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Preserving Winescapes amid North America's Urban Sprawl

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Résumé de l'article

La péninsule du Niagara en Ontario et la vallée de Napa en Californie, toutes deux plus petites que la plupart des célèbres régions viticoles du monde, se trouvent dans deux des régions les plus densément peuplées d'Amérique du Nord. Leurs champs, leurs vergers et leurs vignobles ont subi la pression de l'expansion des métropoles et se sont retrouvés au coeur des débats sur la perte de terres agricoles de premier choix au Canada et aux États-Unis. En 1968, le comté de Napa a créé l'une des premières réserves agricoles au monde afin de lutter contre l'étalement urbain. En 2005, après des décennies de débats, le gouvernement de l'Ontario a inclus la péninsule du Niagara dans une ceinture verte pour la grande région métropolitaine de Toronto ; ses dispositions agricoles ont imité la réserve de Napa. Les promoteurs des deux régions ont mis l'accent sur la multifonctionnalité de l'espace rural. En fin de compte, cependant, la production de vin et le tourisme qu'elle a engendré ont offert des avantages financiers que peu d'autres cultures ont pu offrir. Les paysages viticoles se sont avérés essentiels à la protection des espaces ruraux. Cependant, des différences apparaissent également dans ces histoires. La complexité de l'utilisation des terres et des municipalités dans la région de Niagara a compliqué les efforts de préservation des terres agricoles.

Preserving Winescapes amid North America's Urban Sprawl*

KATHLEEN A. BROSNAN

Abstract

Ontario's Niagara Peninsula and California's Napa Valley, both smaller than most of the world's famed wine regions, exist within two of the most densely populated regions in North America. Their fields, orchards, and vineyards faced pressure from expanding metropolises and became part of ongoing debates about the loss of prime agricultural lands in Canada and the United States. In 1968, Napa County created one of the world's first agricultural preserves to stave off sprawl. In 2005, after decades of debate, the Ontario government included the Niagara Peninsula in a greenbelt for the larger Toronto metropolitan region; its agricultural provisions mimicked Napa's preserve. Boosters in both regions have emphasized the multifunctionality of the countryside. In the end, however, wine production and the tourism it engendered offered financial benefits that few other crops provided. Winescapes proved essential to protecting rural spaces. Yet differences also emerge in these histories. The complexity of land use and of municipalities in Niagara complicated efforts to preserve agricultural lands.

Résumé

La péninsule du Niagara en Ontario et la vallée de Napa en Californie, toutes deux plus petites que la plupart des célèbres régions viticoles du monde, se trouvent dans deux des régions les plus densément peuplées d'Amérique du Nord. Leurs champs, leurs vergers et leurs vignobles ont subi la pression de l'expansion des métropoles et se sont retrouvés au cœur des débats sur la perte de terres agricoles de premier choix au Canada et aux États-Unis. En 1968, le comté de Napa a créé l'une des premières réserves agricoles au monde afin de lutter contre l'étalement urbain. En 2005, après des décennies de débats, le gouvernement de l'Ontario a inclus la péninsule du Niagara dans une ceinture verte pour la grande région métropolitaine de Toronto ; ses dispositions agricoles ont imité la réserve de Napa. Les promoteurs des deux régions ont mis l'accent

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sur la multifonctionnalité de l'espace rural. En fin de compte, cependant, la production de vin et le tourisme qu'elle a engendré ont offert des avantages financiers que peu d'autres cultures ont pu offrir. Les paysages viticoles se sont avérés essentiels à la protection des espaces ruraux. Cependant, des différences apparaissent également dans ces histoires. La complexité de l'utilisation des terres et des municipalités dans la région de Niagara a compliqué les efforts de préservation des terres agricoles.

Separated by 4,200 kilometres, California's Napa Valley and Ontario's Niagara Peninsula share important characteristics. Their wine industries employ *vitis vinifera*, a grape species native to Europe and Central Asia and distributed across the Western Hemisphere as part of larger settler colonial projects that sought land through the dispossession of Indigenous peoples. Napa encompasses the traditional lands of the Wappo tribe; Niagara is the long-established territory of the Haudenosaunee and Anishinaabe peoples, many of whom continue to live and work there.[1] Production spaces in Napa and Niagara are smaller than most of the world's famed wine regions. And facing pressure from expanding metropolises, both winescapes have been part of a debate over the loss of prime agricultural lands in the United States and Canada.

