



BACKGROUND #1: Vision, Goals, and Targets

Purpose: Why is this topic important to the Regional Transportation Strategy?

Building on Transport 2040, TransLink is proposing a refined vision and set of goals for inclusion in the Regional Transportation Strategy (RTS) to move this region toward a livable, sustainable, and resilient future. Making this a reality requires that we identify **indicators** to monitor progress and **targets** to know when success has been achieved. This backgrounder introduces those proposed indicators and targets.

Proposed Transportation Vision Statement

We maintain our global position as one of the best places in the world to live because we meet our transportation needs in a way that enhances the health of our people and communities, our economy and our environment.



Proposed Goals, Indicators, and Targets

TransLink has proposed four Goals, the critical elements of which are captured in the challenge to support Healthy People and Communities; a Healthy Economy; and a Healthy Environment.

The four Goals are

To make transportation decisions that:

1 Support sustainable transportation choices

People and goods can easily reach the places they need to go using the most efficient mode, time, and route for each trip.

2 Foster safe and healthy communities

People are safer and healthier because there is less motor vehicle traffic, clean air and more opportunities for physical activity and social inclusion.

3 Enable a sustainable and resilient economy

Good access to jobs, reliable travel times, and cost-effective transportation spending increase affordability and support a prosperous economy.

4 Protect the environment

Our land, water, air, and climate are protected because we drive cleaner motor vehicles, drive less, and walk, cycle and take transit more.

The concept here is unique, in that the second, third and fourth goals flow from the first – from the ability of individuals and businesses to access the destinations of their choosing as safely, efficiently, reliably, affordably and cleanly as possible.

It is often not possible to measure these goals directly. Instead, we monitor proxy measures, or indicators. At their most basic, good indicators are simple, meaningful, and measurable. Targets may be set for each indicator, falling somewhere along the continuum between achievable and ambitious. If a target is too conservative, it will be less useful as a guide to decision-making. Conversely, if a target is too aggressive, it may not be meaningful or credible. Ideal targets, therefore, will be ambitious, but achievable if regional policy commitments are implemented.

Sustainable Transportation Choices

TransLink strives to provide and/or support the establishment of an integrated transportation system that facilitates convenient access to all destinations, where we don't have to travel as far to meet our needs, and where it is convenient and affordable to drive less and walk, bike, and take transit more. These objectives may be monitored through:

- overall regional accessibility;
- auto ownership;
- Vehicle Kilometres Travelled (VKT); and
- walk, bike, and transit mode share.



Safe and Healthy Communities

Transportation supports healthy people and communities by ensuring transport safety; ensuring transport security; and reducing isolation, inactivity and respiratory illness. These objectives may be monitored through:

- collision rates;
- incidents of crime;
- criteria air contaminant (CAC) emissions;
- access to services, shopping, and recreational areas; and
- walk and bike mode share.

A Sustainable and Resilient Economy

Transportation supports the economy by improving access to jobs; ensuring efficient goods movement; reducing reliance on fossil fuels; ensuring transportation affordability; and ensuring financial resources are used efficiently. These objectives may be monitored through:

- access to jobs by mode;
- congestion on the road network;
- overcrowding on transit;
- travel time reliability; and
- fuel consumption;

A Healthy Environment

Transportation affects the environment through its contribution to climate change; and its impact on land and land uses. These effects may be monitored through:

- greenhouse gas (GHG) emissions; and
- the urbanized area of this region.



Goals, Indicators, and Targets Summary

The table below provides a summary of proposed RTS goals and indicators, as well as existing targets and (blue-highlighted) proposed Headline Targets, success on which will advance all of the subsequent Goals.

