Home on the Range:

Cost pressures and the price of farmland in Metro Vancouver

Highlights

- B.C. is highly dependent on food imports and vulnerable to global food price increases.
- Price increases of 26.2% for fresh vegetable and 9.0% for fresh fruits have been documented between January 2015 and January 2016.
- A food system that increases B.C.'s food self-reliance would decrease dependence on food imports and improve resilience against global food supply and price shocks. However, the high price of farmland in Metro Vancouver currently threatens the viability of such a system.
- Farmland prices in Metro Vancouver range from $150,000 to $350,000 per acre for parcels less than 5 acres, and from $50,000 to $80,000 per acre for parcels more than 40 acres. The financial viability of many farm businesses in B.C. becomes questionable when land prices reach $80,000 per acre.
- New or established farmers who purchase land in Metro Vancouver at prevailing farm prices – and who carry a mortgage to do so – face production costs that would result in anywhere from 10 to 70% higher food prices if they were passed on to consumers.
- Almost one-third of Metro Vancouver's actively farmed land in the Agricultural Land Reserve (ALR) is accessed by farmers through leases from non-farmer landowners.
- Of the total leased farmland in Metro Vancouver, 35% is owned by businesses, many of which are "holding companies."
- The price of small agricultural parcels is influenced by their proximity to urban centres, the cost of residential land in those urban centres, and property tax advantages.
- Upward pressure on the price of larger parcels of agricultural land may result from the infrequency with which they come on the market and their possible appeal to investors.
- Only a small number of landowner applications for removal of farmland from the ALR are successful, but the hope of success may still encourage speculation and be a factor affecting the price of larger parcels of farmland.
- To develop a robust local food system, we need strong policy solutions to address the high price of farmland, to increase the amount of actively farmed land and to discourage the non-farm use of ALR land.

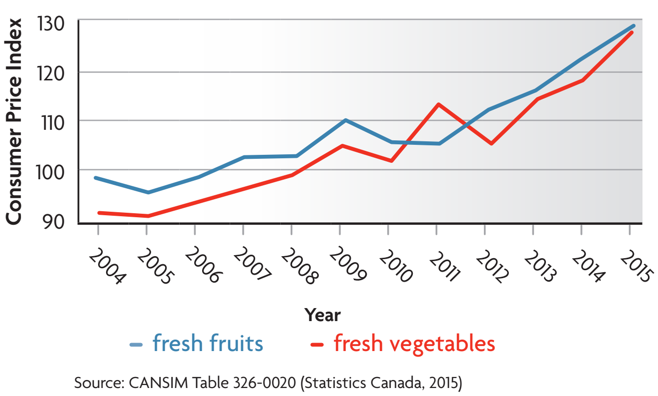
B.C. is vulnerable to global food price increases

B.C. is highly dependent on food imports.[1] We currently source 67% of imported vegetables and 44% of imported fruits from the United States. Over half of these come from California, an area that has seen reduced supply and increased prices due to drought over the past four years.[2] This dependence leaves us vulnerable to global food price increases, which are driven by factors such as climate change-related events,[3] a fluctuating Canadian-US dollar exchange rate,[4] and other global economic and political factors.

The B.C. consumer price index illustrates the rising price of fresh fruits and vegetables in our province (see graph below). Price increases of 26.2% for fresh vegetable and 9.0% for fresh fruits have been documented between January 2015 and January 2016.[5] There is increasing concern that this trend will continue; food price increases of anywhere from 25 to 50% over the next five years have been predicted.[6]

The throne speech delivered to open B.C.'s 2016 legislative session recognized the same complex nexus of issues: "Climate change and increasing demands on water are challenging global agricultural production, in particular in the United States and Mexico where much of our fresh produce is grown. Combined with the current low Canadian dollar, this creates rising food prices, which are putting a strain on B.C. families."[7] Calls for a more resilient, self-reliant food system are increasing and it is clear that action is needed.