Napa County lies north of San Francisco Bay in one of the most densely populated regions of the United States. Napans have engaged in viticulture for nearly 200 years, but had not yet achieved international renown when, in 1968, the county created an agricultural preserve to stave off urban sprawl. The reputation of Niagara wines improved more recently with a shift from native *vitis labrusca* to *vitis vinifera* in the 1990s. As Niagara vintners sought to protect their burgeoning industry from sprawl, severances, and free trade, Donald Ziraldo, co-founder of Inniskillin Wines, observed, "We have a very successful model in the Napa Valley."[2] In 2005, after decades of debate, the Ontario government included the Niagara Peninsula in a greenbelt for the larger Toronto metropolitan region; its agricultural provisions mimicked Napa's preserve. Planners in both regions utilized protective measures to ensure agricultural forms persisted, while battling entrenched attitudes that saw nonurban places as "rural space" where resources are depleted or managed rather than a multifunctional countryside for farming, recreation, and nature conservation.[3] Rhetoric surrounding the Napa and Ontario laws captured traditional notions of the rural idyll.[4] In the end, however, these measures succeeded in large part because the preserved "farming" involved high-quality wine production and the tourism that accompanied it.

These cases also raise significant questions about the regulation of property rights and jurisdictional control of the land in question. Despite shared origins in English law, key differences emerge between Napa and Niagara. In both cases, efforts to leave land permanently ensconced in agriculture combined local ordinances with state or provincial laws in unequal measure. Where more heterogeneous land uses or multiple municipalities were involved, as in Niagara, regional planning met greater obstacles, requiring greater action at the provincial level, while in a more homogeneous Napa County, local government created and expanded its preserve.

The Napa Valley Case

Napa Valley forms the heart of Napa County, one of nine counties surrounding San Francisco Bay (see Figure 6.1). The Mayacamas Mountains lie to the north and west and the Vaca Mountains to the east. The valley begins at the foot of Mount St. Helena, stands 1.6 kilometres across at its northern end, travels 48 kilometres southward, and reaches just 8 kilometres across in the south. Except for a few smaller valleys, the remainder of the county contains mountains and a manmade reservoir. Divided into microclimates, the valley historically enjoyed abundant summer sunshine and ocean breezes that cool the land in the evenings.[5] As of 2020, some 71 percent of the county population lived in the lower valley cities of Napa and American Canyon, and another 10 percent resided in the upper valley communities of Calistoga, St. Helena, and Yountville, with the remainder in unincorporated areas. The county maintained its low population even as the San Francisco metropolitan region witnessed rapid suburbanization following World War II.[6]

Suburbs created new avenues of commerce in postwar America. Developers moved into open spaces on the fringe of urban communities, built tract homes, and waited for the transportation infrastructure and essential services to follow, filling in the holes. The automobile was essential to the sprawling landscape that emerged. Conspicuous consumption and home ownership increasingly defined citizenship.[7] Urban historian and architect Dolores Hayden observes that sprawl, which she defines as "a process of large-scale real estate development resulting in low-density, scattered, car-dependent construction usually on the periphery of declining older suburbs and shrinking city centers," began in the 1930s when real estate developers, auto producers, and road contractors lobbied the federal government for mortgage and banking legislation followed by highway legislation

