

PROTECTION IS NOT ENOUGH:

Policy Precedents to Increase the Agricultural Use of British Columbia's Farmland



A White Paper



The Institute for Sustainable Food Systems (ISFS) is an applied research and extension unit at Kwantlen Polytechnic University that investigates and supports sustainable agriculture and regional food systems as key elements of sustainable communities. We focus predominantly on British Columbia but also extend our programming to other regions. Our applied research focuses on the potential of regional food systems in terms of agriculture and food, economics, community health, policy, and environmental integrity. Our extension programming provides information and support for farmers, communities, business, policy makers, and others. Community collaboration is central to our approach.

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To access the White Paper Brief and Appendix: https://www.kpu.ca/isfs/agricultural-land-use-in-the-alr

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FOREWARD

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Orchardist, Kelowna, BC

Former Chair, Agriculture Land Commission- June 11, 2010 - May 14, 2015

Agricultural land not only feeds us, it is the heart around which stable communities have and will continue to develop and prosper over the long term. In this province, where farmland scarcity is so obvious, a diversity of large and small scale agriculture importantly binds our communities and province together to provide any semblance of control over our food security and food self-reliance. It is imperative that we keep agricultural land and food production front and center in debates regarding natural resources such as pipelines, LNG, hydro-electricity generation and beyond. We forget, and at our great peril, that the most fundamentally important resource is agricultural land and its ability to produce food for us when put to its only proper use.

The original drafters of the Agricultural Land Commission (ALC) and Agricultural Land Reserve (ALR) conceived and implemented legislation and regulation that, at the time, was unique to North America. But it was not unique in other parts of the world where the critical importance of farmland preservation, food production, and food security was recognized. In order to guard against potential errors in the demarcation of the original ALR boundary, the legislation was strongly biased toward accommodating ALR exclusion applications. This bias has long since served its purpose and now threatens the integrity of the ALR and viability of the ALC. Serious consideration should be given to eliminating the ability to exclude land from the ALR and to ensure that agricultural vitality of land within the ALR is maintained.

The work of this White Paper is a fine example of how our academic institutions can help us; in this instance how applied research, new information, and new thinking can inform our discourse and deliberations and help move the ALC legislation forward for the next generation. I would like to commend the Institute for Sustainable Food Systems for its relentless support of agriculture, for its pursuit of food systems that benefit our communities, and for championing a vital ALC and ALR.

The White Paper reports that there is lots of agricultural land laying fallow, not being actively farmed. While this is the case, it is not any sort of indication that this land should be used for purposes other than farming- it should not. On the contrary it is indicative of two things: 1) first and foremost that the ALC has effectively prevented the loss of a precious, non-renewable resource- BC's farmland, and 2) there has been a larger failure to foster wider economic viability and a diversity of opportunities in our food production sector. The ALC has in fact made sure that these lands were not lost to future generations. As the population of our province grows and new crops and opportunities are developed, society will find a way of getting this resource into the hands of a new generation of farmers who will put it to work, sustainably, and to all our benefit.

After 40 years of experience, the ALC is positioned to move to the next stage, one in which the ALR is accepted as simply being a part of who we are. A future in which constant arguments as to whether the ALR is good or bad cease. The timing of the white paper couldn't be better. This work should fit nicely into the deliberations of the Minister's Task Force reviewing and strengthening the ALC. The Task Force should be able to forward a set of recommendations to the Minister that entrench the ALC as part of who we are. Then the Minister must be bold in her recommendations to move this key legislation forward.

At this juncture, simply tweaking the legislation is not an option.

Richard Bullock, February 13, 2018

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1. Introduction: Regional Food Systems and Farmland in British Columbia

Our current dominant food system depends on a globalized network of supply chains that increasingly disconnect us from the processes and people responsible for bringing food to our plates. This globalized food system externalizes many social, economic and environmental costs, which are experienced by local communities throughout the world (Holt-Giménez, 2017). These include pesticide contamination, water pollution, soil degradation, diet-related diseases, biodiversity loss, the erosion of rural economies, and unjust working conditions for farmworkers, among others (Clapp, 2012; Kimbrell, 2002; Patel, 2008). However, the profits from a globalized food system accrue primarily to stakeholders who are often distanced from many of these impacts, yet maintain a disproportionate amount of power in deciding upon the terms (Clapp, 2012; Clapp, 2014; Nestle, 2002; IPES Food, 2017).

Regional food systems, which strive to shorten supply chains and increase food self-reliance, can amplify the influence of a local community on their food system. Shorter supply chains, that prioritize regional interests and reflect regional constraints, can facilitate more transparent relationships and flows of information along the supply chain, enhancing the potential for local policy and action to address food system externalities (Klassen & Wittman, 2017). Additionally, regional food systems can allow a greater portion of food system profits to flow through the local economy, increasing the economic benefit for the region. As a result, communities, governments and citizen organizations are increasingly advocating for regional food systems in order to address the growing concerns of our globalized food system (MacRae & Donahue, 2013).

Furthermore, over- reliance on global food systems raises questions for food security in BC. As the effects of climate change, such as extreme weather events, increased pest pressures, variability and drought/flooding impact global food supply networks and Canadian food prices (Charlebois et. al., 2017) it is prudent to strengthen regional food systems (Crawford & Beveridge, 2013) and advance British Columbia's (BC) regional food self-reliance as one way to address potential global food system instability.

While the global food trade will remain a significant component of the food system, strengthening regional food systems presents a substantial opportunity to improve community and environmental wellbeing. Advancing regional food systems in BC requires that the limited agricultural land in the province be both protected and productively used. Only 5% of BC's land base is designated as agricultural land (Agricultural Land Commission, 2017). However, much of the province's limited farmland is currently not used for agricultural purposes (BC Ministry of Agriculture, n.d.). As such, the underutilization of BC's farmland is at the forefront of any discussion of regional food systems.

While BC's Agricultural Land Reserve has been established to protect agricultural lands by regulating land uses, it has been observed that farmland protection is not sufficient to ensure its productive use (Mullinix et al., 2013). Only 50% of the province's agricultural land is under production (BC Ministry of Agriculture, 2016). In light of these challenges, and in recognition that policy drives change, this White Paper identifies policies adopted in other jurisdictions in Canada and abroad that address various dimensions of this issue. We provide policy precedents to illustrate and examine the utility of these options and to promote and inform discussion, government action and civic

engagement in policy development.

A significant amount of work has been done recognizing and exploring this issue. Sussmann et al. (2016) describe the prohibitive cost of farmland in specific areas, and make general policy recommendations to address agricultural land prices and the viability of farming, but do not provide policy precedents. The Institute for Sustainable Food System's Southwest BC Bioregion project (Mullinix et al., 2016) reveals the importance of farming more arable land for increasing regional food self-reliance, for buffering against food system uncertainties in the face of climate change and for stimulating regional economic activity. While it does not address supportive policy, it does speak to the need for its development. A recent Metro Vancouver report (2016) recommends farm property tax reform to increase production on agricultural land. Curran and Stobbe (2010) highlighted the range of policy tools that could

be relevant in BC and inspired the evaluation framework utilized in this White Paper. This White Paper also includes information from Cooper (2017) and Tomlinson (2017) regarding speculative trends in the real estate sector.

In this White Paper we first examine three primary contributing factors to the underutilization of BC farmland, 1) **competing land uses**, 2) **current fiscal policies**, and 3) **speculation**. We then describe and compare 13 policies using five evaluative criteria and provide examples of precedents from jurisdictions outside of B.C. – both in Canada and abroad.

The discussion section poses important questions about implementation and next steps for policymakers to consider. We conclude by suggesting a suite of policies that warrant further investigation into how they can work to promote the use of BC's agricultural land for its intended use – farming and food production.

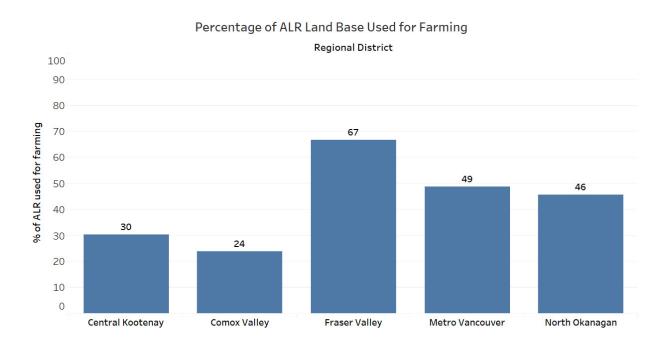


Figure 1. Percentage of ALR used for farming. Source: Agricultural Land Use Inventories (BC Ministry of Agriculture, various). Central Kootenay Regional District 2016, Regional District of the North Okanagan 2013-2014, Fraser Valley Region 2011-2013, Metro Vancouver Region 2010-2011, Comox Valley Regional District 2013.

2. CONTEXT

2.1. The Underutilization of British Columbia's Farmland

The Agricultural Land Reserve (ALR) was established in British Columbia in 1973 to stop the rapid loss of the province's limited agricultural land to urbanization. While the establishment of the ALR reduced the rate of farmland loss from an estimated 4,000-6,000 ha/year (2% annually) to approximately 600 ha/yr (Smith, 2012), a large portion of the ALR is currently not used for farming (BC Ministry of Agriculture, n.d.). The Fraser Valley has a relatively high portion of its ALR land base actively farmed (67%), however this number drops to below 50% for a number of agricultural regions in the province (Figure 1). Furthermore, in several of these agricultural

regions, such as Metro Vancouver, the Comox Valley, and the Central Kootenays, the number of ALR parcels used for residences exceeds those used for agriculture (Figure 2). While the ALR has had important influence on curtailing the loss of agricultural land to rampant urban sprawl, there is a need for additional policy and action to ensure that protected agricultural land is used for its intended purpose - agriculture.

The cost of farmland is often prohibitive to those wanting to farm. While the assessed value of ALR land is relatively low, the market value of agricultural land is not based on its intended agricultural use or potential farm business income, but on its value for other uses such as country estates, industrial and residential development, speculation, or a relatively risk free place to sequester and protect one's wealth (Sussmann et al., 2016). As such, agricultural land often sells for many times its

Number of ALR parcels by land use



Figure 2. Number of ALR Parcels by land use, by region. Source: Agricultural Land Use Inventories (BC Ministry of Agriculture, n.d.). Central Kootenay Regional District 2016, Regional District of the North Okanagan 2013-2014, Fraser Valley Region 2011-2013, Metro Vancouver Region 2010-2011, Comox Valley Regional District 2013.

assessed value, prohibiting purchase for any viable farming operation. (Sussmann et al., 2016). This problem is particularly acute in the populous peri-urban regions of the province such as Metro Vancouver, which, in addition to high populations, also contain some of the best quality agricultural land in the country (Metro Vancouver, 2014). An analysis of BC Assessment data for ALR properties sold in Metro Vancouver in 2016 revealed that 38% of 679 properties sold for over twice their assessed value. (Table 1). A recent extreme example of this trend occurred in late 2017, when an eight hectare Richmond farm property sold for \$9.2 M, over 100 times its assessed value (Brend, 2017). The extraordinarily high price of farmland makes it inaccessible to entrant farmers, and contributes to the unprofitability of agriculture for new and established farmers (Curran & Stobbe, 2010; Sussmann et al., 2016). This paper will explore three related but distinct factors that contribute to the issue of high agricultural land values: pressure from competing land uses, current fiscal policies, and farmland speculation.

2.3. Competing Land Uses

Expensive farmland prices are most acutely felt at the urban-rural interface of the province's most populous regions, such as the Lower Mainland, Southern Vancouver Island, and the Central Okanagan. In these regions, population and economic growth combine to place pressure on agricultural land to be excluded from the ALR and converted into residential, industrial, and other non-agricultural uses (Provincial Agricultural Land Commission, 2011). It is quite likely that the housing affordability crisis in Metro Vancouver has spilled over and exacerbated the agricultural land valuation and affordability conundrum (Sussmann et al., 2016). Metro Vancouver projects that the region's population will grow from 2.36 million in 2011 to 3.4 million by 2041 - further intensifying competition for housing, transportation, industry, and agriculture on the region's limited land base (Metro Vancouver, 2017).

Demand for residential land

Demand for residential development grows with population, and the proximity of farmland to urban development boundaries creates an upward pressure on farmland prices. Smaller parcels (under 5 acres), in close proximity to urban amenities, are particularly attractive for rural estate development and command higher land prices per acre (Colliers International, 2014). Metro Vancouver's farmland is extensively parcelized (i.e. divided into relatively small units)

¹ Cooper (2017) cites an investigation that found an upswing in the purchase of farmland immediately after the 15% foreign buyers tax was implemented in Vancouver.

Property sale price as % of assessed value	No. properties sold
<100%	40
100%	4
100%-125%	99
125%-150%	138
150%-200%	139
>200%	259
TOTAL	679

Table 1. Sale price (conveyance price) relative to assessed value of 679 ALR properties sold in 2016 in the City of Richmond, Surrey, Maple Ridge, Pitt Meadows, the Township of Langley and the Corporation of Delta. Source: Requested BC Assessment Conveyance Price (sale price) (2016) and Assessment Value (2016). Full report forthcoming from the Institute for Sustainable Food System (2018).

making it particularly desirable for residential use (Colliers International, 2014; Metro Vancouver, 2014). This trend is reflected in the large proportion of ALR parcels used for residential purposes in the Metro Vancouver region (Figure 2).

Demand for industrial land

Urban industrial land faces similar pressures as farmland. Metro Vancouver projects a shortage of industrial land in the region over the next 10-15 years (Metro Vancouver, n.d.). Removing land from the ALR and converting it to industrial use has been identified by industry stakeholders and local governments as a possible strategy for addressing projected shortages of industrial land (Avison Young, 2015; City of Abbotsford, n.d.; Site Economics Ltd, 2015). This, of course, contravenes the objective of the ALR but is none-the-less considered.