B.C. Consumer Price Index for fresh fruits and vegetables



Source: CANSIM Table 326-0020 (Statistics Canada, 2015)

Developing a stronger local food system in Metro Vancouver

A food system that increases B.C.'s food self-reliance (the capacity to meet its own food needs with food grown locally) would decrease our dependence on food imports. In doing so, the food system would become more resilient to global food supply and price shocks. Increasing self-reliance could provide additional benefits such as contributing to the local economy and creating more jobs and economic opportunities. A recent report found that if currently unfarmed agricultural land in Surrey was brought into agricultural production, it could almost double the economic contribution of that municipality's agriculture sector and create more than 1,500 jobs.[8]

Metro Vancouver has many of the elements necessary to grow a resilient, more self-reliant food system, including:

- experienced and aspiring farmers who want to sell food to local buyers
- universities that train and support farmers
- some of Canada's most fertile farmland and
- local government and community interest.[9]

Furthermore, B.C. has strong legislation, the Agricultural Land Commission Act, intended to protect land for farming. This Act is enforced by the Agricultural Land Commission (ALC), an independent administrative tribunal that governs the Agricultural Land Reserve (ALR). The ALR is a provincially legislated zone in which agriculture is recognized as the priority use, farming is encouraged, and non-agricultural uses are controlled.[10]

However, farmers in Metro Vancouver, like farmers across North America, are challenged to operate financially viable businesses under the current global food system structure.

High price of farmland and small share of food dollar challenge the viability of Metro Van farming

Despite the fact that Metro Vancouver has many of the elements for a thriving local food system, there are a number of significant challenges for farmers. If Metro Vancouver farmers are anything like their American counterparts, they typically take home less than 18% of the grocery store price of food.[11] For many farmers, this take-home amount is not enough to cover costs of production. Statistics Canada reported that, collectively, B.C. farmers experienced a net loss of $100 million in 2014.[12]

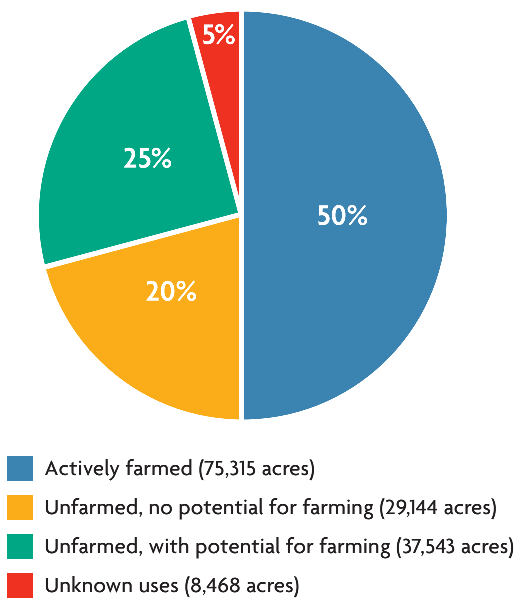
In addition to the financial pressure resulting from the global food system structure, farmers in Metro Vancouver face a unique challenge: the high price of the region's farmland. For agricultural parcels under five acres, prices range from $150,000 to $350,000 per acre. For parcels over 40 acres, prices range from $50,000 to $80,000 per acre. Farm Credit Canada recognizes that the financial viability of many farm businesses becomes questionable when land prices reach $80,000 per acre.[13] Without addressing the high price of farmland in Metro Vancouver, the ability to grow a resilient, more self-reliant food system in this region is severely challenged.

So, what is happening on Metro Vancouver's farmland and what is driving up its price? What are the implications for farmers, consumers and the food system, and what must be done?

The use of Metro Vancouver's Agricultural Land Reserve

Known as both an agricultural and urban centre, Metro Vancouver is one of B.C.'s fastest growing regional districts[14] and includes more than 150,000 acres of ALR land, comprising 22% of the regional district's total land base[15] and almost all of its farmland. About 3,000 non-ALR acres are currently farmed in Metro Vancouver.[16]

Uses of Metro Vancouver ALR Land[17]



Source: Province of British Columbia – Ministry of Agriculture

The Agricultural Land Commission plays an important role, in partnership with local governments, to preserve Metro Vancouver's ALR and to encourage policy and planning that support farm use. Although farming is identified by the ALC as the encouraged priority use for ALR land,[18] a 2010 survey of Metro Vancouver's ALR found that only about 50% of it is actively farmed or used in support of farming.[19] Of the actively farmed land, roughly half is used for pasture or to grow livestock feed. Other major uses are for berry and vegetable production.