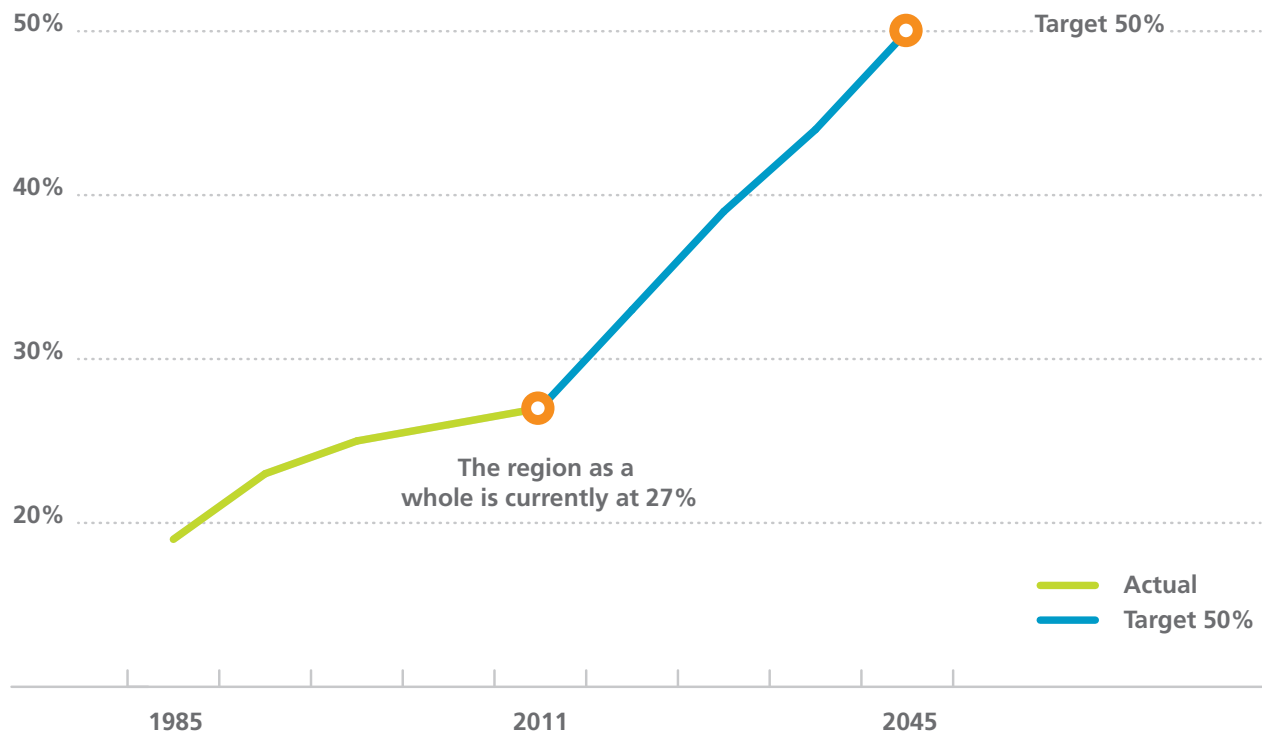
	Goals	Indicators	Targets
<p>Support Sustainable Transportation Choices</p> <p>Our transportation system provides exceptional access to destinations while supporting shorter trips and most trips by walking, cycling, and transit.</p>	Increase walking, cycling, and transit use	Mode share	By 2045: Most trips by walk, cycle, transit modes
	Reduce the need to own a car	Auto ownership	By 2045: TBD
	Reduce distances driven	VKT	By 2045: Total annual VKT does not increase above 2012 levels, which requires VKT per capita to drop by one-third
	Improve regional accessibility	Overall regional accessibility	By 2045: TBD
<p>Enable a Sustainable and Resilient Economy</p> <p>Our transportation system supports a prosperous, competitive and resilient economy.</p>	Improve access to jobs	Access to Jobs	n/a
	Ensure efficient goods movement	Congestion	n/a
	Ensure efficient movement of people	Congestion and overcrowding on transit	n/a
	Ensure reliable goods movement	Travel time reliability	n/a
	Ensure reliable movement of people	Travel time reliability	n/a
	Reduce reliance on fossil fuels	Fuel consumption	n/a
<p>Foster Safe and Healthy Communities</p> <p>Our transportation system improves our health, safety, security and quality of life.</p>	Ensure transport safety	Collision rate	TBD
	Ensure transport security	Crime rate	n/a
	Reduce contribution to respiratory illness	CAC emissions	n/a
	Improve access to communities	Access to services, shopping, and recreation	n/a
	Improve access to communities for residents with limited or no auto availability	Access to jobs, services, shopping, and recreation	n/a
	Increase active transport	Walk and bike mode share	By 2040: 15% cycling mode share for all trips under 8 km
<p>Protect the Environment</p> <p>Our transportation system protects and enhances the health of our climate and ecosystems.</p>	Reduce contribution to climate change	GHG emissions	By 2050: 80% reduction in regional GHG emissions below 2007 levels
	Support a compact urban area	Urbanized area	n/a



Our Transportation Targets

Transport 2040 introduced two regional targets: that by 2040, most trips would occur by walking, cycling or transit; and that the majority of jobs and housing in the region would be located along the Frequent Transit Network (FTN) – the area within which transit service is conveniently available every 15 minutes or less, throughout the day, every day. We have already surpassed the second target. By 2012, 54% of regional dwellings and 66% of regional jobs were located within walking distance of the FTN. We have made less progress on our mode share target. **Current trends will not get us to half of all trips by walk, bike and transit by 2045.** Figure 1 below illustrates the trend in the walk, bike and transit mode share to date and the scale of acceleration in mode shift required to reach the target.