2.4. Current Fiscal Policies

The current farm property tax regime unintentionally provides incentives for the non-agricultural use of farmland. Current tax policies provide significant financial benefit to non-farming property owners (Metro Vancouver, 2016) who wish to use agricultural land solely for residential purposes. Reform is needed to ensure that tax benefits go to those who are investing in agriculture and food production over the long-term. Challenges with the following tax policies have been identified in a Metro Vancouver (2016) report:

 A significantly reduced property tax rate for properties that achieve farm class status:
 A primarily residential property can qualify for farm class status with minimal farming activity. This is in addition to the low assessment values for ALR properties relative to similar properties in the Urban Containment Boundary.

- A 50% school tax exemption that applies to all ALR properties: Residential properties have been identified as the primary recipients of financial benefit from this exemption. Of the \$4 million in exemptions in 2015, 78% went to residential class properties and only 16% went to farm class properties.
- Buildings constructed for farm use receive a tax exemption in order to promote capital investments in farm businesses: While farm buildings can be essential components of economically viable farm businesses, it can be difficult to characterize and monitor a building's contribution to farming operations. Consequently, buildings that are converted to non-farm use may continue to receive farm building property tax exemptions.

The current tax regime is intended to benefit farmers and encourage farm activity on ALR land, but in practice, it can provide significant benefits to those using the land for nonfarm purposes, and may encourage farmland speculation (Metro Vancouver, 2016).

2.5. Speculation on Farmland²

Although thought to be less common than the aforementioned upward forces on farmland, trading farmland as a commodity effectively removes parcels from the land base available to farmers. Farmland in BC has proven to be an extremely lucrative investment proposition, the impact of which is difficult to assess, in part due to incomplete ownership data and tracking.

² The US Commodity Futures Trading Commission defines a speculator as someone who trades "with the objective of achieving profits through the successful anticipation of price movements." (n.d.). In this report, purchases of farmland for the purpose of reselling and deriving significant profits from land value increases, rather than from agricultural production and investment, are considered speculative.

Farmland as a lucrative investment

An investigation by the Globe and Mail found that, of 122 farm properties in Metro Vancouver that sold for over \$2 million each (between mid-2015 and mid-2016), at least 73 (60%) involved speculators and investors rather than farmers. The same article offered a glimpse into how farm properties are being advertised locally and outside of BC as "good holding properties" with "potential for future development" (Tomlinson, 2017). Other reports point to similar trends in agricultural real estate advertisement (Cooper, 2017). It seems apparent that in the Lower Mainland, farmland is being promoted for its investment value and development potential. Municipalities that allow very large³ residential buildings on farmland, or do not regulate the footprint of residential uses commensurate with urban/suburban areas, may be particularly attractive to speculators and investors. The expectation that land can be removed from the

ALR may also promote speculation, despite the difficulty of successfully applying for an exclusion (Sussmann, et al., 2016). The likelihood of a successful exclusion may be small, but the potential payoff (return on investment) is huge,⁴ with minimal risk since land values tend to increase regardless. These conditions make agricultural land a safe, and potentially extremely lucrative, investment (Condon et al., 2010).

Incomplete ownership data

Incomplete ownership data precludes us from empirically assessing the prevalence of farmland speculation in BC. A lack of transparency prevents us from definitively understanding who owns farmland in BC, who is benefiting from tax exemptions that are meant to promote viable agriculture, and who stands to make windfall profit from future development of agriculture land. Title information is currently collected by BC Land Title and Survey, but it is not made available publicly, aggregated, or analyzed. For example, it is not known how much property in BC is owned by individual people versus incorporated entities, even though that information is collected on title documents. Beyond legal ownership, there is minimal regulation, monitoring, or collection of data related to the identification and registration of beneficial ownership (those who control and profit from property ownership and use).5 The current regulatory framework does not require beneficial owners of land to disclose their identity, which can be obscured through the use of legal arrangements such as trusts and holding companies (Martini, 2017). For example, holding companies can retain legal title to farmland in trust, while the beneficial owner controls and benefits from the asset anonymously.

3. METHODOLOGY

3.1. Global Policy Precedent Research

The goal of this White Paper is to present instructive policy precedents to stimulate dialogue and promote policy development that addresses the underutilization of BC's

³ The BC Ministry of Agriculture suggests a farm residential footprint maximum (total footprint of residential land uses) as the lesser of; a footprint commensurate with urban areas, or 2,000 m², excluding additional residential uses where they are permitted (e.g. temporary farm worker accommodations). The maximum farm residence floor area is suggested as; the lesser of a floor area commensurate with urban areas, or 500 m² for a principal farm residence. A number of municipalities that regulate farm residential footprints are in excess of these recommendations (BC Ministry of Agriculture, 2011).

⁴ When land changes from agricultural to urban use, the value lift can go from \$40,000 per acre to as high as \$1M per acre depending on location and development capacity (Condon et al., 2010).

⁵ A beneficial owner is a natural person who (often indirectly) ultimately controls a legal person or instrument, or on whose behalf a transaction is made (Financial Action Task Force [FATF], n.d.).

agricultural land. In doing so, we hope to raise the profile of the issue of farmland valuation, ownership, and access, and to stimulate debate by bringing forward existing policy precedents that may otherwise be overlooked, or not readily imagined, in the dominant socio-economicpolitical environment. Our research into policy precedents was extensive, but not exhaustive. Academic literature, policy briefs, institutional and government reports and interviews were included. Language barriers limited the access to policy information from some jurisdictions. In some cases, policies have since been repealed or amended (this is noted). An initial collection of approximately 80 policies was reduced to the 13 most relevant examples based on our subjective assessment of their utility. The resultant set of policies is evaluated using criteria delineated below. A complete list of policy precedents is provided in a separate Appendix.

3.2. Projected Outcomes

Section 4 presents 13 policy precedents that aim to achieve one of four identified outcomes (listed below). This outcome matrix, based on the work of Curran and Stobbe (2010), was developed to help understand how policy tools can conjointly work to address the multifaceted challenge of increasing the productive use of farmland in BC.

- 1. Increase farmers' ability to access or acquire farmland: Prioritizing bona-fide farmers as farm property owners, reducing farmland prices, and improving leasing options to increase farmers' access to land.
- 2. Reduce non-farm use of farmland: Reducing non-agricultural uses such as fill dumping, truck parking, or rural estate development that permanently compromises the quality and/or usability of the agricultural land base.

- 3. Raise farm incomes and/or improve the economic viability of farming: Improving farm net income potential can make land ownership more economical and increase the financial viability of farms and the agricultural industry.
- **4. Increase availability and transparency of farmland ownership data:** Transparent and accessible farmland ownership data is necessary for the development and enforcement of policies related to farmland ownership, as well as for monitoring policy outcomes.

3.3. Policy Evaluation

We devised an evaluation framework, based on Bardach (2012) and Curran and Stobbe (2010), to compare policy tools and initiate further examination of their potential applicability. Limited data availability required some aspects of our evaluation to be more subjective, while other aspects are more descriptive or generalized (e.g. relative cost, timeframe). The evaluation criteria used in this White Paper are:

Approach: Identifies which projected outcomes (refer to section 3.2) are addressed by the policy. Potential limitations are also considered here.

Cost: Estimates the relative cost to start up and implement the policy, compared to other policy tools presented. Examples with monetary values are included where available. Policies operating within an existing BC procedural or agency structure are identified as less costly relative to those requiring new programs or agencies. Categories: high, medium, and low.

Ease of Implementation: Estimates how easy it would be to implement the policy, relative to other reported policies. How well does the proposed policy tool fit into the existing legal

and regulatory framework? What are some considerations for implementation? Categories: easy, moderately easy, moderately difficult, and difficult.

Timeframe: Estimates how quickly the tool could be implemented, and when we could expect to see desired outcomes from the implementation of the policy, relative to other reported policies. Categories: short-, medium-, and long-term.

Impacts to stakeholders: Identifies who is primarily and most directly impacted and to what extent.

The authors collectively applied the criteria, using "best estimates" to assess the policies relative to each other. The evaluation section should therefore be interpreted in recognition that this exercise was subjective, that many assumptions were involved, and that policy performance/impact will depend upon the exact nature of the policy as well as the actual implementation conditions and socio-political-economic environment in which it might be enacted.

3.4. Organization of Policy Precedents

Policies are organized as follows (Table 2):

- 1. Fiscal policies
- 2. Land use planning policies
- 3. Regulatory policies
- 4. Policies relating to the creation of government agencies.

For each policy category, we begin with a general description, followed by description of specific policy precedents from within Canada (when available) and abroad. Last, each policy is assessed based on the aforementioned criteria: approach, cost, ease of implementation, timeframe, and impacts to stakeholders (refer to section 3.3). Table 7 provides a summary of all policies.

Table 2. Summary of policy precedents, including policy type and jurisdiction.

Policy Precedents	Jurisdiction		
Fiscal Policies			
1. Farm Property Tax Relief	Provincial		
2. Farmland Conversion Tax	Provincial		
3. Farm Income Tax Relief	Federal		
Land Use Policies			
4. Urban Growth Boundary	Municipal/Regional		
5. Agriculture Enterprise Zones	Municipal/Regional		
6. Required Mitigation of Rezoned Farmland	Municipal/Regional		
Regulatory Policies			
7. Farmland Lease Regulations	Provincial		
8. Farmland Ownership Restrictions	Provincial		
9. Tracking & Reporting Legal and Beneficial Onwership of Farmland	Provincial/Federal		
Agency Policies			
10. Multi-sectoral Governance	Multiple		
11. Farmland Trusts (Public)	Provincial		
12. Public Land Banks	Provincial		
13. Land Transfer Regulatory Agencies	Provincial		

4. POLICIES TO INCREASE AGRICULTURAL USE OF BC'S FARMLAND

4.1. Farm Property Tax Relief

Description

Facilitating reduced taxation for farmland is a tool employed in a number of jurisdictions to support and encourage the multiple public benefits provided by farming. Eligibility is often determined from a minimum income threshold or minimum property area used for farming purposes. Such tax exemptions can significantly reduce property taxes for landowners that, if appropriately designed, can encourage and support agricultural activity and farm capital investments.

Precedents in BC

BC has one of the lowest income thresholds for achieving farm class tax status in Canada and abroad (Table 3). In particular, the current \$2,500 gross farm income threshold for farms between 2 to 10 acres to qualify for farm class status (set in 1993) has been characterized as easily achieved, resulting in a much lower property tax burden⁶ for landowners who engage in minimal

6 Metro Vancouver report assessed that the "...average difference in the annual taxes paid on a 10 acre (4 ha) lot with \$150,000 in building improvements for properties with, and without farm class, using tax rates for seven municipalities was \$7,088." (Metro Vancouver, 2016, p. 7)

Table 3. Comparison of farm property tax exemption threshold in BC and other jurisdictions.

State/Province	Farm revenue required to qualify for exemption	Other eligibility criteria
Ontario	\$7,000	Farm residence + 1 acre of surrounding land are ineligible for exemptions
Quebec	\$5000	Must generate gross income of at least \$5 per \$100 in eligible farm value
Wisconsin	\$6000 in preceding year, or \$18,000 over last 3 years	
Michigan	n/a	Classification of the parcel as agricultural on the current assessment roll, or more than 50% of parcel acreage devoted to agricultural use
BC - Current as of 2017	parcels < 0.8 ha (2 acres): \$10,000; parcels 0.8-4 ha (2-10 acres): \$2,500; parcels > 4 ha (> 10 acres): \$2,500 + 5% of farmland value of the land for farm purposes;	
BC - Recommended by Metro Vancouver (2016)	\$3,500 regardless of parcel size	Full tax exemption for farms making \$10,000; Partial tax exemption for farms making \$3,500

Note: References for farm property tax exemptions for Ontario (Ontario Ministry of Agriculture, Food and Rural Affairs (n.d.)) Quebec, (Government of Quebec (n.d.-a)), Wisconsin, (Wisc. Stat. § 91.60), Michigan (State of Michigan State Tax Commission, 2013), and for BC (Metro Vancouver, 2016). See <u>Appendix</u> for details.

farming activity (Upland Consulting, 2015).⁷ Reviews of BC's farm class tax exemptions have recommended an increase in the minimum farm income threshold to discourage those who engage minimally in farming for the sole purpose of seeking associated tax benefits (Metro Vancouver, 2016; Ministry of Community and Rural Development, 2009; Upland Consulting, 2015). Previous reviews of qualifying farm income thresholds propose two tax policy changes to ensure that the benefits to landowners are balanced with the public benefits they generate: 1) increase farm income threshold; and 2) establish a multi-tier system that awards

greater benefits to farms that achieve higher income thresholds.

Global precedents

Table 3 compares BC's current property tax policy to the changes recommended by Metro Vancouver (2016), and to property tax exemption thresholds in other jurisdictions.

4.2. Farmland Conversion Tax

Description

Requiring a fee for the conversion of farmland to non-farm use has been implemented in some regions as a fiscal policy to deter the development and loss of agricultural land. To be effective, the fee levied would need to be sufficient to

EVALUATION 4.1 FARM PROPERTY TAX RELIEF

Approach

- Projected outcomes: Reduce non-farm use of farmland. Raise farm income and/or improve the economic viability of farming.
- Tax benefits encourage productive farming use of farmland. Higher farm income thresholds discourage non-farm use and incentivize commercial farm owners over hobby farmers¹ on agricultural land.

Cost

Low: revised tax policies can operate within current taxation systems and procedures.

Ease of Implementation

• Easy: while contingent on degree of change, a property tax relief system already exists in B.C.

Timeframe

Short- to medium-term: impacts should be immediate and persist as long as policy is in place.

- Farmers should be the ones benefiting most from these tax exemptions.
- Some hobby farmers and landowners would see significant tax increases if they do not meet new thresholds.
- Local governments' property tax revenues could shift in a way that directs benefits to more productive agriculture, and captures more tax from residential properties.