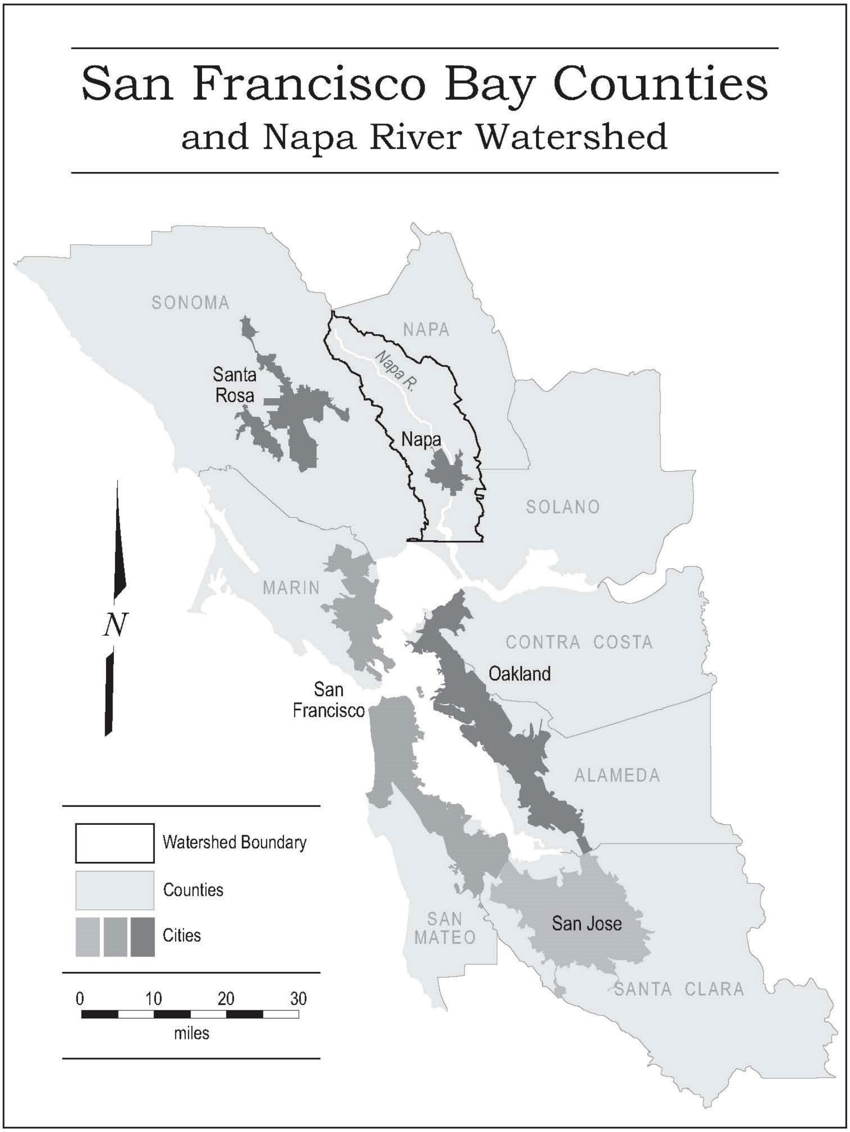

Figure 6.1. San Francisco Bay Counties and Napa River Watershed. Map created for author by University of Tennessee Geography Department Lab.

and favourable tax breaks in the 1950s. As a result of these laws, private interests garnered huge profits by building homes, malls, and highways and helping to generate consumer interest in single-family homes.[8] Hayden and others have delineated the racism and sexism that permeated mortgage lending and contributed to segregation following World War II.[9]

In the 1960s, contemporary critics also voiced concerns about the loss of prime agricultural lands to sprawl. New suburbs gobbled up California lands that grew such specialty crops as nuts, fruits, and wine grapes.[10] For example, Santa Clara County, just south of San Francisco, once produced fine wines and a third of the world's prunes. Between 1940 and 1970, its population grew 600 percent as the famed Silicon Valley replaced its agrarian landscape.[11] In 1960, Napa still had the lowest population density in the Bay Area and fewer than 66,000 residents, but other North Bay counties, Marin and Sonoma, had seen their populations triple and double, respectively, in twenty years. For Napa planners, trends suggested that their population might exceed 210,000 people by the new millennium, a nearly 220 percent increase from 1960, altering the county's agrarian character.[12]

Napans began commercial wine production around 1860, but over the next hundred years produced other crops as well. Orchards interspersed among vineyards; cattle pasturage remained profitable. A long-term shift toward increased grape cultivation only crystallized in the 1960s as lower returns on prunes and walnuts led many growers to uproot trees and plant vines. Napa wines, which had improved after the repeal of Prohibition in 1934 and other interventions, earned a larger share of the domestic market. Napa vintners and University of California extension agents believed that both the premium wine sector and Napa's role in it could expand in future decades.[13] All of this could be lost, however, if sprawl continued unchecked. Some Napan families had quartered or halved farm properties to provide for children. Given the difficulties of making small parcels profitable, they were susceptible to developers. Once developers made inroads, Napans feared, a patchwork of subdivisions would follow, attracting waves of suburbanites. In the 1960s, subdivisions were still more profitable than vineyards.[14]

Farmers and ranchers on the metropolitan fringe in California and other states struggled to pay taxes assessed on their properties' full cash value. Despite ongoing agriculture, county assessors considered the potential profitability of alternative uses.[15] Speculation about urban conversions increased tax assessments, and many small operators surrendered their land to developers, while large agribusinesses continued. Discontinuous development disrupted agricultural practices. George Abate, the Napa County assessor in the 1960s, warned that such conditions gave way to widespread suburban sprawl.[16] The California State Assembly responded to these issues in 1965 with the Land Conservation Act, or Williamson Act, which allowed farmers to remove property from the speculative market by signing contracts with county governments that restricted land use to agriculture for ten years. The county, in turn, assessed the land on its agricultural value rather than its speculative value. Both parties agreed that agriculture was the "highest and best use," if not the most profitable. In 1965, some 7.5 million acres of California's prime lands seemed threatened by urban sprawl. By 1969, twenty-three California counties placed two million acres of private property under the purview of this law.[17] Given the voluntary nature of the Williamson Act, the Napa County Board of Supervisors alternatively reached for a more permanent solution. In 1968, it rezoned 23,000 acres into an agricultural preserve — the first designated as such in the United States.