Figure 1: Projected walk, bike, and transit mode share and target.



Notwithstanding the difficulty of meeting this target, the proposed Regional Transportation Strategy affirms that the health of the region’s communities, economy and environment will be best served by having **most trips accomplished by walking, cycling and transit**. It remains one of our highest priorities.

Having achieved our target for proximity to frequent transit, we have identified another important target, to reduce per capita Vehicle Kilometres Travelled (VKT) throughout the region by one-third.



Achieving these targets will require unprecedented and concerted efforts by all agencies. Major investment in new walking, cycling, and transit service and infrastructure is needed. We must also take even bolder steps to manage growth. The region identified the need for more aggressive pricing and management back in 1993 to support our objectives; this recommendation still holds the key to success.

Focus on Mode Share

Is a +50%-by-foot,-bike-and-transit target attainable? What would it take to get there? The scenarios below illustrate what this shift might look like, and the magnitude of the challenge¹.

In 2011, nearly three-quarters of trips in our region were made in private motor vehicles. One way to help “sketch” the future is to look at mode split changes for different parts of the region. Table 1 compares 2011 mode splits for the Burrard Peninsula (the older part of the region – Vancouver, UEL, Burnaby and New Westminster), where transit ridership and walking and cycling rates are already higher, and the Rest of the Region. Note that in 2011, the combined transit, walk, and cycle mode share for the Burrard Peninsula was 40%, still short of the region-wide target.

Table 1 – Total Daily Trips by Mode for 2011 for Burrard Peninsula and Rest of the Region

2011 TRIP DIARY

Mode	Total Region		Burrard Peninsula		Rest of Region	
	%	Trips	%	Trips	%	Trips
Auto	73%	4,427,000	60%	1,432,000	81%	2,997,000
Transit	14%	849,000	22%	525,000	10%	370,000
Walk/Cycle	13%	788,000	18%	429,000	9%	333,000
Transit/Walk/Cycle Total	27%	1,637,000	40%	954,000	19%	703,000
Total	100%	6,065,000	100%	2,386,000	100%	3,700,000

¹ For this discussion, the word “most” is understood as 50%, while the precise split between walking, cycling, and transit is less important than the general direction and magnitude of change suggested by the target. All scenarios are based on TransLink’s 2011 Trip Diary and total number of daily trips by mode (24-hour period). These scenarios assume that the number of trips per capita stays the same at 2.77, but that trips in total increase from 6,065,000 daily in 2011 to 8,800,000 in 2040, reflecting the forecast of a one million increase in population.



Consider now that the City of Vancouver Transportation Plan has set a walking, cycling and transit mode share target of 66%. Figure 2 shows a hypothetical mode split if the whole of the Burrard Peninsula achieved that level; the Rest of the Region would need to achieve the mode splits currently achieved on the Burrard Peninsula (40% walk/cycle/transit) for the region as a whole to meet the target of 50%. Vehicle trips in the Rest of the Region would need to drop from 82% of all trips to 60%; walking, cycling, and transit trips would need to increase by almost four times compared to 2011. This scenario is useful in illustrating the magnitude of the shift required to achieve a regional mode split target of 50%.

Figure 2: Sketch order of magnitude mode splits for 2041 for Burrard Peninsula and Rest of the Region