⁷ Adjustments to qualifying income thresholds for farm classification represent one dimension of recommended property tax reform to encourage the agricultural use of farmland. For additional recommendations see *Encouraging Agricultural Production through Farm Property Tax Reform in Metro Vancouver* (Metro Vancouver, 2016).

¹ In this white paper a hobby farm is defined as farming activities which do not aim to generate net farm income (Nibourg, T. (2016).

significantly reduce or nullify the profit potential from development. It should be noted that in some regions of the province, such as Metro Vancouver, the value lift from development can raise land values from \$40,000 per acre as agricultural land to as high as \$1 million per acre as urban land (Condon et al, 2010). As an additional consideration, in order for such a policy to align with agricultural land protection goals, policies must stipulate that the existence of conversion taxes not be used as justification for removal of land from the ALR for development.

Global precedents

Both Slovakia and the Czech Republic impose fees when high quality agricultural land is converted to non-farm use. The size of the fee depends on the quality of the soil, with the highest quality soils requiring a higher compensation fee as well as a special permit. However, compensation fees were criticized as too low to be effective barriers to farmland development (EEIG Agrosynergie, 2013).

The state of Vermont has a voluntary program that landowners may choose to enroll in, called "Current Use" that aims to keep lands in farming/ forestry use, and withdrawal of enrolled land from the program incurs a land use change tax of 10% of market land value. Subdivision of land into parcels smaller than 25 acres is considered development and is taxable regardless if any land use change actually occurs (State of Vermont, n.d.).

The state of Michigan applies a 'recapture tax' on farmland that receives property tax benefits. If the subject property is converted to non-farm use after a land sale, the buyer (or the seller, in some

EVALUATION 4.2 FARMLAND CONVERSION TAX EVALUATION

Approach

- Projected outcomes: Reduce non-farm use of farmland.
- This policy tool makes conversion of farmland less desirable through taxation.
- To be effective, the tax must be high enough to eliminate or at least substantially reduce the potential profit. This tax may not be sufficiently effective in areas like Metro Vancouver where the value lift from development is extremely high (Condon et al., 2010). Calculating tax on a percentage basis, that is, tax away a significant percentage of the value lift, could be a method for addressing this.

Cost

• Low: This policy can potentially generate revenue. However, if successful in discouraging development on agricultural land, it could lead to a net loss of tax revenue.

Ease of implementation

• Easy: With relevant tax agencies already existing in BC, implementation would operate within existing structures.

Timeline

• Short-term: Due to limited scope and focus of the policy.

- Farmers looking to acquire farmland may benefit from greater availability of farmland.
- Government could gain revenue from conversion tax, but lose revenue from reduced development.
- Would require monitoring of land use to enforce tax.
- Current farmland owners interested in developing their land would face higher cost of doing so.

cases) is liable to repay the property tax benefits that were received for up to 7 years before the land use change occurred (State of Michigan State Tax Commission, 2013).

4.3. Farm Income Tax Relief

Description

Farm income tax relief, like farm property tax relief, aims to ease the tax burden of farmers, thereby enhancing the economic viability of farming. Farm income focused tax relief can more directly target individuals who farm, rather than landowners who may not be engaged in farming themselves. Additionally, "[i]ncome tax credit approaches are more directly relevant to alleviating the cost squeeze that farmers in urbanizing areas find themselves caught in, because they are based on the farmer's net income rather than just one element (property

taxes) which affects [their] net income" (Caughlin, 1981, p.19). By distinguishing between farm income and non-farm income, a farm income tax break directly targets supporting farmers rather than speculators or non-farmers.

Global precedents

Table 4 summarizes how three different jurisdictions have structured their farm income tax structure along with eligibility criteria. One approach includes property tax in the calculation (Michigan), another grants young farmers greater tax breaks for a limited time (France), and a third method calculates farm tax as a cadastral property yield⁸ (Italy).

Table 4. Farm income tax breaks and eligibility criteria in Michigan, USA, France and Italy.

State/Country	Income tax structure	Criteria to qualify for income tax benefits		
Michigan, USA	State Income Tax Credit = Total Property Tax Amount - (Household Income x 3.5%)	a) Must maintain land as farmland for 10 years b) > 51% of land must be farmed c) If under 40 acres, must produce gross annual income of > \$200 per tillable acre d) specialty farms must be at least 15 acres, and have gross annual income >\$2,000		
France	20% reduction in taxable farm income for all farmers, 50% reduction for up to 5 consecutive years for young farmers just starting out	Must keep records of farm income		
Italy	As of 2017, abolished all income tax for professional farmers Farm income was previously calculated using a standardized value based on what the farmland is expected to produce	Designation of professional farmer requires that one spends at least 50% of work time and gets at least 50% of income from agricultural activity, and has farming expertise		

Note. References for farm income tax breaks for Michigan (State of Michigan, n.d.), France (Direction générale des finances publiques, 2017; EEIG Agrosynergie, 2013), and Italy (Ministry of Economy and Finance, 2016; Albisinni, 2017).

⁸ Cadastral property yield is a standardized value based on the value of what the land is expected to produce from farming, rather than using actual income. The resulting calculated cadastral yield value is usually very low (Ministry of Economy and Finance, 2016).

4.4. Urban Growth Boundary

An Urban Growth Boundary (UGB) delineates the limit of urban development in a region, protects rural lands from development, and promotes compact community planning as well as the efficient delivery of services. Reinforcing ALR boundaries with strong urban growth boundary policies can clearly communicate a region's commitment to protect agricultural land and work to limit the appeal of speculative buying and selling of farmland. Conversely, frequent changes to urban growth boundaries can create uncertainty for farmers and developers, encouraging farmland sales for nonfarming uses (Adelaja, Sullivan, & Hailu, 2011, as cited in Paül & McKenzie, 2013).

Supportive urban growth boundary policies include:

 Regional growth strategies, official community plans, and development permit areas that reinforce the ALR boundary, prevent subdivision of parcels, and reduce flexibility for exclusion applications. Strong affordable housing policy to proactively address the redirection of urbanization pressure from the strengthened urban growth boundary.

Precedents in BC

The District of Saanich's UGB has only been extended twice (Curran, 2003) since its enactment in 1968 to incorporate approximately 100 hectares of additional rural land. The UGB is strongly supported by growth management policies in the District's Official Community Plan, which stipulate that major expansions cannot be granted without assent from the electors through a referendum or plebiscite (Curran, 2003; District of Saanich, 2008).

Global precedents

In 1990, the Dutch national government established an UGB to conserve the "Green Heart", an open space and agricultural area surrounded by the major cities of Amsterdam, Rotterdam, and The Hague (Zonneveld, 2007). In 2001, the national government required provinces to demarcate urban development

EVALUATION: 4.3 FARM INCOME TAX

Approach

Projected outcomes: Raise farm incomes and/or improve the economic viability of farming.

Cost

Medium: Reduced tax revenue from income tax. Costs for coordination of government agencies.

Ease of implementation

Moderately difficult: This is not existing policy in BC, and would require coordination across
multiple levels of government.

Timeline

• Medium-term: Impact should persist as long as policy is in place.

- Farmers would benefit from lower income tax payments.
- Governments could face reduced tax revenues, particularly provincial and federal governments whose jurisdiction includes income taxes.

boundaries for the next 10 years, as well as mark "concentration areas" within cities for increased housing and commercial activity. Before this planning process could be completed, a new government relaxed regulations and reduced the role of the national government in spatial planning (Zonneveld, 2007). Although initial planning goals were only partially achieved, the Green Heart conservation policy is cited as "one of the most successful examples of meticulous urban containment and countryside preservation" (Hall, 1984, as cited in Alterman, 1997, p. 230).

Global precedents - affordable housing

Policies aiming at relieving urbanization pressures are important support measures for strengthening UGBs (Koomen, Dekkers, & Van Dijk, 2008). Having a strong affordable housing strategy may relieve pressure on farmland to be developed for residential uses as residents are drawn to relatively lower land prices in the urban periphery. Singapore and Vienna are both recognized as having successful,

comprehensive public housing programs, which benefit from broad public support (Kalugina, 2016). Other housing policy options for regional/municipal governments include planning for infill development, supporting land banks or community land trusts to develop housing (see section 4.14 for further discussion), or as in the case of the Netherlands, directly purchasing land for housing.

Global precedents - public purchase of urban fringe farmland

The City of Zurich has used the direct purchase of farmland in order to preserve open space and manage urban expansion. The green space management department has combined responsibilities of land use planning, agriculture, and nature conservation. The department owns 500 ha (1200 acres) of farmland and leases to, or operates, a total of 10 farms. The City aims to protect green spaces by favoring increases in density over urban expansion (Schmid & Jahrl, 2014).

EVALUATION: 4.4 URBAN GROWTH BOUNDARY

Approach

• Projected outcome: Reduce non-farm use of farmland.

Cost

• Medium: Policy review and change would require resources. Redirecting urbanization pressure through affordable housing policy could incur significant costs.

Ease of implementation

• Easy to Moderately Easy. Regional planning processes are established in BC.

Timeframe

 Medium- to long-term: Regional planning efforts operate within medium to long-term planning horizons.

- This approach may be politically difficult for local governments that are under pressure to accommodate development for urban expansion. Tax revenue implications may exist for local governments.
- Greater farmland protection implies reduced land availability for industrial and residential development.

4.5. Agricultural Enterprise Zones

Description

Local governments can use zoning to promote the economic viability of farming at or near the urban-rural edge by encouraging the colocation of critical farm businesses and services, such as processing and storage facilities, equipment sales and repairs, etc. Establishing a zoning designation specifically for agricultural enterprises on commercial and industrial lands, outside the ALR, in close proximity to farmland and farms, and paired with incentives for appropriate development, can provide local producers with better access to essential agricultural services (Curran & Stobbe, 2010). Agricultural enterprise zones have the potential to stimulate economic development through competition and collaboration (Porter, 2000, as cited in Curran & Stobbe, 2010) and through an increasing access to processing and post-harvest infrastructure (Mullinix et al., 2016). Access to post-harvest infrastructure can allow smaller,

independent producers to add value or better preserve products, potentially commanding higher prices (Grando & Ortolany, 2015).

Precedents in BC

The City of Pitt Meadows has established an Agricultural and Farm Industrial Zone with the intent of enhancing the economic viability of agriculture and the diversification of the agricultural industry in the region (City of Pitt Meadows, 2017).

Global Precedent

Hawaii's Enterprise Zone Program offers a number of tax and procedural benefits to eligible businesses that locate in the designated Enterprise Zones. The program is designed to help stimulate growth and increase employment in a number of sectors, including agriculture. As such, the State and select counties offer incentives such as tax exemptions, income tax credits, fee waivers and priority permitting to businesses that meet hiring requirements and annual income

EVALUATION: 4.5 AGRICULTURAL ENTERPRISE ZONES

Approach

 Projected outcomes: Raise farm incomes and/or improve the economic viability of farming, especially smaller scale, alternate/direct market, regional focused farm operations.

Cost

• Low to medium: May require additional resources to implement.

Ease of implementation

• Moderately easy: Research and consultation required for rezoning process.

Timeframe

Medium-term: Zoning can be amended but businesses may take years to get established.
 Appropriate incentives could encourage establishment.

- Farmers could have greater access to infrastructure and services (storage, processing, etc.)
- Agricultural businesses could benefit from increased profile of agriculture locally.
- Consumers could have greater access to local food. Region could benefit from greater food system economic activity.

thresholds from eligible agricultural activities (State of Hawaii, n.d.). A 2016 annual report identified agricultural production and processing as the business activity reporting the greatest number of jobs in the Enterprise Zone (State of Hawaii, 2016).

4.6. Required Mitigation of Rezoned Farmland

Description

Agricultural land loss mitigation policies require that for each unit of agricultural land rezoned for non-agricultural use, a corresponding area of agricultural land must be protected for farm use as compensation. This may be achieved through the use of covenants, dedicating the new land to agriculture in perpetuity. Municipalities may choose to collect fees from developers in lieu of direct protection, with the fees used by the municipality to fund other farmland preservation programs (California Council of Land Trusts [CCLT], 2014). In addition to stemming the loss of farmland, this type of policy tool may serve to discourage developers or investors from targeting ALR land for development.

Precedents in BC

The City of Surrey requires that every hectare of land excluded from the ALR be mitigated by the addition of two hectares of land of equivalent

EVALUATION: 4.6 REQUIRED MITIGATION OF REZONED FARMLAND

Approach

- Projected outcomes: Reduce non-farm use of farmland, by slowing the rate of farmland conversion to non-farm use. Possibly reduce the sale price of farmland by making it less attractive for development. This policy tool can preserve farmland, but does not directly promote its use for farming.
- The loss of farmland may not be offset completely, especially if mitigation requirements are low. High standards such as a 2:1 mitigation ratio, or a requirement that mitigation land to be of equivalent or higher soil quality, may slow or discourage development on agricultural land (Land Use and Natural Resources Clinic, 2015).

Cost

- Medium. Monitoring and enforcement must be funded, and this becomes important if/ when the property changes ownership (CCLT, 2014).
- The costs of farmland covenants protecting land are borne by developers and residential or industrial property owners.

Ease of implementation

• Moderately easy. The policy could be incorporated into current processes for development approvals or ALR exclusion applications.

Timeline

• Impacts on farmland preservation and discouraging development could be immediate.

- Local governments preserve local farmland.
- Developers and property owners face hurdles in developing agricultural land.

or better soil quality. While it has been reported that the policy has helped maintain a stable ALR boundary, the city is challenged by a lack of information on which lands are most suitable for inclusion/exclusion. Additionally, it has been noted that a provision allowing for monetary compensation in lieu of land has been preferred by developers (ISFS, 2017).