About 20% of Metro Vancouver's ALR is described as having little to no potential for farming, either due to natural limitations such as a tendency for flooding or because the land's current use is incompatible with farming.[20] Examples of incompatible uses include parks or protected areas, golf courses, bodies of water and roadways. About 5% has unknown uses. This leaves about 25% of Metro Vancouver's ALR available and suitable for farming. Much of this land is covered by forest, shrubs or grasslands. To bring this land into farming, the natural vegetation would have to be removed. Much of the unused farmland with potential for farming is on small parcels; 39% is on parcels under 10 acres.

The prohibitive cost of farmland

It is an understatement to say that farmland in Metro Vancouver is expensive and that these high prices are a significant challenge to developing a more resilient, self-reliant local food system. A December 2015 review of properties advertised on the B.C. Farm & Ranch Realty Corporation website revealed prices ranging from $1.2 million for an undeveloped 4.5-acre ALR parcel in Delta to $2.35 million for a 20-acre blueberry farm in Surrey to $5.1 million for a 63-acre cranberry and carrot farm in Delta.[21] These values were corroborated through interviews with employees at B.C. Farm & Realty Corp and Farm Credit Canada, who identified the following general price structure based on parcel size (table below). Farmland prices in the Fraser Valley, presented for comparison, are only slightly lower.

Parcel Size	Typical Farmland Price per Acre	
	Metro Vancouver	Fraser Valley
5 acres	$150,000 - $350,000	$80,000 - $110,000
20 acres	$110,000 -$120,000	$70,000 - $80,000
40 - 60 acres	$50,000 - $80,000	$50,000 - $70,000

According to Farm Credit Canada, the financial viability of farm businesses becomes questionable when land prices reach $80,000/acre. The exceptions to this generalization are farms that produce supply-managed commodities. Given this criterion, Metro Vancouver and Fraser Valley farmland would not be attractive to prospective farmers. Existing farmers are challenged to come up with enough money to expand their operations and new farmers are all but shut out of farmland purchases. Some local vegetable and fruit crop farmers have purchased land in the United States and are looking at other provinces for less expensive land than that available in Metro Vancouver.[22]

The high price of agricultural land in Metro Vancouver is not conducive to expanding and developing our local food system.

Farmland prices impact the costs of production

To illustrate how farmland prices in Metro Vancouver impact farmers and their costs of production, consider the example of two hypothetical carrot farms.

Both are 20-acre farms, using organic production methods. Carrots are grown on 18 acres as the remaining two acres are needed for the family home, crop rotation and barns. Using data specific to this region, each carrot farm incurs an estimated $226,000[23] in annual costs of production, not including the cost of land.

On the first farm, the land is purchased by the farm family while on the second farm the land is leased.

On the first farm, the farmer purchases her 20-acre parcel at the price of $2.2 million ($110,000/acre). A financial institution will lend the farmer a maximum of $1.65 million (75% of the parcel's price). The farmer therefore needs a minimum down payment of $550,000. Assuming a 3.5% interest rate and a 25-year term, the down payment works out to $22,700/year if amortized over 25 years and the annual mortgage payment on the $1.65-million loan is about $99,000. Annual property taxes of about $9,500 are also incurred.[24] For this farm, the total annual cost of production including land is therefore $357,200.

On the second farm, the farmer leases his 20-acre ALR parcel for $8,000 per year ($400/acre/year).[25] For this farm, the total annual cost of production including land is therefore $228,000.