The road to the preserve was circuitous and contested. A movement to taper growth in Napa began in 1961 when the State Highway Commission proposed a freeway bypass that would cut through premium vineyards and the town of St. Helena. The Highway Commission informed residents that its construction depended upon the level of growth. If subdivisions filled Napa Valley, the state would build a highway to serve their needs. The agricultural extension agent reported that the freeway would undermine the wine industry, and a coalition of citizens formed the Upper Napa Valley Associates (UNVA) to stop it. For UNVA members, Santa Clara County was a harbinger of what might be lost. Other examples were closer to home. Hundreds of acres of prunes and vines on the northern edge of the City of Napa had already disappeared.[18] And in nearby Marin County, where planners similarly predicted rapid residential development in the upcoming decades, popular protests led by a diverse group of activists stopped a freeway to California's Point Reyes peninsula in 1966.[19]

The UVNA included an assortment of landowners, grape growers, vintners, conservationists, and wealthy San Franciscans with weekend homes in Napa. Having stopped the highway, they believed that winemaking was the key to future land preservation.[20] When developers tried to buy the historic ToKalon vineyard near Oakville, the UNVA concluded that the county needed new zoning, and its members began to work with the county's Planning Commission to conserve vineyards and preclude tract houses and highways. Historically in the United States the general-purpose local government reconciled the competing interests of the landowner, his neighbours, and developers. Local officials were never neutral arbitrators; they elevated certain land uses over others and directly influenced how individual property owners used resources. They assumed that the simple segregation of uses would push nonconforming activities away. American courts traditionally gave such officials great latitude.[21] The UNVA also worried that voluntary programs under the Williamson Act were inadequate. When profits from land sales were greater than penalties for premature exit, landowners broke their contracts.[22] Thus, the UNVA pushed for zoning changes that forced farmers to accept the law's protections. In response, the Napa County Planning Commission in 1967 and 1968 held hearings on an ordinance that increased the minimum lot size from one to twenty acres for building on unincorporated county lands on the valley floor, effectively eliminating large-scale tract-housing development. If approved, the new law would protect more than half of the county's vineyards in an agricultural preserve.

Acrimonious debates followed. Divisions were neither clear nor obvious. The wine industry was not a monolithic entity. Grape growers outnumbered vintners. Some produced wine, while others only sold grapes to wineries. Some operations were small and family owned; corporations controlled others. The bulk of the county population resided in the lower valley, where residents held only tangential ties to the wine industry. Vintners who supported zoning included Jack Davies, a newcomer who reopened the historic Schramsberg winery in the early 1960s, and Louis Martini and his son, who made wine in the valley since 1934. Davies and the Martinis hoped to preserve a rural way of life and a system of viticulture that was carving a niche in the premium market; they did not see themselves as leaders of an environmental movement. Other UNVA members saw the potential loss of open space and agricultural lands as an ecological disaster.[23]

Louis Stralla and John Daniel led the opposition. Stralla had operated vineyards for bulk wine production for thirty years. Daniel inherited the famed Inglenook estate from Gustave Niebaum, its founder and his great-uncle. He sold it in 1964 to United Vintners, a conglomerate that produced jug wines and cheapened the Inglenook name. As a board member of the St. Helena branch of the Bank of America that financed many wine ventures, Daniel remained influential. Worried about diminishing property values, Stralla and Daniel argued that the proposed zoning violated the takings clause in the Fifth Amendment to the US Constitution by allowing the county to effectively confiscate land without due process. Small landholders who hoped to sell to developers for profits they never enjoyed in agriculture, and others who wanted to subdivide holdings for their children, joined Stralla and Daniel. Some 2,000 property owners signed petitions opposing the preserve.[24]

Mel Varrelman, who was later elected to the Napa County Board of Supervisors, recalls the battle over the preserve as one of the "first classic property rights versus public responsibilities" issues in the United States.[25] While Napa's agricultural preserve offered a distinctive solution, the first of its kind, the proposed zoning and the revolt against the highways in Napa and Marin Counties were "part of a nationwide movement questioning prevailing assumptions about growth and development both within cities and outside of the urban core." These northern California efforts "signaled the rise of the growth-control movement, a new and powerful expression of localism and self-interest that shaped the future of suburban and rural areas."[26]

After months of debate, five Napa County supervisors voted unanimously for the zoning change. At this time, "the protection of agricultural land was in its infancy nationally."[27] Only two local governments had enacted limits on urban growth. When Napa supervisors locked 23,000 acres of contiguous, unincorporated county lands on the valley floor into agriculture, concluding that potential sales prices did not determine the true value of land, they believed "that they were the first locality in the United States to protect an agricultural area with strict zoning."[28] The preserve was both conservative and progressive. Looking at the more diverse cities of San Francisco and Oakland, some of the predominantly white Napans worried about the social elements involved in greater urbanization. Others disdained the consumerism represented in postwar suburbs. Claiming the traditions of American agrarianism, the board confirmed that agriculture was the highest use of land. If some proponents of the preserve did not consider themselves to be environmentalists, their efforts spoke to the future. This innovative zoning plan was an abrupt break from the primal elevation of individual property rights and a precursor to subsequent open-space laws elsewhere. Napa rejected the suburban American lifestyle but, over time, wine and its urbane culture provided the best chance to sustain the preserve. No crop other than the grape could do the same. Paradoxically, maintenance of the agricultural preserve depended on the success of Napa's wine industry and this success was directly tied to modern consumerism.[29] In the 1960s, as preservation efforts gained momentum, Napan vintners and agricultural advisors anticipated new opportunities for the wine industry, particularly given changing consumer tastes and product improvements, but few predicted the scope of the boom that lay ahead.