Global precedents

As of December 2014, seven cities and 12 counties in California had existing agricultural land mitigation policies or were considering such policies (Hausrath Economics Group, 2014). The City of Davis, California requires developers to conserve two acres of agricultural land for every one acre that is rezoned to non-farm use. Conservation is facilitated via covenants, deed restrictions, or direct purchase for a land trust (City of Davis, n.d.).

4.7. Farmland Lease Regulations

Description

Leasing is an important option for agriculture land access, especially for new entrants establishing farm businesses. The insecurity of short-term leases discourages farmers from investing in farmland improvements, or utilizing more costly stewardship practices that promote long-term soil and ecosystem health. Short-term leases can also jeopardize the long-term business planning potential of a farm operation by limiting a farmer's ability to secure a bank loan (Metro Vancouver, 2015), or to engage in farming enterprises with longer-term investment payback horizons (e.g. perennial crops such as tree fruit or hops). Long-term leases are often more desirable for tenant farmers and promote more stable farming use of farmland.

Precedents in BC

Metro Vancouver has proposed amendments to ALC and BC Assessment regulations in order to promote longer farmland lease terms. They recommend registering the lease to the title of the land so that it is transferred to the new owner if the land is sold. This is not compulsory in the current legislative framework (Metro Vancouver, 2015). While a 2014 survey of farmers in BC found that the predominant choice of land access was ownership (Wittman & Dennis, 2014), long-term, transferable, and intergenerational leases could be a desirable alternative to ownership, especially for start-up farm businesses.

Global precedents

Many European countries as well as Japan have various regulations relating to farmland leases, in contrast to Canada and the United States where leases are less regulated and are treated as a matter of contract (Organisation for Economic Cooperation and Development [OECD], 1996). Aspects of lease regulation include longer lease terms, tenant rights to purchase, rent control, and inheritance of contracts (EEIG Agrosynergie, 2013). The minimum farmland lease terms in Belgium and France are 9 years, but longer terms of 18, 25, or even up to 99 years exist. Tenants may have preemptive rights to purchase their rented land in case of land sale. In France, tenants may benefit from sale price reduction through the power of land transfer regulatory agencies (see section 4.13). Land rental prices may be controlled using a formula that is linked to farm income from the parcel (Belgium), or linked to a state-set land price index (France). In France, contracts are inheritable if the tenant retires or dies, and some lease types may be transferred to a successor of the tenant's choosing with a cap on rental price (EEIG Agrosynergie, 2013). These types of lease regulations can promote longerterm farm use of land and provide tenant farmers with greater security and rights.

4.8. Farmland Ownership Restrictions

Restrictions Based on Residence/Citizenship

Description

Many countries and Canadian provinces (Table 5) legally restrict who can acquire and own farmland. Restrictions vary depending on the context and desired outcomes. For example, some regulations allow foreign investment in agriculture but want to prevent large-scale land purchases by multinational corporations, what is sometimes referred to as "land grabbing". ⁹

Precedents in BC

BC does not restrict individuals, companies, trusts, or other legal entities, whether foreign or domestic, from purchasing farmland (Heminthavong & Lavoie, 2015). In the case of Crown land, the initial purchase must be made by a Canadian citizen (Land Act, RSBC 1996, c 245, s. 9).

Canadian precedents

There are five Canadian provinces that have enacted legislation restricting foreign ownership of farmland: Alberta, Saskatchewan, Manitoba, Quebec and Prince Edward Island (PEI) (Bowler & Ackhurst, 2015; Government of Saskatchewan, 2015). These restrictions vary among the

EVALUATION: 4.7 FARMLAND LEASE REGULATIONS

Approach

- Projected outcome: Increase farmers' ability to access or acquire farmland.
- Enable more secure farmland tenure for farmers who are unable to purchase land, making renting a more attractive, economically viable option. Secure tenure incentivizes investment and could lead to better agronomic and economic performance as well as resource (soil, water, air, biodiversity) stewardship.
- Some landowners may be hesitant to enter into long-term leases. Property tax exemptions with higher farm income thresholds (see previous section) may serve to offset this effect and encourage landowners to rent to farmers to gain tax relief.

Cost

Medium: There would be costs for establishing and maintaining a system for compliance.

Ease of Implementation

Moderately easy: May require amending the Land Title Act or other related laws or regulations.

Timeframe

• Medium: Consultation, research of best practices, drafting legislation and producing lease templates would have to be undertaken.

- Farmers who lease land would have more secure and stable tenure, enabling long term business planning.
- Governments may require additional resources for implementation and monitoring.
- Landowners could have more stable tenants, but it would also be more difficult to remove unsuitable tenants.
- There would be more incentive for farmers to invest in infrastructure as well as in land stewardship.

⁹ Land grabbing refers to large scale acquisition of farmland by private investors, usually foreign or foreign governments (Heminthavong & Lavoie, 2015).

provinces. For example, in Saskatchewan farmland ownership by non-Canadians/nonpermanent residents and non-Canadian entities¹⁰ is limited to 10 acres. Exceptions can be granted by the Farm Land Security Board (Government of Saskatchewan. 2015). In Manitoba, farmland ownership for non-Canadians/non-permanent residents and non-100% Canadian-owned entities is limited to 40 acres. The Manitoba Farm Industry Board administers and enforces the Act and is responsible for adjudicating applications for exemption (Province of Manitoba, n.d.). In Prince Edward Island, non-residents of PEI cannot own more than 5 acres of farmland (Prince Edward Island Regulatory and Appeals Commission, n.d.).

Global precedents

Many European nations restrict land acquisition rights based on residency or citizenship (Ciaian et al., 2012). During Latvia's transitional period into the European Union, it maintained its farmland acquisition restrictions. A company could not buy agricultural land if a majority of

its shareholders were not Latvian. Non-Latvians could only buy a piece of land if they were either married to a Latvian or if they had been farming that same piece of land in Latvia for at least 3 years (Ciaian et al., 2012). Since Latvia's accession into the European Union, farmland buyers must be Latvian or EU citizens, citizens of the European Economic Area, or the Swiss Confederation. They have also implemented a requirement that companies who own farmland must report any changes in their shareholder composition so that they can be tested against the citizenship requirements (Lavina, Kalviša, & Šestakova, 2017).

Other Restrictions on Ownership

Description

Other jurisdictions limit farmland ownership based on other standards unrelated to residency or citizenship. These restrictions generally have the goal of keeping farmland in farm use, or preventing unwanted landholding patterns such as fragmentation, subdivision, underproductive farming, or ownership concentration.

Table 5. Types and examples of farmland ownership restrictions based on residence or citizenship.

Type of restriction	Example
Citizenship requirements: Limiting the amount of farmland that can be owned by non-citizens/non-permanent residents and non-Canadian entities.	Alberta, Saskatchewan, Manitoba, Quebec, Prince Edward Island
Residency requirements: Limiting the amount of farmland that can be owned by non-residents.	Quebec, Prince Edward Island Poland, Hungary, Czech Republic, Latvia, Lithuania, Slovakia
Outright prohibition of any farmland acquisition by non-residents or non-citizens or corporations.	

Note. References for ownership restrictions in Canadian provinces from Bowler & Ackhurst (2015) and Government of Saskatchewan (2015), and for restrictions in European countries from Ciaian et al. (2012).

¹⁰ Definition of a Canadian entity varies among provinces. E.g. Saskatchewan defines Canadian entities as 100% Canadianowned, while Alberta defines Canadian entities as majority Canadian-owned (Government of Saskatchewan, 2015).

Canadian precedents

Under Saskatchewan's Farm Security Act, pension plans may not acquire farmland, and trusts may only do so if the number of noncitizen beneficiaries is limited. The legislation goes further - if the Farm Land Security Board is reviewing an investigation into the acquisition of farmland, the burden of proof is on the individual to demonstrate that they are in compliance with the Act. However, there are procedures in place for each of the above instances where exemption can be sought from the Board.

Global precedents

Until 2010, Denmark required that anyone who acquires more than 30 hectares of farmland must have agricultural training. Training requirements were determined by the Minister for Food, Agriculture, and Fisheries (Fødevareministeriet, 2009).

In addition to the citizenship restrictions referenced above, the government of Latvia,

up until early 2017, required that a prospective agricultural landowner demonstrate a) professional agricultural education, and b) agricultural income or subsidies totaling one third of their total income. These requirements were recently replaced with a residency requirement (for EU citizens), and a demonstrated proficiency of the Latvian language, which seems to be a proxy for proof of intent to live permanently in the country. Individuals that are related to each other can own a maximum combined total of 4,000 hectares of agricultural land (Lavina et al., 2017).

4.9. Tracking and Reporting Legal and Beneficial Ownership of Farmland

Description

Legal owners are those entities whose names appear on the land title filed with the BC government, while beneficial owners are the individuals who control and profit from property ownership and use. Without measures to

Table 6. Types and examples of farmland ownership restrictions not based on residence or citizenship.

Type of Restriction	Example
Capping the amount of farmland purchased by any buyer, regardless of nationality	Hungary, Lithuania, Prince Edward Island
Requiring farmland owners to physically live on their farm and operate it as a farm, or lease it to a farmer, for a minimum amount of time after purchase	Denmark, Japan
Restricting farmland ownership to professional or accredited farmers or farm corporations. To qualify, buyers must have farming-related education or experience, or meet a minimum level of income from farming	Denmark (before 2010), Latvia (before 2017), Lithuania
Prohibiting and/or limiting investment funds (e.g. pension plans) or trusts from owning farmland	Saskatchewan

Note. References for farmland restrictions for Hungary and Lithuania (Ciaian et al., 2012), PEI (Bowler & Ackhurst, 2015), Denmark (EEIG Agrosynergie, 2013), Denmark before 2010 (Fødevareministeriet, 2009), Japan (OECD, 2009), Latvia (Lavina et al., 2017), and Saskatchewan (Government of Saskatchewan, 2016).

identify the beneficial owner, many regulations can be evaded, including farmland ownership restrictions, as the use of legal arrangements such as trusts and nominees can obscure the primary beneficiaries of property ownership (Ross, 2016). Tracking and reporting of this information could give policymakers a sound basis to assess current land ownership trends and enact well-informed policy to address concerns about land grabbing, speculative ownership and excessive consolidation of farmland in BC (Holtslander, 2015).

Legal Ownership - Tracking and Reporting

Precedents in BC

While legal ownership information is collected in BC, reporting, access and transparency is limited.

Canadian precedents

Canadian provinces such as Prince Edward Island and Quebec collect and report on farmland ownership metrics. In Quebec it is mandatory to register land transactions in

EVALUATION: 4.8 FARMLAND OWNERSHIP RESTRICTIONS

Approach

- Projected outcomes: Increase farmers' ability to access or acquire farmland. These type of policies limit the pool of potential farmland owners. The greater the extent of restrictions, the greater the effect should be on reducing competition for land and increasing farmers' ability to acquire farmland.
- Current Canadian provincial land ownership restrictions seem to be focused on limiting large-scale purchases by non-residents or non-citizens. Much of BC's viable ALR land is highly parcelized, therefore a large land area threshold would not address the demand in BC for smaller parcels to be developed for rural estates.
- A possible loophole is the lack of knowledge or ability to determine the beneficial owner of a property. Ineligible buyers could find ways to acquire properties using nominee owners, trusts, or shell companies (Ross, 2016; Martini, 2017).

Cost

• Medium: Regulating foreign ownership would incure procedural costs, such as the collection and reporting of ownership information,

Ease of Implementation

• Moderately difficult: Restricting ownership of farmland would involve new or amended legislation and regulations. Existing systems of ownership registration in other provinces could be used as a template for implementation. Compliance monitoring would be required.

Timeframe

• Medium-term: Implementation would depend on the passage of legislation.

- Depending on restrictions, some bona-fide farmers may face farmland ownership restrictions.
- Potential downward price pressure on farmland (Carlberg, 2002; Ferguson, Furtan, & Carlberg, 2006). Farmers could face less competition for land. Farmers may see reduced revenue from sale of their farmland.
- Speculators would have more difficulty acquiring farmland. Foreign-owned agricultural corporations could be impacted.

a public land registration system, and since 2011 most records have been accessible online (Government of Ouebec, n.d.-b).

Prince Edward Island's land identification program dates back to 1988 and requires non-residents and corporations to register with the province when acquiring aggregate land holdings greater than 5 hectares. Applications are also publicly accessible online. Collected data includes the purchaser's name, state/province, country (of

residence) and intended land use (Prince Edward Island Regulatory and Appeals Commission, 2017).

Beneficial Ownership - Tracking and Reporting

Existing Canadian laws and regulations do not require entities purchasing land to disclose beneficial ownership (Ross, 2016). Therefore,

EVALUATION: 4.9 TRACKING AND REPORTING LEGAL AND BENEFICIAL OWNERSHIP

Approach

• Projected outcomes: Increase availability and transparency of farmland ownership data. Increased data availability provides the opportunity to accurately evaluate and monitor ownership trends in BC and effectively develop targeted policies.

Cost

- Reporting legal ownership: Moderately low. BC Assessment already collects some applicable information.
- Tracking and reporting beneficial ownership: Medium. Ongoing administrative costs regarding data collection.

Ease of Implementation

- Reporting legal ownership: Moderately easy. Data that is already collected could be made available to the public in a more accessible form e.g. a database.
- Tracking and reporting beneficial ownership: Moderately difficult. New comprehensive legislation
 and monitoring/enforcement personnel in a number of sectors would require training and ongoing
 support.

Timeframe

- Reporting legal ownership: Medium- to Long-Term: Updating existing records with new information could be time consuming.
- Tracking and reporting beneficial ownership: Medium to Long Term. Would require significant regulatory and administrative change and a high degree of coordination between policy actors and stakeholders.