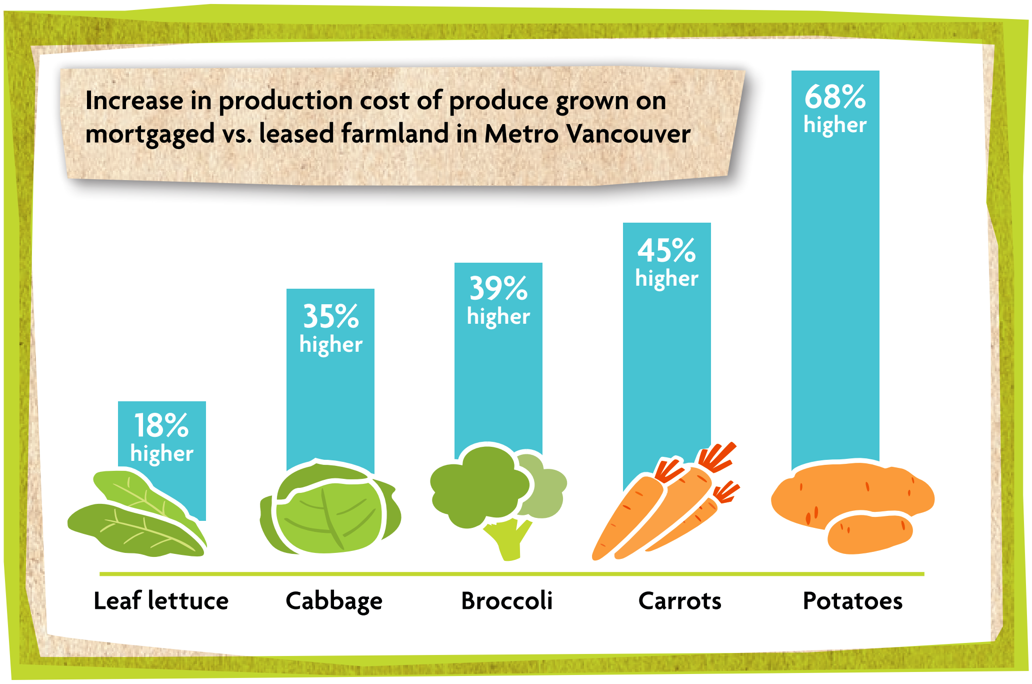
Comparing these two farms, we see that in this example the farm family that purchased its property incurs annual costs that are 50% higher than those incurred by the family that leases its property (see table). This financial burden is in addition to the challenge of coming up with the $550,000 down payment necessary to make a farmland purchase in the first year of their operation.

Annual Cost Category	Farm 1 (Purchased)	Farm 2 (Leased)
Producing carrots on 20 acres	$226,000	$226,000
Mortgage or lease	$99,000	$8,000
Property tax	$9,500	N/A
Down payment amortized over 25 years	$22,700	N/A
Total	**$357,200**	**$234,000**

If both farm families in our example would like to stay above the 2012 low-income cut-off line for a four-person household, each would need to generate a net annual income of about $37,000.[26] Given that the farm family that purchased its property has higher annual costs of production, to achieve this income it must sell carrots at a wholesale price that is about 45% higher than the farm family that leases its land.

Similar wholesale price differences required to cover costs would apply if the farmers in our example grew other crops such as potatoes (68% higher); cabbage (35% higher); broccoli (39% higher) and leaf lettuce (18% higher).

But farming on leased farmland is by no means a long-term solution.



Leasing farmland: a flawed option

Due to the high price of farmland, an increasing number of farmers are leasing farmland to start or expand their farm businesses.[27] Although leasing is more financially feasible than purchasing land, most farmers do not see it as a long-term business strategy. In a recent survey of prospective farmers, 100% of respondents indicated that their long-term goal is to own rather than lease farmland.[28] Leasing is often seen as an important option for new farmers who have difficulty finding affordable land near urban markets. The challenge that leasing presents to establishing sustainable farming businesses is that fewer capital investments and land stewardship practices are made on leased farmland because of the short-term tenure of agreements as well as the risk of losing any financial investment in buildings, irrigation or drainage infrastructure. Given these limitations, a food system built around the practice of farmland leasing is not sustainable.

Almost one-third of Metro Vancouver's actively farmed ALR land is accessed by farmers through leases from non-farmer landowners.[29] Of this non-farmer-owned land, 60% (14,594 acres) is owned by individuals and 35% (8,456 acres) by businesses. The remaining 5% is owned by government and non-profits. The predominant businesses (57%) leasing farmland are holding properties, which according to Metro Vancouver are "distinguished by having terms such a holding, investment, estate, property, land or development in their name".[30] These businesses collectively own 20% of all leased land (4,860 acres).

