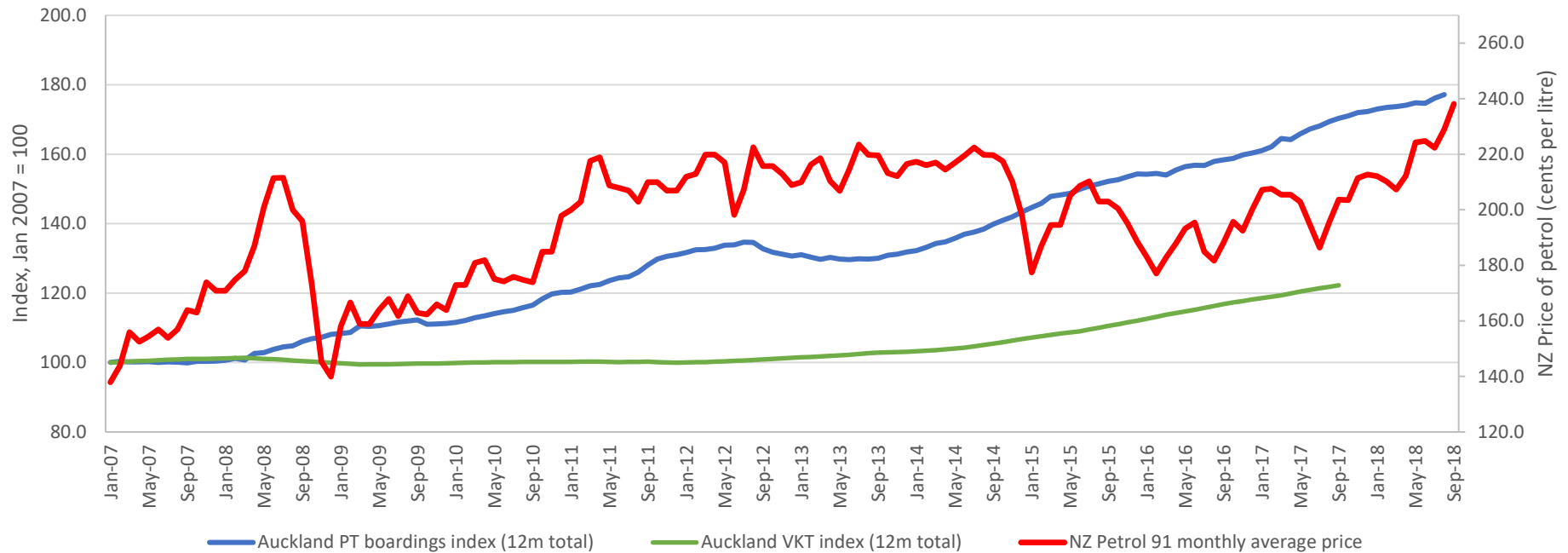


Figure 2: Petrol price, VKT and public transport boardings

14. Auckland annual vehicle kilometres travelled (VKT) remained steady during the period 2009 to 2011, then began to increase in 2012. The rate of annual growth rose to 2.8% in the year to October 2014, to 4.5% in the year to June 2015, and reached a high point of 5.7% in the year to June 2016. It fell slightly to 5.0% in the year to June 2017.⁸
15. Over the past 10 years, annual Auckland public transport boardings have increased by almost 70%, rising from 54.9 million in the year to June 2008 and to 92.4 million in the year to June 2018. Annual patronage growth reached its highest point of 10.1% in March 2015, and has fluctuated since with growth of 4.6% in the year to June 2016, 6.7% to June 2017, and 4.4% to June 2018.

⁸ Calculations based on data from Ministry of Transport, *Transport Volume* (to September 2017)

16. As seen in Figure 1, Auckland’s annual population growth more than doubled in the year to June 2014 compared with the previous years. This corresponds with the increase to Auckland VKT. In order to isolate the effects of population growth, Figure 3 illustrates the trends in Auckland VKT and public transport boardings on a per capita basis.