- Legal owners of farmland would be required to provide information regarding beneficial owners. Privacy concerns likely to arise.
- Additional government resources would be required to create and maintain public information
- Governments would have greater access to data to support policy development.
- There would likely be resistance from those who benefit from the status quo.
- The public could benefit from a more transparent real estate market and economy.
- Financial institutions, lawyers and real estate agents etc. could have new legal obligations.

determining who is financially benefiting from agriculture land ownership, use and/ or development is extremely difficult, if not impossible.

Global precedents

In 2014, the G20 governments (Canada included) committed to implementing stronger rules under 10 principles of beneficial ownership, following recommendations made by the Financial Action Task Force (FATF, 2012)¹¹. In short, the recommendations include:

- 1. Creating an appropriate legal definition of beneficial owner.
- 2. Assessing risk of abuse of beneficial ownership.
- 3. Requiring legal persons, legal arrangements, financial institutions and Designated Non-Financial Businesses and Professions (DNFBPs, e.g. lawyers and real estate agents) to maintain and share beneficial ownership information.
- 4. Ensuring regulatory agencies can easily access and share beneficial ownership information domestically and internationally.
- 5. Increasing transparency of beneficial ownership.

One year after the G20 commitment, Transparency International¹² (TI) reported on the progress of all G20 nations in implementing the 10 principles. The United Kingdom scored the highest in TI's report with a 'very strong' beneficial ownership tracking/reporting framework (Martini & Murphy, 2015). After a 2015 legislative amendment, all companies in the UK must keep a 'Register of Members', recording the names and addresses of their shareholders. The UK has a central company registry that allows authorities in the UK to access full beneficial ownership information. The public is also able to access this information, with limitations to protect privacy. Companies must respond to information requests from government or the public within 5 business days (Transparency International, 2015).

With the exception of Alberta, Manitoba and Quebec, company information that is collected by Canadian provinces currently does not include shareholder information. In TI's report, Canada was deemed to have a 'very weak' beneficial ownership tracking/reporting framework (among the lowest 7 of the G20 countries), and had yet to fully comply with any of the 10 principles (Martini & Murphy, 2015; Ross, 2016).

4.10. Multi-Sector Governance

Description

Agencies that unite representatives from government, industry and civil society can make significant impacts on farmland protection and promoting its use for agriculture. There is no one model for these agencies, but they share common characteristics. They have representation from multiple government levels and agencies, as well as from food system stakeholder groups like farmers' unions, universities, industry groups and non-governmental organizations. They participate in policy-making, implementation, input, and advocacy. They take a strategic approach to agricultural development that combines planning, policy-making, and economic development. They also have access to diverse funding sources (Golden Horseshoe Food and Farming Alliance, 2016; Paül & McKenzie, 2013; Vermont Housing & Conservation Board, n.d.).

¹¹ FATF is an international, inter-governmental policy making body focused on addressing threats to the international financial system.

¹² TI is an independent, international, chapter based non-governmental organization with a mandate to stop corruption and promote accountability and transparency across all sectors of society.

An active and integrated approach to food system development can complement more passive farmland preservation policies to ensure that preserved farmland is actually used for farming (Paül & McKenzie, 2013). Local governments in BC can create agencies and form partnerships with other levels of government and civil society that address areas under their jurisdiction, such as facilitating farmland access, coordinating local food procurement policies, and supporting university-based extension education services. They can also develop networks and marketing campaigns to promote their goals and engender public support (Curran & Stobbe, 2010). Redundancy in farmland protection policies and

the involvement of multiple actors can improve farmland conservation, particularly in peri-urban areas that experience exacerbated non-use and development pressures. (Paül & McKenzie, 2013).

Canadian precedents

Food system and farming stakeholders in Ontario's Golden Horseshoe region (Niagara, Hamilton, and the Greater Toronto Area) recognized that the region's farmland preservation policies did not address the economic viability of farming (Walton, 2012). An extensive process of collaboration between local and regional governments, farmers, industry,

EVALUATION: 4.10 MULTI-SECTOR GOVERNANCE

Approach

Projected outcomes: No single outcome. Could lead to more robust policy development over the
long-term due to increased collaboration and relevance across agencies and levels of jurisdiction.
Indirectly, may increase the viability of farming as a result of focused attention across jurisdictions
and operations, collaboration, and greater access to policymakers.

Cost

• Medium. Costs include having government staff or politicians participate in governance and project work. Partners such as industry groups could contribute funding.

Ease of implementation

• Moderately difficult. This would be a highly political process by which to create policy and govern.

Timeframe

• Long-term. It would take time for collaboration and consensus-building to find common ground that can be sustained and acted upon.

- Farmers and other food system actors gain a stronger voice and increased influence on policy development.
- Governments would gain a greater awareness of the needs and issues facing the food system sector.
 It may become more complex to enact agricultural legislation and policies due to competing and/or conflicting priorities between groups.
- Other food system organizations (e.g. NGOs, academics/ scientists) could have a role in policymaking if the process is opened up for broader stakeholder participation.

and other stakeholders created the Golden Horseshoe Food and Farming Alliance and their Food and Farming Plan 2021 (Walton, 2012). The plan focuses on economic development and innovation and has been adopted as official policy of the member municipalities (IPES Food, 2017). Each municipality has an elected official or staff as a representative on the Alliance. This allows municipalities to share policies, information and ideas, and to take part directly in working groups to implement the Alliance's initiatives (IPES Food, 2017). Resulting actions to date include funding an expanded food business incubator, conducting research projects on the regional food economy, providing policy input into the Greenbelt Plan review, and supporting local food procurement for health care facilities, municipal cafeterias, and post-secondary schools (Golden Horseshoe Food and Farming Alliance, 2016).

Global precedents

The Baix Llobregat Agricultural Park (BLAP) at the edge of metropolitan Barcelona, Spain is a permanent legal entity representing a partnership between 14 municipal governments, the Catalan, provincial, and district governments, and a private farmers' union. The park itself comprises 3350 hectares, with two thirds of the land in agricultural production as 620 farms (average farm size is approximately 3.6 hectares or 8.8 acres) and 1200 farmers. The BLAP consortium takes an active role in land-use planning and policy making. Although the park is already subject to a regional Metropolitan Plan, the BLAP adopted its own land use plan in 2004 with agriculture as primary use and greater restrictions on industrial and hobby farm uses. The consortium consistently lobbies against infrastructure developments that threaten the farmland it stewards. In addition to its active land use policy role, the BLAP consortium has also

contributed to the development of a local food network in the metropolitan region. It provides technical knowledge to farmers through staff agronomists, and manages a successful marketing and branding strategy for its members' products (Paül & McKenzie, 2013).

4.11. Farmland Trusts

Description

Farmland trusts are organizations that acquire and maintain land for farming. Farmland is typically acquired by way of gift or direct purchase and protected with instruments such as covenants or conservation easements, which restrict land use activities to preserve farming capacity. Acquired farmland can then be re-sold or leased to farmers at accessible prices. (Curran & Stobbe, 2010; Land Conservancy, 2010).

Precedents in BC

Farm Folk, City Folk (FFCF), Capital Region Food & Agriculture Initiative (CR-FAIR), and UBC Land and Food Systems, are currently in the process of researching and establishing a BC foodlands trust program, through the Foodlands Cooperative of BC. The Foodlands Cooperative of BC holds the land in question, and works with community groups to facilitate its use for food production (Foodlands Cooperative of BC, n.d.). A number of farming enterprises already exist under this program.

Canadian precedents

The Ontario Farmland Trust is a non-profit charitable organization that aims to protect and preserve farmland in the province of Ontario. The organization secures agricultural easements to facilitate long-term preservation of farmland, and advocates for policy development to that same end (Ontario Farmland Trust, n.d.).

Global precedents

The Connecticut Farmland Trust is involved in the protection of 45 farms, primarily through the use of agricultural conservation easements (Connecticut Farmland trust, n.d.).

4.12. Public Land Banks

Description

In many Western European countries, a land bank is a state agency with a mandate of purchasing land and reselling or renting it out, usually for the purpose of land consolidation or land ownership reform (Hartvigsen, 2015). A public land bank with a focus on farmland would take an active role in acquiring underutilized farmland, addressing liabilities or limitations (e.g. lack of infrastructure like irrigation services or access roads), and promoting productive agricultural use of the land. A public land bank could be used to consolidate small, unfarmed ALR parcels into larger parcels which could support more varied forms of agriculture and therefore be more attractive to farmers as

EVALUATION: 4.11 FARMLAND TRUSTS

Approach

- Projected outcomes: Increase farmers' ability to access or acquire farmland. Trusts can use covenants
 to directly limit the sale price of farmland, making it more accessible to farmers. Trusts also directly
 preserve farmland and protect it from development and speculative ownership. This would need to
 be implemented in conjunction with strong restrictions to discourage/ prevent non-farm use (see
 next point).
- Some trusts in the US found that easements on land led to higher land prices because the conserved
 areas became desirable for their value as country estates (Land Conservancy, 2010). In this instance,
 preserving farmland had the opposite result, raising the price higher than what it could support
 through farming activities.

Cost

• High: A public land trust¹ would involve initial start-up costs and significant ongoing costs.

Ease of implementation

• Difficult: Creating a new public land trust to support regional/provincial land conservation would be challenging. Non-profit land trusts already exist in BC.

Timeframe

Long-term: If funding and good management are maintained, farmland trusts can have a long-term impact keeping farmland prices in line with agriculture production value capability (Land Conservancy, 2010).

- Farmers interested in preserving their land in perpetuity would have the option to sell to a land trust. Farmland trusts can lease land to farmers, increasing the ability of farmers to access land.
- Governments would take an active role in preserving farmland and lowering sale prices through their support or management of a trust.

¹ The Vermont Housing & Conservation Board cost \$3 million to start up, and an additional \$20 million in ongoing funds. The state eventually sourced other state and federal funding (Hamilton, 2004).

opposed to residential developers. Larger parcels sell for lower per acre prices in Metro Vancouver and the Fraser Valley (Sussmann et al., 2016), and therefore a land bank that consolidates agriculture lands may render aggregated parcels more affordable and hence more accessible by farmers (Colliers International, 2014).

Canadian precedents

In 1969, the provincial government of Prince Edward Island established a publicly funded land bank, the Land Development Corporation (LDC). Its mandate included acquiring farmland and making it available to farmers, as well as preserving and developing agricultural land for agricultural uses. The LDC no longer exists, with large capital and administrative costs a major reason for its cessation (Province of Nova Scotia, 2008). However, a report by the province's Commission on the Lands Protection Act acknowledged significant public support for a similar government-administered agency with land banking powers (Carver, 2013).

EVALUATION: 4.12 PUBLIC LAND BANKS

Approach

- Projected outcomes: Increase farmers' ability to access or acquire farmland. A public agriculture
 land bank would further protect farmland, increase farmers' ability to access (by renting or buying
 from the public land bank), and likely increase the amount of farmland used for farming. It could
 consolidate fragmented parcels to increase the viability of farmland for a range of farming uses.
- Unlike a land trust that focuses explicitly on preservation, this tool directly addresses increased farming use of farmland.

Cost

• High: In addition to startup and operational costs of a new agency, the cost of buying land would be significant.

Ease of implementation

• Difficult: Would likely require involvement from all levels of government. It would take time to determine the mandate, scope and powers of the agency. May require legislation and regulatory support.

Timeframe

• Long-term: Land purchases, improvements, and sales would be done incrementally. These activities would have most impact if carried out within a long-term strategy.

- Farmers would be able to buy or rent farmland from the state at appropriate prices.
- Governments would have to allocate funds or create new revenue sources in order to purchase land. Government would have greater influence over farmland use.

¹ Governments could explore public-private partnership models for funding. Refer to recommendations made in Commission of the Lands Protection Act (2013).

Global precedents

The Netherlands, Germany, and Denmark all have state-run land banks that function to achieve their land use/development goals. Denmark's agricultural ministry manages a state land bank that was initially established in 1919 to support the creation of viable family farms, but has since shifted to supporting projects aimed at ecosystem restoration (Hartvigsen, 2015).

An example of an agriculture-focused land bank is the Land Fund of Latvia, a state-owned and funded agency that allows the state to buy farmland and offer it for sale or rent to individuals or companies for agricultural use. The purpose of the Land Fund is to ensure that agricultural land is used for agricultural purposes and to curtail farmland speculation (Latvijas Republikas Saeima, 2017). From July 2015 to December 2016, the Fund procured 112 parcels of land with a total area of 2,038 ha and total price of EUR 4.6 million. It is projected to buy another 1,500 ha of land in 2017, worth EUR 3 million ("Investing", 2016).

EVALUATION: 4.13 LAND TRANSFER REGULATORY AGENCIES

Approach

Projected outcomes: Increase farmers' ability to access or acquire farmland; Reduce non-farm use
of farmland. The degree of effectiveness would depend on the nature of the agency. The actions of a
land transfer regulatory agency could result in lower sale price of farmland, less farmland used for
non-farm purposes, or more farmland used for productive farming. Agencies could possibly sell or
lease land back to farmers, increasing access to farmland. Agencies could monitor land transactions
and collect relevant data.

Cost

• High. Requires funding for staff, space, and operations. An agency with pre-emptive right to purchase land (similar to French SAFERs) would require significant funding/ cash flow.

Ease of Implementation

• Difficult. Legal and regulatory change would be required to establish new land transfer regulatory agencies.

Timeframe

Long-term.

- Market price of farmland could be controlled, and farmers could have reduced competition for farmland purchases, which would be a benefit for new farmers or farmers looking to acquire more land. Retiring farmers may see reduced revenue from agriculture land sales.
- Real estate industry faces additional administrative burden.
- Governments would have greater control over the agricultural land market and be able to effectively enforce farmland use, sales and ownership policies.

4.13. Land Transfer Regulatory Agencies

Description

A number of European nations have government agencies that regulate transfers of agricultural land ownership or operation in support of desired food system outcomes. For example, they might prevent the fragmentation of the agricultural land base or its concentration in the hands of a few owners. They regulate various aspects including sale price of the land, size of the land being sold, lease agreements (in support of tenant farmers - see Farmland Lease Regulations section 4.7), among others. (EEIG Agrosynergie, 2013).