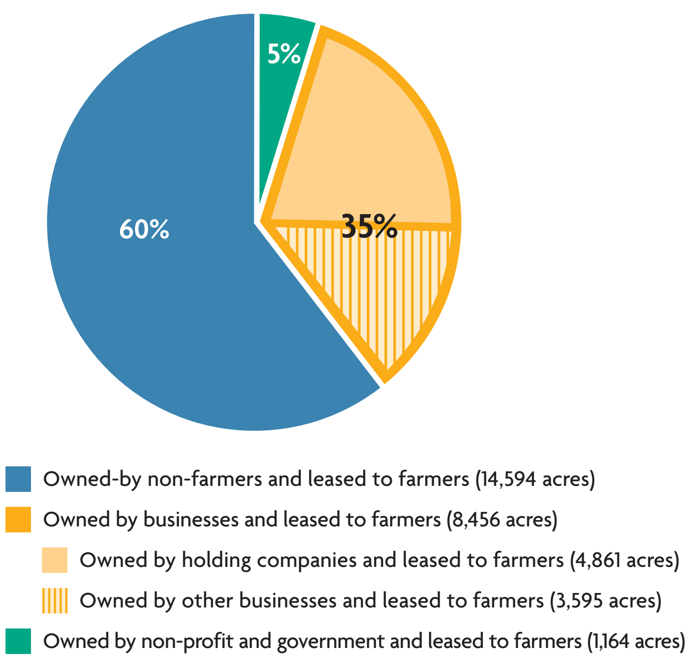
The significant non-farmer ownership of leased agricultural land raises concerns that land is potentially being purchased on speculation for future estate homes or development.

Real-estate pressures influence farmland prices

Farmland prices should reflect the capacity of the land to support a financially profitable agricultural business. This is not currently the case in Metro Vancouver.[32] Rising residential land prices in urban centres have a spill-over effect on nearby parcels of agricultural land, particularly those under 10 acres. Non-farmers who purchase land for long-term investments are sometimes willing to pay premium prices. This is illustrated by farmland sales data from 1990 to 2015 provided by Landcor Data Corporation (below), which shows a marked difference between both the price per acre and the price volatility for smaller versus larger parcels of farmland. Over this 25-year period, larger parcels have seen a steady increase in value, while the cost per acre for smaller parcels has fluctuated wildly and increased exponentially for select properties.

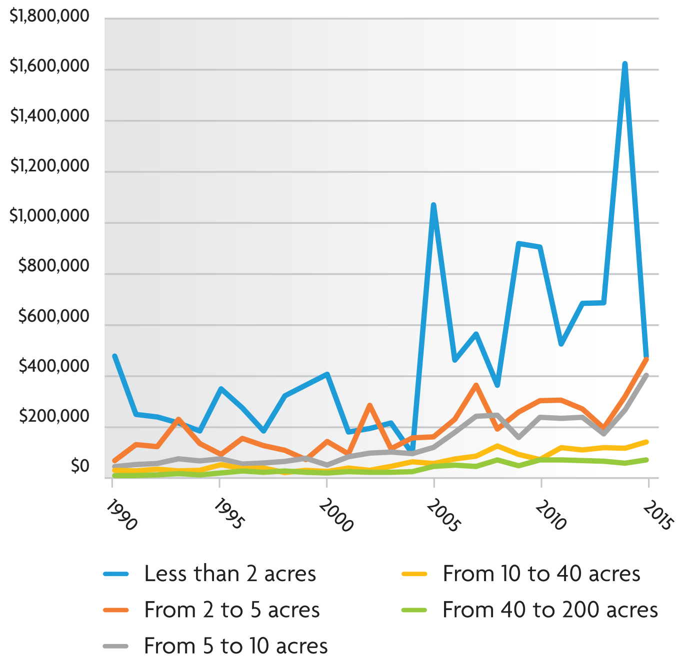
Non-farm residential and commercial use of agricultural land likely plays a role in raising land prices because it contributes to scarcity of land available for farming. How much any one factor influences prices is unknown. Given the high cost of land relative to farm business income potential, it is clear that the one factor that should dictate agricultural land prices – farm business viability – is not.