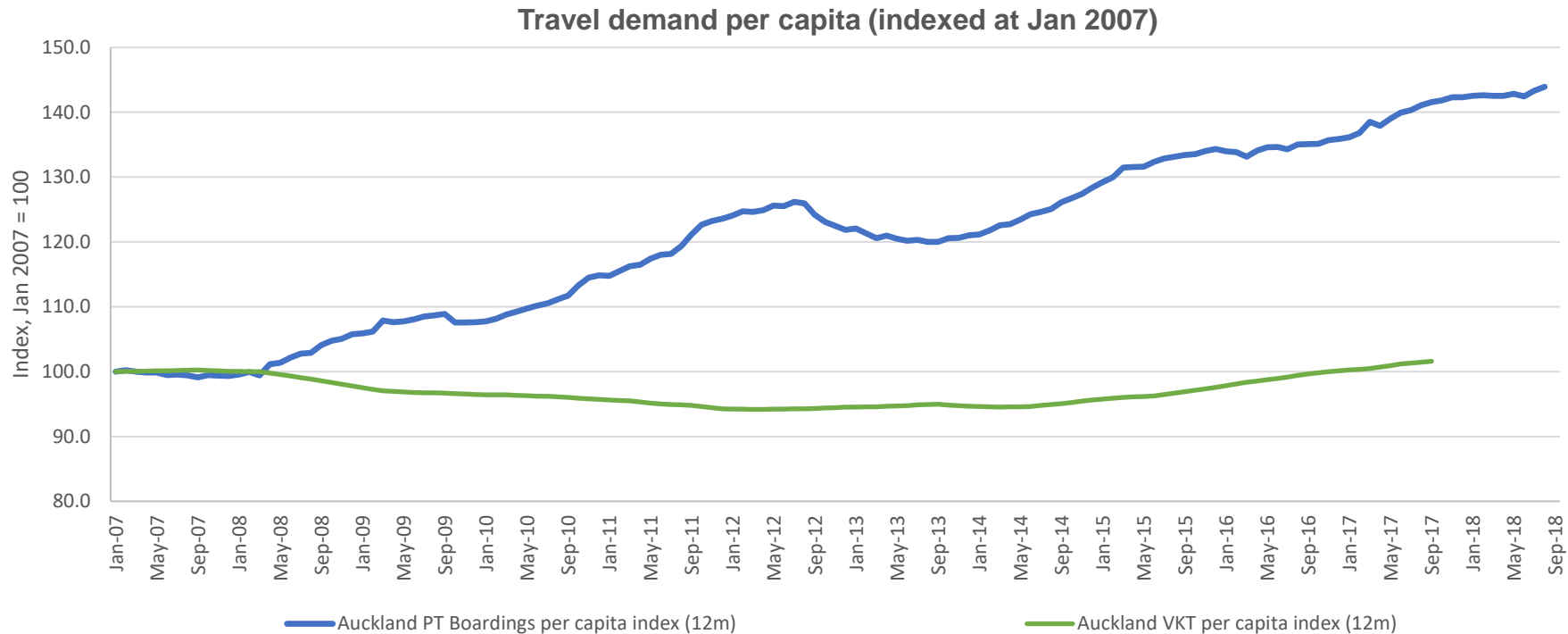


Figure 3: travel demand per capita index

17. Figure 3 shows that VKT per capita started to decline in 2008 and this decline continued until mid-2012. VKT per capita then started to increase, with slow growth at first and then increasing more rapidly from late 2015, peaking in September 2016. VKT data for 2018 is not yet available and, as a result, it is too soon to see the trend in VKT per capita over the last year.

18. The influence of petrol prices on VKT growth and public transport boardings is not entirely clear. Total Auckland VKT appeared to be largely unaffected by rising petrol prices between 2009 and 2011, and began to rise in 2012 despite petrol prices remaining consistently high through to late 2014. However, VKT growth rates increased further as petrol prices fell from January 2015. This suggests that, while petrol prices have had some influence on demand, other drivers such as population growth have been more significant.

19. Public transport boardings per capita have increased by over 40% since 2007. In 2007, there were 38.0 public transport boardings per person and this rose to 54.5 annual boardings by June 2018. Growth rates in public transport boardings per capita have slowed from 3.9% in the year to July 2017, to 1.8% in the year to July 2018, decreasing while petrol prices have risen steadily since July 2017. As with VKT, this suggests that while petrol prices may have had some impact, growth in public transport boardings appears to have responded more to factors such as improvements in the public transport network, congestion levels, and population growth.