Global precedents

In France, public agencies called SAFERs ("Sociétés d'Aménagement Foncier et d'Etablissement Rural")¹³ regulate the land market with the goal of preventing speculation or

concentration of land, supporting new farmers, and consolidating farm parcels to an appropriate and viable size. There are 26 SAFER agencies operating at the regional level, but they are governed by national legislation. Their governing boards have representatives from local and national government, farmers' organizations, and a major financial cooperative. SAFERs have the pre-emptive right to buy land that is on the market, and then resell it to interested farmers in alignment with its objectives. They can also suggest a lower price if the asking price is judged to be higher than market value for agricultural use. The seller must accept the adjudicated price or take the land off of the real estate market. Because the law requires that SAFERs be notified about all farmland sales, they have comprehensive information about farmland real estate market trends, enabling them to address speculation head on (Merlet, 2015).

¹³ Translated into English as "Land Development and Rural Settlement Associations" (Merlet & Levesque, 2008)

Table 7. Summary of policy precedents based on policy objective, cost, ease of implementation, and timeline.

Policy Precedents	Jurisdiction	Projected Outcome	Ease of Implementation	Timeframe
Fiscal Policies				
1. Farm Property Tax Relief	Provincial	Reduce non-farm use of farmland	Easy	Short
2. Farmland Conversion Tax	Provincial	Reduce non-farm use of farmland	Easy	Short
3. Farm Income Tax Relief	Federal	Raise farm incomes and/or improve the economic viability of farming	Moderately difficult	Medium
Land Use Policies				
4. Urban Growth Boundary	Municipal/ Regional	Reduce non-farm use of farmland	Moderately easy	Medium to long
5. Agriculture Enterprise Zones	Municipal/ Regional	Raise farm incomes and/or improve the economic viability of farming	Moderately easy	Medium
6. Required Mitigation of Rezoned Farmland	Municipal/ Regional	Reduce non-farm use of farmland	Moderately easy	Short
Regulatory Policies				
7. Farmland Lease Regulations	Provincial	Increase farmers' ability to access or acquire farmland	Moderately easy	Medium
8. Farmland Ownership Restrictions	Provincial	Increase farmers' ability to access or acquire farmland	Moderately difficult	Medium
9. Tracking & Reporting Legal and Beneficial Onwership of Farmland	Provincial/ Federal	Increase availability and transparency of farmland ownership data	Moderately difficult	Medium
Agency Policies				
10. Multi-sectoral Governance	Multiple	No single outcome	Moderately difficult	Long
11. Farmland Trusts (Public)	Provincial	Increase farmers' ability to access or acquire farmland	Difficult	Long
12. Public Land Banks	Provincial	Increase farmers' ability to access or acquire farmland	Difficult	Long
13. Land Transfer Regulatory Agencies	Provincial	Increase farmers' ability to access or acquire farmland	Difficult	Long

5. Discussion

Here we raise four pertinent considerations regarding the policies presented in this paper. The purpose is to motivate policy makers and practitioners to consider coordination, longevity, and impact of our policy environment and options. As we grapple with unprecedented resource exhaustion, environmental degradation, biodiversity loss and ecosystem compromise, we assert that these considerations are important. Agriculture and fresh water are necessary for both food production and human prosperity. Farmland is an irreplaceable, essentially non-renewable natural resource that must be protected.

5.1. Which policy has greatest impact?

The challenge of keeping farmland for farm use is complex and operates within the current food system and economic paradigm that treats food and food producing lands solely as commodities. Keeping farmland unavailable for speculative ownership and farmland values accessible to bona fide farmers cannot be isolated from economic globalization, market deregulation, concentration of wealth, and laissez-faire capitalism. Our policies need to protect our foodlands as the precious, scarce, and non-renewable resource that they are, for the fundamentally critical role they play in feeding us, and for the public benefits they bring to our communities.

To achieve such outcomes we need to acknowledge that our current policy regime is insufficient. Sweeping change in our policy landscape is required. The greatest impact will be achieved via a suite of policies that address the many different elements of the problem, are enacted at requisite governance levels, and operate within a clear, overarching vision of a sustainable food system.¹⁴

14 See MacRae (2011) and Food Secure Canada (2015) for examples of proposed national food policies to for comprehensive policy change.

There is no one jurisdiction or policy that can address the larger issue in isolation. For example, a policy that restricts ownership of farmland based on residency or agriculture credentials needs a way to track and evaluate beneficial ownership. Implementing these policies would require cooperation between the provincial and federal governments. In other words, two different policy instruments crafted by two different levels of government must work together to achieve the desired result.

While far-reaching, fundamental change is needed, many of the policy tools presented herein represent "low-hanging fruit"; that is, policy that would be relatively easy to implement, cost relatively little, and complement existing policies, processes, and regulations. These are the zoning, land use, and select taxation related tools. Other policies have potential for more profound impact (such as a public land trust or creation of a land transfer regulatory agency) by countering dominant contemporary political-economic ideology and the commodification of food and farmland. These would require public support, stakeholder engagement, coordination between communities and jurisdictions, and relatively substantial start-up and operational costs. Incremental change is integral to more profound wholesale system restructuring (MacRae, 2011). As such, both are important contributors to change. Individual jurisdictions must evaluate which tools make the most sense to pursue on a case-by-case basis, taking into account their priorities, goals, and resources. Leadership at all levels is important to effect lasting change. Thus it is critical to acknowledge that only a purposeful, strategic, multidimensional, and coordinated (between all levels of government) policy agenda will accomplish the crucial objective(s) we have identified.

5.2. How can policy withstand government change?

Policy is subject to the priorities and actions of the sitting government. A policy enacted by one government may be ignored, interpreted, amended, or repealed by successive governments. Some of the policy precedents discussed in this report have been amended or repealed due to shifts in governments, priorities and/or ideologies, including responses to market deregulation (e.g. The Netherlands' urban development boundary; Denmark's restriction of farmland ownership to bona-fide farmers). In BC, the ALR is an example of a food system policy that has experienced changes in scope and priority under different political parties since its implementation in 1973 (Garrish, 2002). Interestingly, the ALR has maintained high levels of public support (Ipsos Reid Public Affairs, 2008; McAllister Opinion Research, 2014).

For policy to transcend electoral cycles, it must be institutionalized, funded, embedded in high level policy, monitored, and evaluated to maintain public support (IPES Food, 2017). Any one level of government has limited power to affect the food system without support from, and alignment with, other governmental jurisdictions. Multisectoral governance structures (4.12) can amplify appeals emanating from local governments and communities for change in higher level government focus and policy. It can also facilitate funding streams from varied sources, which can help to buffer shifts in government budgeting priorities. Multi-sectoral collaboration can also build networks and relationships among stakeholders that transcend institutional boundaries and provide resilience in the face of transition.

5.3. How do we weigh public and private interests?

Conversations surrounding the protection and use of farmland resources cannot exist independently from discussions of public and private interests.

Valuing farmland for its potential to produce an essential resource for society's sustenance and wellbeing (food) rather than a commodity to be marketed, bought and sold exclusively for financial gain undoubtedly calls for an examination of many entrenched cultural constructs. Central to such discourse are the ideas of private property rights, land ownership, limitations of the "free market" ideal, the weighing of private interests with the maintenance of public goods, the reestablishment of the commons, as well as the role of government in enabling or curtailing these. For example, a number of the policies explored in this paper would result in decreased farmland property values, negatively impacting landowners whose wealth is primarily vested in their land. Others limit private property rights. Policy makers must be willing to question long-standing values, challenge vested interests, and invite informed policy debate in order to build support for effective systemic change.

6. Policies Suggested for Further Investigation

The following suite of six policies are presented for further investigation. In combination they have potential to achieve a range of desired outcomes that could result in increased use of farmland for agriculture and food production. Additionally, the policies presented below can operate within existing regulatory and agency frameworks in BC, which can facilitate their applicability to the BC context.¹⁵

1. Farmland ownership restrictions: Ownership restrictions limit the amount of farmland that can be owned by non-Canadians, non-residents and/ or non-Canadian owned entities. Restrictions can also be based on the intent/capability of landowners

¹⁵ These policies primarily target federal and provincial governments. Local governments also have an important role areas such as advocacy, liaising, enforcement and ensuring that their bylaws, policies and regulations are in alignment with provincial recommendations. E.g. Ministry of Agriculture's recommendations for bylaws in farming areas (BC Ministry of Agriculture, 2015).

to farm including farming-related experience, technical training, or minimum income from farming. Further study is required to determine the most appropriate dimensions for potential ownership restrictions in British Columbia.

2. Farm property tax relief reform: BC

Assessment facilitates reduced property taxation for farmland to support and encourage the public benefits provided by farming. Some benefits, such as a 50% school tax exemption, are available to all ALR property owners. Other benefits, such as reduced taxation rates, are available for properties classified as a farm for assessment purposes. To qualify, landowners must achieve a minimum annual income from farming activities. Presently BC has one of the lowest income thresholds for achieving farm class tax status in Canada, and abroad. In particular, the current \$2,500 annual gross farm income threshold for farms between 2 and 10 acres to qualify for farm class status (set in 1993) has been characterized as too easily achieved, and results in a much lower property tax burden¹⁶ for landowners who engage in minimal farming activity (Upland Consulting, 2015). Previous reviews¹⁷ of qualifying farm income thresholds propose two tax policy changes to ensure that the benefits to landowners are balanced with the public benefits they generate: 1) increase farm income threshold, particularly for farms between 2 and 10 acres; and 2) establish a multi-tier system that awards greater benefits to farms that achieve higher farm income levels.

3. Implement tax on the conversion of agricultural land to non-agricultural use:

Require the payment of a tax for the conversion of agricultural to non-agricultural uses. In order to be effective, the fee levied would need to be sufficient to remove financial incentive for the conversion of agricultural land. Additionally, this tax policy should not be used as carte blanche for the removal of agricultural land from the ALR.

- 4. Require the disclosure of beneficial, in addition to legal, ownership of farmland and make data publically available: Requiring data collection and reporting of both legal and beneficial land ownership can assist in the development and enforcement of policies related to farmland ownership and use as well as anticipate policy outcomes. Provincial oversight and management of farmland ownership tracking and reporting could help to assess and improve ownership policies and promote the use of farmland for agricultural purposes.
- 5. Improve lease regulations to promote longerterm leases and better ensure the rights and security of tenant farmers: There is minimal regulation of farmland lease agreements in BC, and Canada at large (OECD, 1996). Policies such as minimum lease terms, preferential purchase rights for tenants, and control of rental prices could improve the rights and security of tenant farmers.
- **6. Designate agricultural enterprise zones near farmland:** Strategic zoning for supportive agricultural activities can improve producers' access to essential services such as processing, storage, and eqipment repairs. Encouraging the co-location of agricultural services can facilitate the formation of local infrastructure to increase the viability of farming (Curran & Stobbe, 2010).

¹⁶ Metro Vancouver report assessed that the "...average difference in the annual taxes paid on a 10 acre (4 ha) lot with \$150,000 in building improvements for properties with, and without farm class, using tax rates for seven municipalities was \$7,088." (Metro Vancouver, 2016. P. 7)

¹⁷ Adjustments to qualifying income thresholds for farm classification represent one dimension of recommended property tax reform to encourage the agricultural use of farmland. For additional recommendations see Encouraging Agricultural Production through Farm Property Tax Reform in Metro Vancouver (Metro Vancouver, 2016).

7. Conclusion

If it is our intent to increase the use of BC's limited agricultural land for agriculture and food production, we must make farming more economically viable, eliminate competition for farmland from conflicting economic interests, prevent urban and industrial encroachment, remove incentives for non-farm uses, and halt speculative financial investment in farmland. To do this we need supportive, enabling and powerful policies.

One goal of this paper is to raise the profile of the issues of valuation, ownership, access and use of farmland, as well as the dearth of information regarding farmland ownership, and to bring forward existing policy precedents that may otherwise be overlooked or not readily imagined in the dominant socio-economic-political environment. But if we truly want systemic change, an examination and alteration of our precepts will be necessary. Policies that might seem radical for BC are, in other places, long accepted as the norm. Much of the groundwork already exists for the development and utilization of many promising policies. We must continue to improve on these frameworks and share results and best practices with other jurisdictions. In presenting and comparing these precedents, we hope to encourage discourse, debate and openness to novel and comprehensive ways of protecting agricultural land, supporting its use for agriculture, and expanding our options for the substantive food system change that is imperative for our sustainable food future.

Recommended future research includes a rigorous evaluation of the effectiveness and outcomes of the policies presented in this report. For example, pilot projects could be undertaken to test policy efficacy and impacts, with due consideration for the specific context and the many dimensions of the complex problem being addressed. In addition,

policymakers must acknowledge that increasing access to farmland and farming is only half the equation, and will not in and of itself result in a more sustainable, self-reliant, and economically robust food system that better captures and retains food dollars being spent in the region. Facilitating the development of a commensurate post-production sector (aggregation, processing, storage, and distribution) is also necessary and merits research into fostering its development.

Overwhelmingly, public sentiment in BC supports the objective of the ALR—farmland protection. Increasingly, the public comprehends the ramifications of relegating our food supply to the uncertainty of the neo-liberal, globalized food system, and they favor and participate in nascent local-regional food systems. Our policy makers now need to fully embrace the imperative of protecting farmland, the importance of enabling its exclusive valuation and use for farming, and the largely untapped potential that exists in building regional food systems. The time for our policy makers to take definitive action is now. At the same time, this requires society to confront the trade-offs that make land more accessible to farmers. The question we must ultimately ask is, at what juncture will the sense of strengthening food system adaptability, resilience, and food self-reliance become obvious enough to demand decisive support and action? Will we have time to act if we wait? It is imperative these questions be addressed if we are to move toward a food system future appropriate for the 21st century. In light of both the challenges and great potentials that exist, for British Columbians the time to do so is clearly upon us.