Actively farmed land that is owned by non-farmers[31]



Source: Metro Vancouver 2015

Farmland sales – average price per acre, Greater Vancouver[33]



Source: Landcor Data Corporation

Factors affecting the price of small parcels of farmland

Three factors putting pressure on the price of one- to 10-acre agricultural parcels are: proximity to urban centres, the cost of residential land in those urban centres and property tax advantages. Small agricultural parcels close to urban centres are ideal for farmers building businesses based on mixed crops sold through alternative markets such as community supported agriculture, farmers markets and food co-operatives. However, prospective farmers are in competition for prime agricultural land with developers and purchasers of estate homes (larger than average residences on agricultural land) seeking to avoid the high cost of residential land. In Richmond, Surrey and Delta, for example, residential land prices hover around $500,000 per acre[34] (roughly twice the price of agricultural land). Small agricultural parcels in Metro Vancouver are becoming increasingly appealing to non-farmer buyers.

In addition to lower land prices, owners of estate homes built on land where agriculture is permitted (such as ALR) can gain property tax advantages.[35] To qualify for reduced property tax, an owner must report a minimum annual farm income (earnings derived from the production and sale of qualifying agricultural products). For properties smaller than 1.98 acres, the minimum required farm income is $10,000, and for parcels between 1.98 and 10 acres, the minimum is $2,500.[36] Sufficient farm incomes can be generated with minimal farming activities, for example, producing hay or providing pasture for rent. Anecdotal reports suggest that most estate home owners are achieving these minimums from non-food agricultural products such as hay, pasture and trees, rather than from food produced for local consumption. Non-food products play a part in farm viability, but a balance should be encouraged to support local food production.

There is little information about the number of estate homes that have been developed on agricultural parcels in Metro Vancouver or of their influence on agricultural land prices. It has been suggested that each time a parcel of land is sold for estate-home development it sets a new, higher benchmark for the price of similar agricultural parcels, a benchmark based on its value as a luxury residential property instead of as a working farm.[37]

Factors affecting the price of larger parcels of farmland

Upward pressure on the price of larger parcels of agricultural land (more than 20 acres) may result from the infrequency with which they come on the market and their possible appeal to investors. A realtor with B.C. Farm & Ranch Realty Corp. reported that the majority of parcels over 20 acres purchased in Metro Vancouver are bought for the purpose of farming.[38] Once purchased, properties typically do not come back on the market for 20 years or more. When they do appear, new benchmark prices are set by farmers looking to start or expand their businesses. Many buyers are existing farmers or members of farm families, and have non-farm earnings that supplement their annual incomes.

Although less common, another reason for the upward pressure on larger parcels may be that historic price increases make them appealing as long-term investments to buyers who are not farmers.[39] Non-farmer investors generally lease their land to local farmers while holding it for future resale. Depending on its location, land removed from the ALR may see a dramatic increase in price as removal makes it available for non-agricultural uses such as housing development. Only a small number of landowner applications for removal are successful, however the possibility of success may still encourage speculation and be a factor affecting the price of larger parcels of farmland.

Recommendations to address the price of farmland and improve the viability of farming

To develop a resilient and secure food system that buffers against factors such as climate change, a fluctuating Canadian-US dollar exchange rate and reliance on food imports, farming needs to be financially viable. The high price of farmland in Metro Vancouver is a challenge to the financial viability for existing and new farmers and needs to be addressed.

The extent to which non-farm uses, estate home development, exclusions from ALR, and un-farmed agricultural land impact land price has not fully been determined. However, in an environment where agricultural land prices per acre do not reflect the farm business potential of the land, these activities do not improve conditions for prospective and existing farmers. Nor do they encourage the development of a local food system in which local products can be purchased at affordable prices.

What is needed are stronger policy solutions and partnerships at the municipal, regional and provincial level to address the high price of farmland, increase the amount of actively farmed land and discourage non-farm uses of ALR land.