Summary of performance against SOI measures

20. Table 1 provides a summary of performance against SOI targets.

Table 1: Performance against SOI targets					
Priorities	Target <u>exceeded</u>	Target <u>met</u>	Target <u>not met</u>	<u>Non-reporting period</u>	<u>Total measures</u>
Deliver an efficient and effective transport system	3	3	1	2	9
Focus on the customer	2	0	1	2	5
Improve the safety of the transport system	1	0	0	1	2
Ensure value for money across AT's activities	1	0	1	4	6
Total	7	3	3	9	22

Highlights from the Quarterly and Monthly reports

21. As reflected in the table above, the September quarterly and monthly reports show a strong start to the 2018/19 year. Some measures that have been underperforming throughout 2017/18 continue to fall short of their SOI targets.

Public Transport

22. After a period of slowed growth through Q3 and Q4 2017/18, total public transport patronage growth has returned to levels last seen at the end of 2016/17.

- Total public transport boardings in the year to September 2018 totalled 94.0 million, an increase of 4.4%, or 4.0 million boardings, on the 12 months to September 2017. This was an increase of 0.4% on the 12 months to August 2018 and is 2.0% ahead of forecast.

- Rail boardings totalled 20.3 million for the 12 months to September 2018, an increase of 0.4%, or 0.1 million boardings, on the 12 months to September 2017. This was an increase of 0.2% on the 12 months to August 2018 and is 1.1% ahead of forecast. However, the 12-month rolling total to September 2018 has decreased by 0.5% compared with the high point of 20.4 million boardings in the 12 months to November 2017.
- Bus boardings totalled 67.6 million for the 12 months to September 2018, an increase of 6.2%, or 3.9 million boardings, on the 12 months to September 2017.
- Ferry boardings totalled 6.1 million for the 12 months to September 2018, a decrease of 0.9% or 53,100 boardings, on the 12 months to September 2017.

23. The total public transport farebox recovery ratio was 45.2% in September 2018, below the SOI target range of 47 to 50%. The year-end projection is 45.1%.

Cycling

24. An SOI target of 10 km has been set for new cycleways for the 2018/19 year. Tamaki Drive (Quay Street 850m extension) cycleway was completed in September 2018. Due to pre-tender delays, budget issues and construction delays, completion of the Links to New Lynn cycleway, due for completion in September 2018, is not now expected until later in the year.

25. The two cycle count targets from the previous SOI have been combined into one target for cycle movements at selected sites around Auckland, with a year-end target of 3.644 million annual cycle movements. The year to date count of 792,659 trips to the end of September 2018 is 5.3% above forecast.

Travel times, congestion levels and safety

26. The 12-month rolling total for local road deaths and serious injuries to June 2018 was 610, 7% lower than the same period the previous year.

27. The SOI target for arterial road productivity has changed from the previous SOI. It is now measured across 30 arterial routes and is the product of the number of vehicles (including buses), their average journey speed and average vehicle occupancy. Year to date arterial productivity is 28,677, 34% above target. The 2018/19 SOI target of 21,000 is equivalent to the route productivity target of 55% included in previous SOIs.

28. During the inter-peak, 94% of the freight network operated efficiently at levels of service C or above in September 2018. This exceeded the SOI target of 85%. The monitored freight network for the purposes of the 2018/19 SOI measures the level of service on a much larger and more comprehensive representation of the network than the previously reported five key freight routes.

Customer experience and satisfaction

29. Overall satisfaction with public transport services was 91%, the same as both the previous quarter and September 2017.

Assets and maintenance

30. In the September 2018 quarter, 36.5 km of local road has been resurfaced or rehabilitated. This is 33% ahead of the forecast of 27.5 km and 8.5% of the 430 km 2018/19 programme.

Attachments

Attachment Number	Description
1	Auckland Transport Quarterly Indicators Report 2018/19 – September 2018
2	Auckland Transport Monthly Indicators Report 2018/19 – September 2018

Document ownership

Submitted by	Christine Perrins Group Manager, Strategic Transport Planning	
Recommended by	Cynthia Gillespie Executive General Manager, Planning & Investment	
Approved for submission by	Shane Ellison Chief Executive	

Glossary

Acronym	Description
SOI	Statement of Intent 2018/19-2020/21
VKT	Vehicle kilometres travelled