6. References

- Agricultural Land Commission. (2013). Agricultural capability classification in BC. Retrieved from: http://www.alc.gov.bc.ca/alc/content/library/agricultural-capability
- Agricultural Land Commission. (2017). Annual report 2016-2017. Retrieved from: http://www.alc.gov.bc.ca/assets/alc/assets/library/commission-reports/annual report 2016-2017.pdf
- Albisinni, F. (2017). Agricultural law in Italy: overview. Retrieved from: https://uk.practicallaw.thomsonreuters.com/6-606-7166
- Alterman, R. (1997). The challenge of farmland preservation: Lessons from a six-nation comparison. Journal of the American Planning Association, 63(2), 220-244. Retrieved from http://search.ebscohost.com/login.aspx?direct=true&db=bth&AN=9705083819&site=ehost-live&scope=site
- Avison Young. (2015). Metro Vancouver industrial overview. Retrieved from http://www.avisonyoung.com/fileDownloader.php?file=files/content-files/Offices/Vancouver/Research/2015/Vancouver_IndustrialOverview_Spring2015.pdf
- Bardach, E. (2012). A practical guide to policy analysis: The eightfold path to more effective problem solving. CQ Press, Sage Publications Inc.
- BC Ministry of Agriculture. (2011). Regulating the siting and size of residential uses in the ALR:
 Discussion paper and minister's bylaw standard.
 Retrieved from <a href="https://www2.gov.bc.ca/gov/content/industry/agriculture-seafood/agricultural-land-and-environment/strengthening-farming/local-government-bylaw-standards-and-farm-bylaws/residential-uses-in-the-alr

- BC Ministry of Agriculture. (2014). Metro Vancouver regional report summer 2010 & 2011. Retrieved from http://www.metrovancouver.org/services/regional-planning/agriculture/agriculture-land-use/Pages/default.aspx
- BC Ministry of Agriculture. (2015). Guide for bylaw development in farming areas. Retrieved from:

 http://www.alc.gov.bc.ca/assets/alc/assets/library/land-use-planning/guide for bylaw development in farming areas 2015.pdf
- BC Ministry of Agriculture (2016). Agriculture in Brief, Census of Agriculture, British Columbia Provincial Profile. Retrieved from https://www2.gov.bc.ca/gov/content/industry/agriculture-seafood/statistics/census-of-agriculture
- BC Ministry of Agriculture. (n.d.). Agricultural land use inventory reports. Retrieved from: http://www2.gov.bc.ca/gov/content/industry/agriculture-seafood/agricultural-land-and-environment/strengthening-farming/planning-for-agriculture/agricultural-land-use-inventories/
- Bengston, D. N., Fletcher, J. O., & Nelson, K. C. (2004). Public policies for managing urban growth and protecting open space: Policy instruments and lessons learned in the United States. Landscape and Urban Planning, 69(2–3), 271–286. doi:10.1016/j. landurbplan.2003.08.007
- Born, B., & Purcell, M. (2006). Avoiding the local trap. Journal of Planning Education and Research, 26(2), 195–207. https://doi.org/10.1177/0739456X06291389
- Bowler, A., & Ackhurst, K. (2015, June). Restrictions in Canada on foreign ownership of land. Cultivate (8). Retrieved from http://www.nortonrosefulbright.com/files/cultivate-food-and-agribusiness-newsletter-129806.pdf

- Brend, Y. (2017, November 28). Farm in Richmond, B.C., sells for more than 100 times its assessed value. CBC News British Columbia. Retrieved from http://www.cbc.ca/news/canada/british-columbia/richmond-farm-sales-alr-rural-land-sales-hot-1.4422668
- California Council of Land Trusts. (2014). Conserving California's harvest: A model mitigation program and ordinance for local governments. Retrieved from https://www.calandtrusts.org/wp-content/uploads/2014/03/conserving-californias-harvest-web-version-6.26.14.pdf
- Carlberg, J. G. (2002). Effects of ownership restrictions on farmland values in Saskatchewan. Journal of Agricultural and Applied Economics, 34(2), 349–358. https://doi.org/10.1017/S1074070800009111
- Carter-Whitney, M., & Miller, S. (2010). Nurturing fruit and vegetable processing in Ontario.

 Retrieved from https://sustainontario.com/custom/uploads/2011/03/Metcalf_Food_Solutions

 Nurturing Fruit and Vegetable Processing in Ontario.pdf
- Ciaian, P., Kancs, d., Swinnen, J., Van Herck, K., Vranken, L. (2012). Sales market regulations for agricultural land in EU member states and candidate countries (Factor Markets Working Paper No. 14). Brussels: Center for European Policy Studies.
- City of Abbotsford. (n.d.). Industrial land supply.

 Retrieved from http://www.abbotsford.ca/city_hall/plan_for_200K_- industrial land https://www.abbotsford.ca/city_hall/plan_for_200K_- industrial land https://www.abbotsford.ca/city_hall/ in
- City of Davis. (n.d.). Policy framework. Retrieved from http://cityofdavis.org/city-hall/community-development-and-sustainability/open-space-program/policy-framework
- City of Pitt Meadows. (2017). Zoning bylaw no. 2505. Retrieved from http://www.pittmeadows.bc.ca/EN/main/residents/738/2379.html

- City of Surrey. (2004). City policy no. O-51: Policy for considering applications for exclusion of land from the Agricultural Land Reserve. Retrieved from: http://www.surrey.ca/files/O51.pdf
- City of Surrey. (2014). Official community plan: Bylaw no. 18020. Retrieved from: http://www.surrey.ca/bylawsandcouncillibrary/BYL OCP 18020.pdf
- Clapp, J. (2014). Financialization, distance and global food politics. Journal of Peasant Studies, 41(5), 797–814. https://doi.org/10.1080/03066150.2013.8 75536
- Colliers International. (2014). Property tax scenario analysis for agricultural and industrial lands in the Metro Vancouver region. Retrieved from:

 http://www.metrovancouver.org/services/
 http://www.metrovancouver.org/services/
 http://www.metrovancouver.org/services/
 http://www.metrovancouver.org/services/
 http://www.metrovancouver.org/services/
 http://www.metrovancouver.org/services/
 http://www.metrovancouver.org/services/
- Commission on the Lands Protection Act. (2013). The gift of jurisdiction: our island province. Report on the Prince Edward Lands Protection Act. Retrieved from https://www.princeedwardisland.ca/sites/default/files/publications/gift of jurisdiction our island province.pdf
- Condon, P. M., Mullinix, K., Fallick, A., & Harcourt, M. (2010). Agriculture on the edge: Strategies to abate urban encroachment onto agricultural lands by promoting viable human-scale agriculture as an integral element of urbanization. International Journal of Agricultural Sustainability, 8(1-2), 104-115. doi:10.3763/ijas.2009.0465
- Connecticut Farmland Trust. (n.d.). What we do.

 Retrieved from http://ctfarmland.org/site/what-we-do-2/
- Conner, D. S., Knudson, W. A., Hamm, M. W., & Peterson, H. C. (2008). The food system as an economic driver: Strategies and applications for Michigan. Journal of Hunger and Environmental Nutrition, 3(4), 371-383. http://dx.doi.org/10.1080/19320240802528849

- Cooper, S. (2017, May 28). Speculators target B.C. farmland after foreign buyer tax introduced for residences. The Vancouver Sun. Retrieved from: http://vancouversun.com/news/local-news/farmland
- Coughlin, R. E. (1981). The protection of farmland: a reference guidebook for state and local governments. Washington, D.C.: National Agricultural Lands Study.
- Crawford, E., & Beveridge, R. (2013). Strengthening BC's agriculture sector in the face of climate change. Retrieved from http://pics.uvic.ca/sites/default/files/uploads/publications/Strengthening%20BC%27s%20Agriculture%20Sector_0.pdf
- Curran, D. (2003). Smart bylaws summary. Retrieved from http://www.wcel.org/publication/smart-bylaws-summary
- Curran, D., & Stobbe, T. (2010). Local government policy options to protect agricultural land and improve the viability of farming in Metro Vancouver. Retrieved from http://www.metrovancouver.org/services/regional-planning/PlanningPublications/Local Government PolicyOptions to Protect Agricultural Land.pdf
- Direction générale des Finances publiques [General Directorate of Public Finances]. (2017, June 12). Résultat imposable à l'impôt sur le revenu (IR) ou à l'impôt sur les sociétés (IS) [Income taxable result (IR) or corporation tax (IS)]. Retrieved from https://www.impots.gouv.fr/portail/professionnel/resultat-imposable-limpot-sur-le-revenu-ir-ou-limpot-sur-les-societes
- District of Saanich. (2008). Sustainable Saanich official community plan. Retrieved from http://www.saanich.ca/EN/main/community/community-planning/official-community-plan-ocp.html

- EEIG Agrosynergie. (2013). Evaluation of the structural effects of direct support; Chapter 4 Review of national legal and institutional frameworks.

 Retrieved from https://ec.europa.eu/agriculture/evaluation/market-and-income-reports/structural-effects-direct-support-2013 en
- Financial Action Task Force. (n.d.). Glossary. Financial Action Task Force. Paris, France. Retrieved from: http://www.fatf-gafi.org/glossary/
- Financial Action Task Force (2012, updated 2016). International Standards on Combating Money Laundering and the Financing of Terrorism & Proliferation. The FATF Recommendations. Retrieved from http://www.fatf-gafi.org/media/fatf/documents/recommendations/pdfs/FATF-Recommendations.pdf
- Ferguson, S., Furtan, H., & Carlberg, J. (2006).

 The political economy of farmland ownership regulations and land prices. Agricultural Economics, 35(1), 59–65. https://doi.org/10.1111/j.1574-0862.2006.00139.x
- Fødevareministeriet [Ministry of Environment and Food]. (2009, October 8). Forslag til lov om ændring af lov om landbrugsejendomme [Proposals to law amending the agricultural property act]. Retrieved from https://www.retsinformation.dk/Forms/R0710.aspx?id=127384
- Foodlands Cooperative of BC (n.d.). What We Do. Retrieved from http://www.foodlandscooperativeofbc.ca/what-we-do/
- Food Secure Canada. (2015). Resetting the table: A people's food policy for Canada. Retrieved from https://foodsecurecanada.org/sites/ foodsecurecanada.org/files/fsc-resetting-2015 web. pdf
- G20. (2014). G20 high-level principles on beneficial ownership transparency. Retrieved from: http://star.worldbank.org/star/sites/star/files/g20_high-level-principles-beneficial-ownership_transparency.pdf

- Garrish, C. (2002). Unscrambling the omelette: Understanding British Columbia's agricultural land reserve. BC Studies 136, 25-55. Retrieved from http://ojs.library.ubc.ca/index.php/bcstudies/article/view/1649/1694
- Golden Horseshoe Food and Farming Alliance. (2016). Reports from the alliance. Retrieved from http://www.foodandfarming.ca/about/reports-and-messages/
- Government of Quebec (n.d.-a) Conditions
 d'admissibilité [Eligibility criteria]. Retrieved
 from http://www.mapaq.gouv.qc.ca/fr/
 Productions/taxes/conditionsdadmissibilite/Pages/
 conditionsdadmissibilite.aspx
- Government of Quebec. (n.d.-b). Land register of Quebec. Retrieved from http://mern.gouv.qc.ca/english/land/register/index.jsp
- Government of Saskatchewan. (2015). Saskatchewan farmland ownership. Retrieved from https://www.saskatchewan.ca/~/media/files/government/have%20your%20say/farmland/farmlandownership.pdf?la=en
- Government of Saskatchewan. (2016). The Saskatchewan farm security act. Retrieved from http://www.publications.gov.sk.ca/freelaw/documents/English/Statutes/Statutes/S17-1.pdf
- Grando, S., & Ortolani, L. (2015). Short food chains in Rome: Context, experiences, policy implications. Urban Agriculture Magazine, 29, 57-59. Retrieved from http://www.ruaf.org/sites/default/files/UAM%2029%20p57-59.pdf
- Hall, P. (1984). The World Cities. London: Weidenfeld and Nicolson.
- Hamilton, B. (2004). Agricultural land trust research project: Final report. Manitoba Research Alliance. Retrieved from http://deslibris.ca/ID/224891

- Hartvigsen, M. (2015). Experiences with land consolidation and land banking in central and eastern Europe after 1989 (Land Tenure Working Paper no. 26). Rome: Food and Agriculture Organization of the United Nations. Retrieved from http://www.fao.org/3/a-i4352e.pdf
- Hassebrook, C. (2006). What the family farm crisis looks like: Factors contributing to the current situation and building a national agenda for change. In K. Mullinix (Ed.), The Next Agricultural Revolution: Revitalizing family-based agriculture and rural communities (pp. 23–31). Yakima, Washington: Good Fruit Grower.
- Hausrath Economics Group. (2014). County of Yolo agricultural mitigation program policy options for increased mitigation ratios: Public review draft report. Retrieved from http://www.yolocounty.org/home/showdocument?id=27310
- Heffernan, W. (2006). Understanding what's happening in our food and farming systems. In K. Mullinix (Ed.), The Next Agricultural Revolution: Revitalizing family-based agriculture and rural communities (pp. 11–21). Yakima, Washington: Good Fruit Grower.
- Heminthavong, K., & Lavoie, A. (2015, June 1).
 Farmland grabbing in Canada. (Publication no. 2014-101-E). Retrieved from httml?cat=agriculture
- Holtslander, C. (2015). Losing our grip 2015 update: How a corporate farmland buy-up, rising farm debt, and agribusiness financing of inputs threaten family farms and food sovereignty. National Farmers Union. Saskatoon, Saskatchewan.
- Institute for Sustainable Food Systems. (2017).