The Napa Valley Vintners Association argued that the county's superior climate and soils defined its niche in the premium wine market. They cast wine as a part of the good life and lured visitors from San Francisco and more distant locales. In 1966, Robert Mondavi opened the first large new winery in Napa Valley since the end of Prohibition. Ten years later, in a blind competition in Paris, French judges found two Napa wines from Chateau Montelena and Stag's Leap Wine Cellars superior. A correspondent for *Time* magazine spread news of the victory — a victory that suggested that Napa's premium wines merited inclusion with the world's best. A handful of wineries became nearly 300 by the new millennium.[30] Napa wines earned prestige and high prices. By 2000, wine grapes constituted 98 percent of the county's gross agricultural production and occupied more land than had been under cultivation in previous decades with diversified agriculture.[31]

In 1968, proponents of the agricultural preserve fretted about its fragility. It could disappear in thirty days if any three county supervisors voted for new zoning laws. Instead, supervisors and voters committed to protecting open space, vineyards, and the lifestyle they cultivated. Supervisors strengthened zoning by increasing the minimum lot size within the preserve. They extended the preserve to adjacent hillsides within the Napa River watershed, increasing it to 30,000 acres (see Figure 6.2). New ventures looked to these hills because acreage on the protected valley floor was rarely available.[32] Napa voters, the majority of whom lived in urban areas but cherished the valley's rurality, supported initiatives such as Measure A. Adopted in 1980, Measure A limited residential growth in unincorporated county areas to 1 percent of the population — a much lower rate than in the Bay Area. In Napa's five incorporated cities, council candidates ran on slow growth, pro-agriculture platforms; they rigorously guarded rural-urban limits.[33] With ever-increasing land values, the preserve contributed to housing shortages and longer commutes for workers. Nonetheless, county residents passed Measure P in 2008, locking the preserve until 2058 and including a policy that minimum lot sizes for designated lands cannot be changed without a popular vote.[34] Viticultural success had proved crucial to maintaining the preserve. Thus, although not explored within this history, climate change and its potential to undermine this success present the greatest current and future threat to Napa vineyards, exposing the hidden fragility of this seemingly robust agricultural preserve and the society it undergirds.[35]

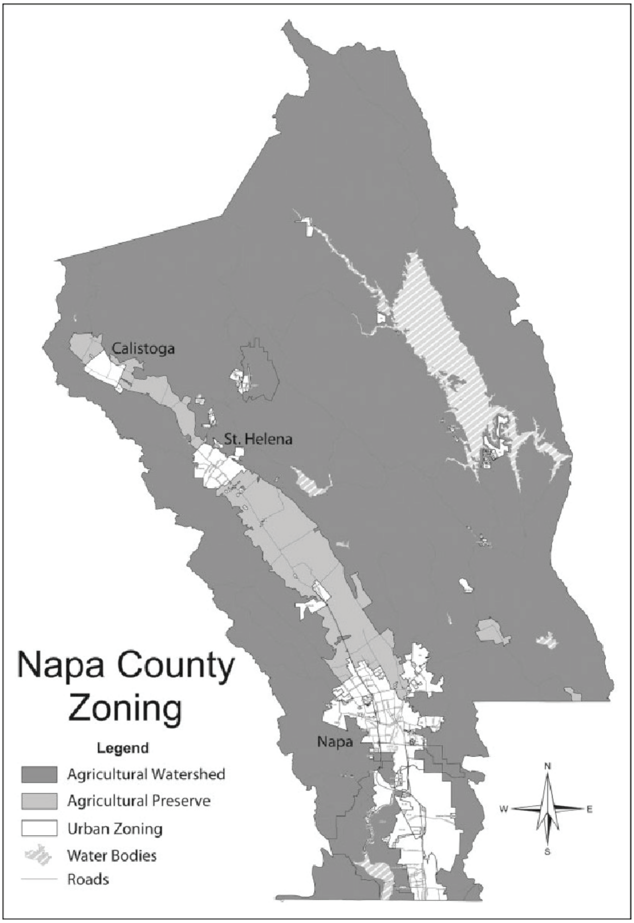

Figure 6.2. Napa County Zoning Map. Map by Ethan Daniels, reprinted here with permission from the *Journal of Planning History*.[36]