- **Bringing unfarmed ALR land that is available and suitable for farming into production is one way to increase local food production and encourage a more self-reliant local food system.** Metro Vancouver's regional and municipal governments have been pursuing policies aimed at ensuring ALR land is farmed. Corporation of Delta zoning bylaws discourage the development of estate homes on ALR by limiting the maximum size of residential dwellings and specifying their location on the property to minimize intrusion onto farmable land.[40] City of Surrey policy severely restricts the ability of landowners to have their land excluded from the ALR by requiring that any exclusion is offset by the inclusion of an area within the City of Surrey that is twice as large.[41]
- **Innovative partnerships that support new farmers to develop farming and business skills, and assist them in accessing available land, have an important role to play in increasing our local food supply and creating new jobs.** Several such initiatives already exist across Metro Vancouver but their reach and scale should be expanded. For example, The City of Richmond has partnered with Kwantlen Polytechnic University in the development of the Richmond Farm School and incubator farm, where eligible students can access up to a half acre of municipally owned land for three years to begin their agricultural enterprises. The City of Surrey is exploring a virtual farm incubator project to support new farmers to develop their businesses and assist them in locating farm sites.
- **Taxation can provide a powerful incentive and/or disincentive for increasing actively farmed land and discouraging non-farm use of ALR land.** Metro Vancouver has been leading important work to identify the most effective taxation policy options to protect agricultural land for farming, increase the amount of actively farmed land and discourage non-farm use of ALR land. Options include reconsidering how land in the ALR is classified and valued related to taxation, and changing the minimum annual farm income required to achieve farm class tax status. This is being done in consultation with municipalities, provincial agencies and the private sector. It is critical that all these actors work together to ensure that eventual policy changes are supported and enforced by local and provincial governments.
- **Register long-term leases on the title of the property.** This can minimize the risk associated with investing in farm infrastructure and soil fertility because it ensures the lease is transferred to a new owner if the land is sold.
- **Gather additional information on farm ownership and land use in the ALR.** There is a relative lack of data about what is happening on the ground. Provincial and local governments need to partner with researchers. Adequate data and information are required to understand the issues facing farmers.
- **Local policies and initiatives must be complemented by provincial policies aimed at moderating the price of agricultural land.** Bold, forward-thinking examples include an outright end to applications for ALR exclusion or non-farm use, and a formal requirement that ALR land is farmed. Perhaps ALR should only be owned by appropriately trained or skilled professional farmers.
- **There needs to be a strong and well-resourced Agricultural Land Commission that is backed and equipped to fulfil its mandate to preserve agricultural land, encourage farming, and support farm use of agriculture land in policy and planning at all levels.** The most recent provincial budget[42] announced additional resources for the Agricultural Land Commission. This is an important step in ensuring the resources for the commission to fulfill its mandate to ensure agricultural land is being protected and actively farmed.

Without strong policy solutions and efforts to improve the viability of farming, forces driving the high price of farmland may foreclose the possibility of a robust local food system in Metro Vancouver.

Methodology and Authorship

This report was commissioned by Vancity and written by members of the Institute for Sustainable Food Systems at Kwantlen Polytechnic University (Dr. Cornelia Sussmann, Caitlin Dorward, Dr. Wallapak Polasub, Dr. Kent Mullinix) and the BC Food Systems Network (Brent Mansfield). Data and information were gathered between September 2015 and March 2016. In addition to secondary data sources, telephone and email interviews were conducted with representatives from financial and real estate agencies as well as local governments. Information not attributed to a written source was obtained from these interviews.

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32. Farm Credit Canada staff, interview with Kent Mullinix, October 5, 2015.
B.C. Farm & Ranch Realty Corporation, interview with Kent Mullinix and Cornelia Sussmann, September 24, 2015.

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Under the BC Assessment Act, land may qualify for farm class status and associated property tax reductions if it is used for a qualifying agricultural use or purposes that contribute to a qualifying agricultural use (e.g., irrigation, access to farm outbuildings, shelter belts), used for a farmer's dwelling; used for a retired farmer's dwelling in the ALR, used for the training and boarding of horses when operated in conjunction with horse rearing; and in some cases, vacant land associated with a farm. Land does not necessarily need to be ALR in order to qualify. (www.bcassessment.ca/)

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