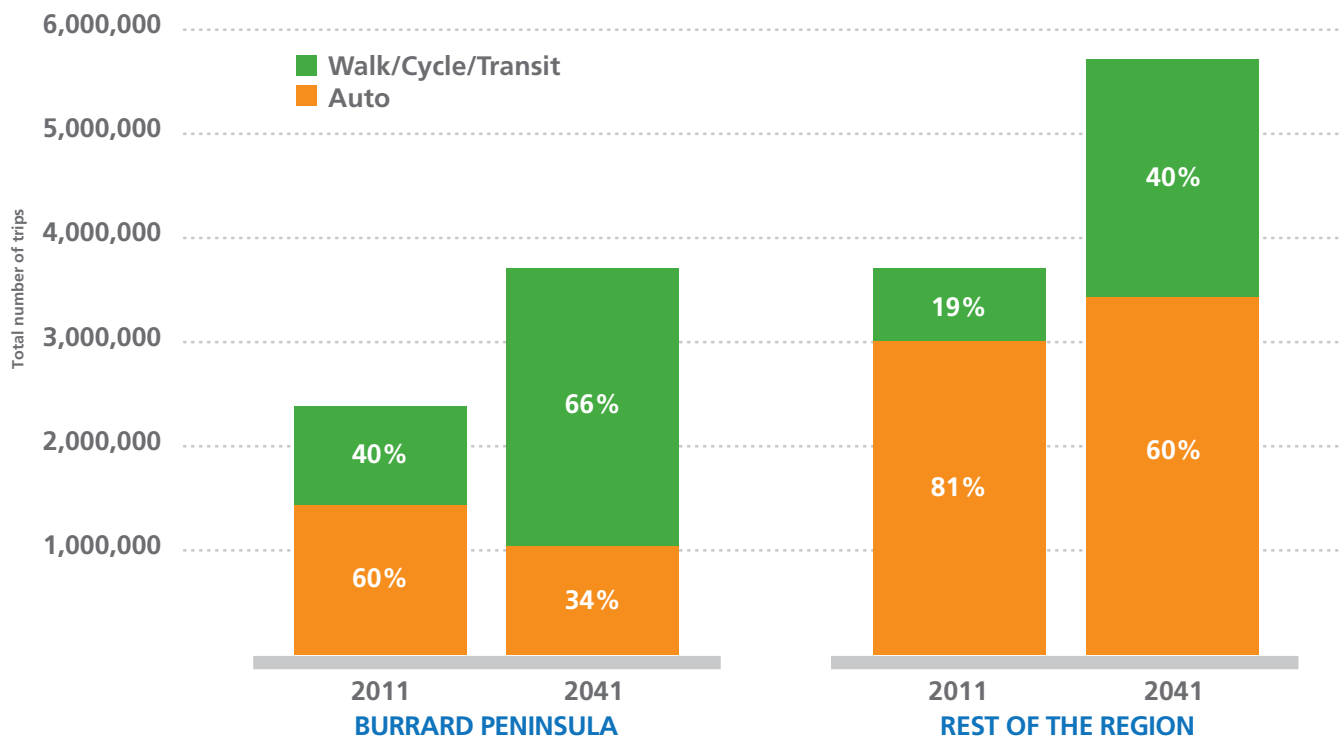
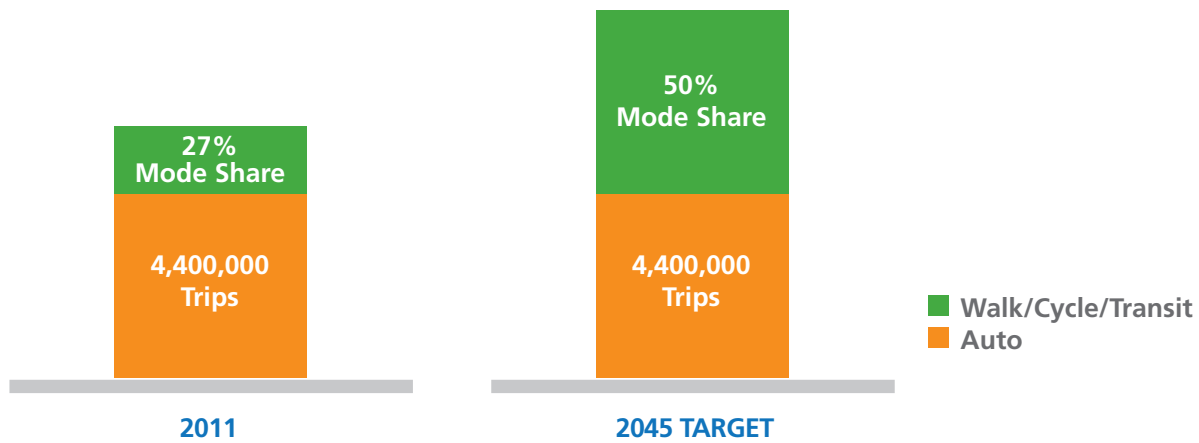


Figure 3 below illustrates that achieving the 50% non-auto mode share target requires that about the same number of auto trips would be made in 2045 than are made today, in spite of expected population growth. This would require major land-use changes enabling all municipalities to reduce at least 25% of trip distances to something practical and convenient by walking and cycling. It would likely require the entire region to exceed the City of Vancouver's current walking and cycling share of 22.5%.



Figure 3 - Sketch order of magnitude mode share scenario



More analysis is needed to determine the precise breakdown between non-auto modes, but it is clear that most future growth in trips would need to be accommodated through walking, cycling, and transit to meet our mode share target.