The Niagara Case

Situated in southern Ontario, the Niagara Peninsula is bound by Lake Ontario and Lake Erie on the north and the south, respectively, and by the Niagara River and the United States to the east (see Figure 6.3). "The backbone of the peninsula is the Niagara Escarpment, a cuesta (ridge) 30 to 50 metres high. This escarpment extends along the entire Niagara Peninsula, influences the soil and creates microclimates. North of the escarpment is a flat plain, the result of deposits of lacustrine clays, sands and gravel."[37] Located at the 43rd latitude, Niagara is a cool climate viticultural region. The area experiences unpredictable frosts in spring and autumn but enjoys abundant summer sunlight. "The lake (Ontario) effect on temperatures and unique airflow accentuated by the escarpment creates a unique microclimate that allows for the growing of Vitis vinifera."[38] Historically, lands below and on the escarpment have been home to grape and tender fruit production.[39]

The Niagara Peninsula is part of the Toronto area known as the Golden Horseshoe. Home to 7.9 million people and some 100 municipalities, the Golden Horseshoe is Canada's fastest growing urban region and the third fastest in North America. Provincial officials expect the

Figure 6.3. Map of the Niagara Peninsula. C. Tarling and Co., 1929. Source: Brock University Digital Collections, https://dr.library.brocku.ca/handle/10464/10534.

population to top 11.5 million by 2031. Policymakers have identified negative impacts from this sprawl such as pollution, gridlock, long commutes, and the loss of agricultural lands and greenspaces.[40] The Niagara Peninsula has long felt these reverberations. Given its proximity to Toronto, Niagara experienced greater demographic pressure than Napa County. Indeed, the St. Catharines-Niagara metropolitan area, which encompasses much of the peninsula, was Canada's tenth largest urban area by the early 1990s. Peninsular towns and cities also include Niagara-on-the-Lake, Grimsby, Thorold, and Welland.[41] Other conditions threatened agriculture. In 1992, geographer Hugh Gayler observed that agriculture "has encountered financial hardships over the years, resulting from small-scale land holdings, high urban-related taxes, labor difficulties, foreign competition, the vicissitudes of weather, changing consumer demands, the loss of the local canning industry, and a political and financial establishment that is perceived to offer little support." The Queen Elizabeth Way (QEW), which provided access to suburbanites and made the peninsula the primary transportation corridor between Canada and the United States, cut directly through the escarpment.[42] Some farmers saw the sale of their lands as the easiest solution to these hardships.

Many rural Canadian landowners believed that they had the right to do what they pleased with their land, often awaiting a "better" economic use, such as urbanization, which would bring a higher return on investment. Other residents and government officials expressed concerns over the potential loss of fruit lands as early as the 1950s. Geographer Ralph Krueger completed an exhaustive study of Niagara land-use patterns for the Ontario government. "By 1951, expanding cities began uprooting fruit crops at a faster rate than they were being replaced elsewhere. Thus, since 1951 it can be said that urban expansion has been occurring at the expense of fruit growing."[43] Krueger added that unchecked urban sprawl would diminish most of the Niagara Fruit Belt in the coming decades, but he doubted that local municipalities possessed the desire or means to act. "In order to be effective, any direction of urban growth would have to be on a regional basis," Krueger contended.[44]

Urban sprawl, the loss of valuable agricultural land, and the perception that a 1946 Ontario Planning Act robbed rural areas of autonomy and tax dollars hastened the push for structural changes in local government. The Regional Municipality of Niagara came into being on January 1, 1970. It took over services for health, welfare, water, sewage, and 600 miles of roads. The twelve consolidated municipalities, a second tier of government, carried out other functions. The regional government also focused on developing a Regional Plan and making twelve local plans conform to it, partly to protect agriculture. However, some residents questioned whether there should be any government intervention to sustain the peninsula's fruit industry.[45]

Resistance from local governments and landowners to setting urban-rural boundaries delayed the Niagara Regional Plan until 1981. As historian Greg Hise observes with respect to regional planning generally, elected officials often were "captive to parochial interests." While ecologists might focus on an ecosystem that pays little attention to geographical boundaries, local politicians cannot ignore them. Regional governments, like the one in Niagara, provide services and infrastructure for power, water, waste, and transportation, but struggle to assert control over planned economic development.[46] The Niagara Regional Plan that emerged in 1981 tried to restrict uses on the land with the greatest agricultural potential but it was a disconnected amalgam of local initiatives. Complicating this process were two facts that distinguish Niagara from Napa. The agricultural land in Niagara was more discontinuous, separated by the twelve municipalities and more diverse economic activities. Second, the Regional Municipality of Niagara, unlike Napa County, controlled few unincorporated lands. There was little to stop cities from taking actions that undermined the Regional Plan and nothing to preclude a farmer from selling, in whole or in part, to a non-farmer. Thus, since World War II, including the thirty years of the Regional Plan, a third of the Niagara grape and tender fruit lands were lost.[47]