 Municipal planner interview with the City of
 Surrey re: policy for considering application for
 exclusion of land from the ALR. Retrieved from
 https://www.kpu.ca/isfs/foodpolicydatabase/city-surrey-policy-considering-applications-exclusion-land-agricultural-land

- Baltic News Network. (2016, December 16). Investing three millions, Land Fund to procure 1,500 ha of land next year. (Retrieved from http://bnn-news.com/investing-three-millions-land-fund-to-procure-1-500-ha-of-land-next-year-156763
- IPES Food. (2017). What makes urban food policy happen? Insights from five case studies. International Panel of Experts on Sustainable Food Systems. Retrieved from http://www.ipes-food.org/new-report-what-makes-urban-food-policy-happen
- Ipsos Reid Public Affairs. (2008, December 12). Poll of public opinions toward agriculture, food and agrifood production in BC. Retrieved from https://www.alc.gov.bc.ca/alc/content/library/audits-and-surveys
- Kalugina, A. (2016). Affordable housing policies: An overview. Cornell Real Estate Review, 14(1), 76-83. Retrieved from http://scholarship.sha.cornell.edu/crer/vol14/iss1/10/
- Klassen, S. E., & Wittman, H. (2017). Place-based food systems: 'Re-valuing local' and fostering socioecological sustainability. In J. Duncan & M. Bailey (Eds.), Sustainable Food Futures: Multidisciplinary Solutions. London and New York: Routledge.
- Koomen, E., Dekkers, J., & Van Dijk, T. (2008). Openspace preservation in the Netherlands: Planning, practice and prospects. Land Use Policy, 25(3), 361–377.
- Land Act, RSBC 1996, c 245, s. 9.
- Land Conservancy. (2010). A review of farmland trusts:

 Communities supporting farmland, farming, and farmers. Retrieved from http://www.farmfolkcityfolk.ca/community-farms-program/a-review-of-farmland-trusts/
- Land Use and Natural Resources Clinic. (2015).

 Agricultural mitigation case studies: Program summaries and stakeholder perspectives from seven western communities. Retrieved from http://www.farmlandinfo.org/sites/default/files/2015-07-UM-LawClinicAgMitigationCase%20Studies-Final.pdf

- Latvijas Republikas Saeima [Parliament of the Republic of Latvia]. (2017, March 23). Rules for purchasing agricultural land revised. Retrieved from http://www.saeima.lv/en/news/saeima-news/25729-rules-for-purchasing-agricultural-land-revised
- Lavina, L., Kalviša, A. and Šestakova, N. (2017, June 14). Significant amendments to the law on land privatisation in rural areas. Lexology. Retrieved from: http://www.lexology.com/library/detail.aspx?g=e0d048bd-6300-40ef-90da-c5432323a670
- Leduc County. (2017). Land use bylaw 7-08. Retrieved from http://www.leduc-county.com/about/documents#category/960
- MacRae, R. (2011). A joined up food policy for Canada. Journal of Hunger & Environmental Nutrition, 6(4), 424-457. doi:10.1080/19320248.20 11.627297
- MacRae, R., & Donahue, K. (2013). Municipal Food Policy Entrepreneurs: A Preliminary Analysis of How Canadian Cities and Regional Districts are Involved in Food System Change. Canadian Agri-Food Policy Institute. Ottawa. Retrieved from Canadian Electronic Library/desLibri0s
- Martini, M. (2017). Doors wide open: Corruption and real estate in four key markets. Transparency International. Retrieved from: https://www.transparency.org/whatwedo/publication/doorswide open corruption and real estate in four key markets
- Martini, M., & Murphy, M. (2015). Just for show: Reviewing G20 promises on beneficial ownership. Transparency International Report. Retrieved from: https://www.transparency.org/whatwedo/publication/just for show g20 promises
- McAllister Opinion Research. (2014). BC public attitudes toward agriculture and food 2014.

 Retrieved from http://www.refbc.com/sites/default/files/BC-Poll-Agriculture-and-Food-Detailed-Topline-Report-Aug-2014-PUBLIC.pdf

- McMichael, P. (2011). Food system sustainability: Questions of environmental governance in the new world (dis)order. Global Environmental Change, 21(3), 804–812. https://doi.org/10.1016/j. gloenvcha.2011.03.016
- Merlet, M. (2015, April). SAFERs: Land agencies that have been used to regulate the French rural land market for over 50 Years. Retrieved from http://www.agter.org/bdf/en/corpus chemin/fiche-chemin-556.html
- Merlet, M., & Levesque, R. (2008, May). The SAFERs, an original land market regulation mechanism that is operated by the State and farmers' organisations in France. Retrieved from http://www.agter.org/bdf/en/corpus_chemin/fiche-chemin-56.html
- Metro Vancouver. (n.d.). About industrial lands.

 Retrieved from http://www.metrovancouver.org/services/regional-planning/industrial-lands/about-industrial-lands/Pages/default.aspx
- Metro Vancouver. (2011). Regional food system strategy. Retrieved from https://www.metrovancouver.org/services/regional-planning/PlanningPublications/RegionalFoodSystemStrategy.pdf
- Metro Vancouver. (2014). Farming in Metro Vancouver. Retrieved from http://www.metrovancouver.org/services/regional-planning/agriculture/resources/Pages/default.aspx
- Metro Vancouver. (2015). Farm lease agreements in Metro Vancouver. Retrieved from: http://www.metrovancouver.org/services/regional-planning/agriculture/resources/Pages/default.aspx
- Metro Vancouver. (2016). Encouraging agricultural production through farm property tax reform in Metro Vancouver. Retrieved from http://www.metrovancouver.org/services/regional-planning/agriculture/resources/Pages/default.aspx

- Metro Vancouver. (2017, July 28). Metro Vancouver 2040: Shaping our future. (Bylaw No.1136, 2010). Retrieved from http://www.metrovancouver.org/services/regional-planning/metro-vancouver-2040/about-metro-2040/Pages/default.aspx
- Ministry of Community and Rural Development. (2009). Farm assessment review panel: 2009 report. Retrieved from http://deslibris.ca/ID/218695
- Ministry of Economy and Finance. (2016, December 7). 2017 budget law. Retrieved from http://www.mef.gov.it/en/focus/article_0028.html
- Mullinix, K., Dorward, C., Shutzbank, M., & Krishnan, P. (2013). Beyond protection: Delineating the economic and food production potential of underutilized, small-parcel farmland in metropolitan Surrey, British Columbia. Journal of Agriculture, Food Systems, and Community Development: New Leaf Associates, Inc. doi:10.5304/jafscd.2013.041.005
- Mullinix, K., C. Dorward, C. Sussmann, W. Polasub, S.
 Smukler, C. Chiu, A. Rallings, C. Feeney, and M.
 Kissinger. (2016). The future of our food system:
 Report on the Southwest BC bioregion food system design project. Richmond, British Columbia:
 Institute for Sustainable Food Systems, Kwantlen Polytechnic University.
- Needham, B. (1992). A theory of land prices when land is supplied publicly: The case of the Netherlands. Urban Studies, 29(5), 669–686. https://doi.org/10.1080/00420989220080621
- Nibourg, T. (2016). How Do I Obtain "Farm"

 Status in Alberta Frequently Asked Questions.

 Retrieved January 10, 2018, from http://www1.

 agric.gov.ab.ca/\$department/deptdocs.nsf/all/faq7142?opendocument
- Ontario Farmland Trust. (n.d.). Ontario farmland trust. Retrieved from https://ontariofarmlandtrust.ca/

- Ontario Ministry of Agriculture, Food and Rural Affairs. (n.d.). Farm property class tax rate program. Retrieved from http://www.omafra.gov.on.ca/english/policy/ftaxfacts.htm
- Organisation for Economic Cooperation and Development. (1996). Policies affecting farmland mobility. Retrieved from http://www.oecd.org/officialdocuments/ publicdisplaydocumentpdf/?cote=OCDE/GD(96)125&docLanguage=En
- Organisation for Economic Cooperation and Development. (2009). Evaluation of agricultural policy reforms in Japan. Retrieved from https://www.oecd.org/japan/42791674.pdf
- Paül, V., & McKenzie, F. H. (2013). Peri-urban farmland conservation and development of alternative food networks: Insights from a case-study area in metropolitan Barcelona (Catalonia, Spain). Land Use Policy, 30(1), 94-105. doi:10.1016/j.landusepol.2012.02.009
- Prince Edward Island Regulatory and Appeals
 Commission. (n.d.). The Prince Edward Island
 Lands Protection Act. Retrieved from http://www.irac.pe.ca/document.aspx?file=faq/documents/lpafaq.asp
- Prince Edward Island Regulatory and Appeals Commission. (2017). LPA applications databank. Retrieved from http://www.irac.pe.ca/land/data/
- Province of Manitoba. (n.d). The Manitoba farm industry board and the farm lands ownership act.

 Government of Manitoba. Retrieved from: https://www.gov.mb.ca/agriculture/land/pubs/farm-lands-ownership-act-factsheet.pdf
- Province of Nova Scotia. (2008, October). A review of initiatives intended to conserve agricultural land. Retrieved from https://novascotia.ca/agri/documents/business-research/LandUseReview.pdf

- Provincial Agricultural Land Commission. (2011, July). Business plan 2011/12. Retrieved from http://www.alc.gov.bc.ca/alc/content/library/commission-reports
- Quayle, M. (1998). Stakes in the ground: Provincial interest in the agricultural land commission act.

 Retrieved from http://www.alc.gov.bc.ca/assets/alc/assets/library/archived-publications/alr-history/stakes in the ground quayle 1998.pdf
- Ross, A. (2016). No reason to hide: Unmasking the anonymous owners of Canadian companies and trusts. Transparency International Canada. Retrieved from http://www.transparencycanada.ca/wp-content/uploads/2017/05/TIC-BeneficialOwnershipReport-Interactive.pdf
- Schmid, O., & Jahrl, I. (2014, April). WP2 final case study report: City region of Zurich (Switzerland). Frick, Switzerland: FiBL Switzerland and SUPURBFOOD Project. Retrieved from http://supurbfood.eu/scripts/document.php?id=126
- Site Economics Ltd. (2015, October). The industrial land market and trade growth in Metro Vancouver. Retrieved from https://www.portvancouver.com/wp-content/uploads/2015/12/SiteEconomics-Study_MetroVancouver-Industrial-Land-Market.pdf
- Smith, B. E. (2012). A work in progress The British Columbia farmland preservation program. Retrieved from https://www.alc.gov.bc.ca/alc/content/library/archived-publications/alr-history
- State of Hawaii. (n.d.). Enterprise zones. Retrieved from http://invest.hawaii.gov/business/ez/
- State of Hawaii. (2016). Hawaii enterprise zones program. Retrieved from http://invest.hawaii.gov/business/ez/ez-annual-reports/

- State of Michigan. (n.d.). Farmland and open space preservation frequently asked questions. Retrieved from http://www.michigan.gov/mdard/0,4610,7-125-1599 2558-10312--,00.html
- State of Michigan State Tax Commission. (2013). State tax commission qualified agricultural property exemption guidelines. Retrieved from https://www.michigan.gov/documents/Qualified Agricultural-Prop_139854 7.pdf
- State of Vermont. (n.d.). Understanding current use. Retrieved from http://tax.vermont.gov/property-owners/current-use/current-use-enrollment
- Statistics Canada. (2016). Table 203-0028: Survey of household spending (SHS), detailed food expenditures, Canada, regions and provinces, annual dollars [Table]. Retrieved from CANSIM database.
- Statistics Canada. (2017). Table 004-0204: Census of Agriculture, tenure of land owned, leased, rented, crop-shared, used through other arrangements or used by others (Percentage Change (periodto-period)), every 5 years [Table]. Retrieved from CANSIM database.
- Sussmann, C., Dorward, C., Polasub, W., Mullinix, K., & Mansfield, B. (2016). Home on the range:
 Cost pressures and the price of farmland in Metro Vancouver. Retrieved from http://www.kpu.ca/sites/default/files/ISFS/Sussmann%20et%20al%20
 2016 Home%20on%20the%20Range.pdf
- Tomlinson, K. (revised 2017, November 12, original publication 2016, November 18,). On B.C.'s farmland, mega-mansions and speculators reap the rewards of lucrative tax breaks. The Globe and Mail. Retrieved from https://www.theglobeandmail.com/news/investigations/farmland-and-real-estate-in-british-columbia/article32923810/

- Transparency International. (2015). United Kingdom: Beneficial ownership transparency. Retrieved from: https://www.transparency.org/files/content/publication/2015 BOCountryReport United Kingdom.pdf
- Upland Consulting. (2015). Farm Tax Class
 Income Threshold Investigation. Retrieved
 from http://www.metrovancouver.org/services/regional-planning/PlanningPublications/FarmTaxClassIncomeThresholdInvestigation.pdf
- US Commodity Futures Trading Commission. (n.d.). CFTC glossary. Retrieved from http://www.cftc.gov/ConsumerProtection/EducationCenter/CFTCGlossary/glossary_s
- Vermont Housing & Conservation Board. (n.d.). Mission & history. Retrieved from http://www.vhcb.org/mission-history.html
- Walton, W. (2012, January). Golden Horseshoe food and farming action plan 2021. Retrieved from http://www.gtaaac.ca/pdfs/Action_Plan.pdf
- Wisc. Stat. Farmland Preservation Agreements.
 Wisc. Stat. § 91.60-91.70) (2015-2016). Retrieved
 January 2018 from https://docs.legis.wisconsin.gov/document/statutes/91.60(2)
- Wittman, H and Dennis, J. (2014). Farmland access in British Columbia project summary report. Faculty of Land and Food Systems, University of British Columbia.
- Zonneveld, W. (2007). A sea of houses: Preserving open space in an urbanised country. Journal of Environmental Planning and Management, 50(5). doi:10.1080/09640560701475303