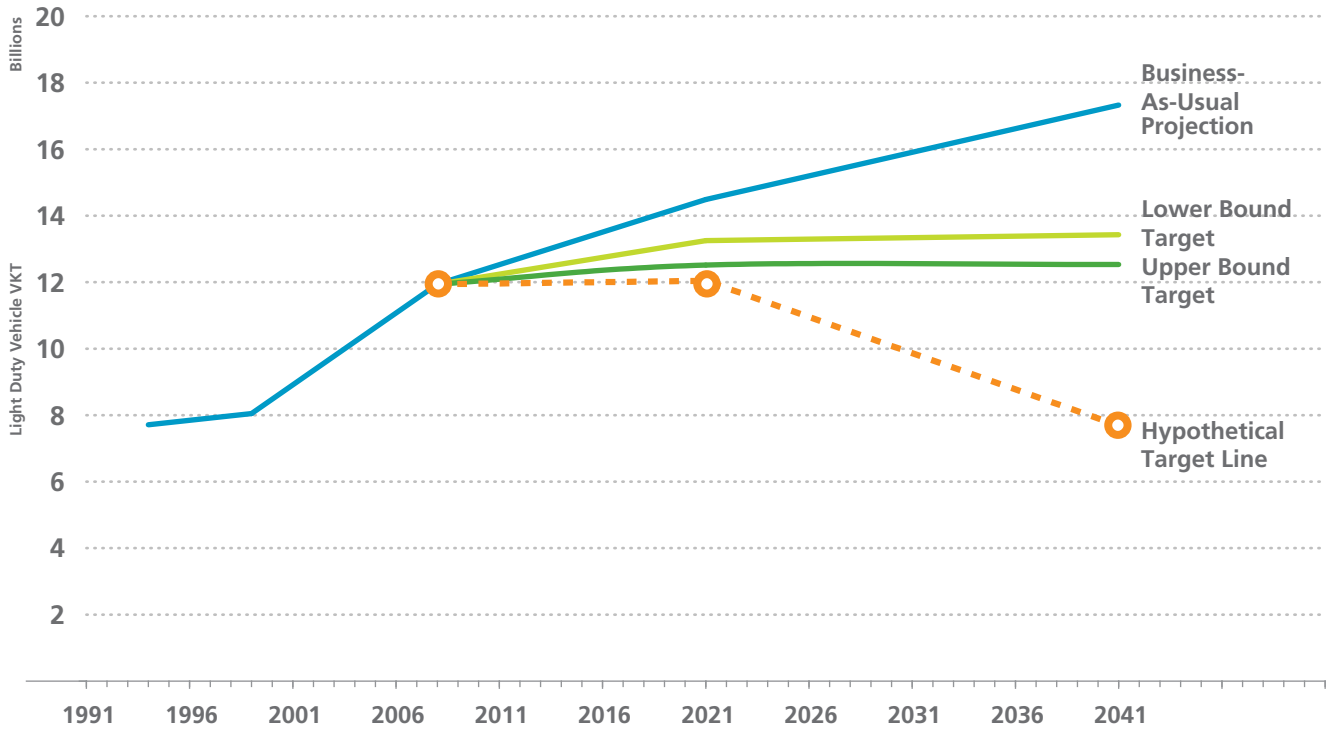
Focus on Less Driving

When we reduce motor vehicle trip lengths, we promote a competitive and efficient economy, with less congestion and more reliable travel times; we spend less on transportation; we reduce traffic injuries and fatalities; we reduce transportation-related pollution and emissions; we reduce social isolation; and there is less chronic disease from physical inactivity. In recent years the amount each of us drove – both in this region and across North America – flattened or even decreased slightly. This trend, a sharp shift after decades of steadily increasing car travel, could continue as our region gets denser and the population gets older. But it could also reverse, quickly and dramatically, as the Metro Vancouver population increases by one million in the next 30 years. In those circumstances, accommodating the associated demand on our almost built-out road network would lead to more congestion, pollution and health issues.

Research by TransLink and Metro Vancouver found that reducing our per capita travel by one-third is ambitious but possible if all the right conditions exist: we get people and jobs in the right places; we price and regulate to manage demand; we invest in supply to optimize the road network without inducing more travel; and we provide convenient and effective choices for walking, biking and transit.



Figure 4: Projected VKT and target ranges.



To achieve this ambitious target, the total number of driving trips made each day will need to stay the same as they are today, even as population rises by one million. The growth in trips will need to be accommodated by walking, cycling, and transit – a task so far unprecedented in North America.