In 1976, concerned about the loss of farmland and open space, activists formed a new organization called the Preservation of Agricultural Lands Society (PALS). Dominated by urban residents and university professors, PALS reflected a growing environmental movement and romantic visions that often belied the realities of farming. It emphasized the role of farmers as stewards of the land first and economic actors second.[48] PALS opposed any provincial, regional, or municipal effort, no matter how minor, to convert rural lands or to extend urban infrastructure or services beyond municipal borders.[49] Many initiatives, particularly those involving the expansion of urban boundaries failed, for which PALS often tenuously claimed success. With its efforts to permanently preserve farmlands and limit landowners' rights, the organization became unpopular with some agricultural producers. In February 1991, more than 150 farmers attended a PALS meeting, demanding memberships in an unsuccessful attempt to overthrow the organization's board.[50] Officials never seriously considered PALS's most radical proposition — the use of conservation easements to limit growth.

Around this time, the US-Canada Free Trade Agreement (1988) and the North American Free Trade Agreement (NAFTA; 1994) further undermined Niagara tender fruit and grape growers. Canada's farmers long complained about unfair competition from imported fruits, arguing that other nations subsidized agriculture while the Canadian and Ontario governments failed to provide even marketing assistance.[51] These agreements exacerbated those problems, while the potential sale of their farm land to developers offered a quick fix.[52] Local farmers who hoped to stay in agriculture concluded that long-term solutions lay in a new approach to viticulture. Vineyards were part of Niagara agriculture for more than a century. Before the 1970s, production was limited to hybrids or indigenous grape varieties such as *vitis labrusca*. When fortified, some grapes "made somewhat palatable products; the table wines, however, were most unpleasant." The industry processed other grapes for juices, jams, and jellies.[53] In the 1970s, experiments with new clones and rootstocks allowed vineyardists to develop more distinguished European varieties associated with fine wines. Ziraldo and Karl Kaiser opened Inniskillin winery in 1975 and remained at the forefront of a movement to produce premium varietal wines from grapes grown in the Niagara Peninsula.[54]

Despite such efforts, and even as Canadian consumers' preferences shifted toward dry table wines, many growers continued with *labrusca* varieties and hybrids until competition from better-tasting imports, fostered by international agreements, eventually forced industry-wide changes. By the early 1990s, the *labrusca* growers surrendered. The vineyardists "who remained in business were the quality-conscious producers who increasingly grow the international noble grape varieties."[55] The tonnage of *vinifera* varieties demanded by wineries and consumers more than doubled by 1999; the value of farmland also rose. While it was a small sector of Canadian agriculture generally, grape processing contributed thirteen million Canadian dollars in direct wages and salaries and thirty million dollars to Ontario's economy by the year 2000. Viticulture became a source of pride for Ontario.[56] Ziraldo and others continued to emphasize: "The upper 20 per cent of the market because that's where the growth potential and international market are."[57]

Niagara vintners looked to the Napa Valley as a model with respect to production and, later, land-use controls. Niagara's viticultural region, some 48 kilometres (29 miles) in length and 1 to 10 kilometres (0.62-6.2 miles) in width, shares similar dimensions. Niagara is almost as far south as California's northern border with Oregon, although its climate is cooler and more humid than Napa's. Both regions offer easy access from major metropolitan areas and abundant tourist activities. Napa viticulture found its greatest success in the premium market.[58] Niagara entered a larger premium wine market in the 1990s with greater and more diverse global competition. An appellation system implemented in 1988 aided Niagara's participation in the premium market. The Vintners Quality Alliance (VQA), a legislated wine authority, sets high standards for production of its finest wines. VQA wines with Ontario labels must use only grapes from Ontario and obtain approval from a provincial tasting panel. The VQA allows consumers to identify Canadian wines based on the origin of grapes. Oz Clarke observes, "In marginal climates, like Canada's, where the classic grape varieties will only ripen in the best mesoclimates, a proactive scheme like the VQA, which lays down guidelines on geographical designations, minimum ripeness levels and grape types, makes sense."[59] Linda Bramble, a historian and certified sommelier, notes that the Ontario wine industry started from "a deficit position in respect of consumer acceptance. Not many jurisdictions had to overcome that stigma. The industry had to convince consumers that it had gone through a complete transformation." Moreover, Canadian winemakers do not play on a "level field" due to the government's control of the domestic market. A vestige of the days of temperance, the Liquor Control Board of Ontario handled all alcoholic beverage sales since 1927 with few exceptions such as direct purchases at wineries.[60] As the quality of VQA wines improved, their reputation in the global market slowly grew. Major wine atlases included Canada, although often with only one or two pages in volumes that dedicated whole chapters to other countries or regions.[61] VQA wine sales increased from the early 1990s, but Niagara wineries still used imported grapes to produce non-VQA wines. By 2010, one third of Ontario's wine production used grapes from outside the region. Known in Canada as "cellared wines," these products lacked the VQA's imprimatur and undermined Niagara's reputation.[62]

Viticultural proponents believed that Niagara could grow the same number of grapes that wineries gathered from outside the region because there were remaining acres in the peninsula suitable to *V. Vinifera* production. Many remained in tender fruit production. The tender fruit industry gradually adapted to NAFTA competition, albeit at a slower pace than viticulture.[63] Other suitable lands were among those threatened by urbanization. The northern part of the Niagara Peninsula, between the escarpment and Lake Ontario, is "one of only two small areas in Canada . . . where it is possible to have sizeable, commercial, tender-fruit and grape and wine industries."[64] With local and regional planning failures, agricultural proponents turned for protection to the provincial government, which constitutionally has full autonomy over land-use planning.[65]

In 1990, the Ontario government enacted the Niagara Escarpment Planning and Development Act. The law included among its goals the maintenance and enhancement of open spaces compatible with farming.[66] Ziraldo, other vintners, and environmentalists found the law insufficient because it did not place a moratorium on all development on prime agricultural lands and government implementation was inadequate. Drawing inspiration in part from the Napa Agricultural Preserve, they favoured a law that enshrined agriculture as the highest use of land. Niagara, "the heart of the Canadian wine industry," was in danger.[67] While 50 percent of the Niagara land base remained in farms in 2003 and there was a strong network of services tied to agriculture, a Regional Niagara Agricultural Task Force Discussion Paper identified disturbing trends. In addition to increased foreign competition and vulnerabilities from the Canadian dollar's increased value, the percentage of rental farmland increased, suggesting a reluctance or inability of farmers to make capital investments.[68] There also were some 2,500 land severances between 1992 and 2002; most were resold for housing or industry. The Fruit Producers Marketing Board argued that the severances were necessary. "Economies of scale have forced growers to consolidate by purchasing neighbouring farms. The only way they have been able to do so is by selling off surplus dwellings. If farmers weren't allowed to do so, they couldn't afford to buy the property and therefore, it is likely that the property would end up out of agriculture entirely."[69] On other fronts, the QEW highway was due to be widened.[70]

Ziraldo referred to these developments as death by "a thousand cuts"[71] for agriculture. Despite various reports, such as *Niagara — A Special Place Today and . . . Tomorrow?* by the Regional Niagara Planning and Development Department in February 2000, there was little hope for reform at the local or regional level.[72] Some officials, including James Bradley, who represented St. Catharines in the Ontario legislature, found in Napa's agricultural preserve a model for permanently controlling growth.[73] Reformers lobbied the provincial government to provide similar protection, observing that it helped make Napa land more valuable.[74] In December 2003, a Liberal provincial government proposed legislation to create a greenbelt to contain growth in the Golden Horseshoe. The bill indicated lands restrictively zoned for agricultural and environmental purposes. The proposed Golden Horseshoe Greenbelt covered a much larger swath of land than the Napa preserve, captured a larger and more economically diverse population, and involved nearly 100 different municipalities. With respect to the Niagara Peninsula, elements of the Napa Agricultural Preserve were present. The Ontario law provided a ten-year "freeze" on protected countryside around the escarpment and banned all retirement severances, effectively prohibiting landowners from using loopholes that undermined earlier efforts.[75]

Other Niagara residents resisted the proposed law. As in Napa, battle lines were murky. Opponents included developers, municipalities, and some farmers. They grounded their objections in similar property rights arguments. Tender fruit growers had not enjoyed the same financial success as viticulturalists nor received the same government support for surplus crops, particularly after the canning factories left the peninsula. Land was their only fungible asset, and they wanted the right to sell or develop it as they saw fit.[76] Proponents of the law espoused the same conservative values that some Napans expressed. They longed for supposedly simpler days and assumed that agriculture and its rural lifestyle made people better citizens. The diversity of economic activity in the Peninsula, including substantial industry in the city of St. Catharines, left residents less concerned about the social evils of consumerism than their Napa counterparts had once been, but filled with different worries about the environmental costs of modern society. The designation of the Niagara Escarpment as a unique global biosphere by UNESCO in 1991 strengthened the ecosystem rationale for land preservation.[77] The growth of environmental activism over four decades left many reformers with an ethos that called for open space, outdoor recreation, and resource protection. In the end, environmental protection and agricultural preservation won. The Greenbelt Act became law in June 2005.

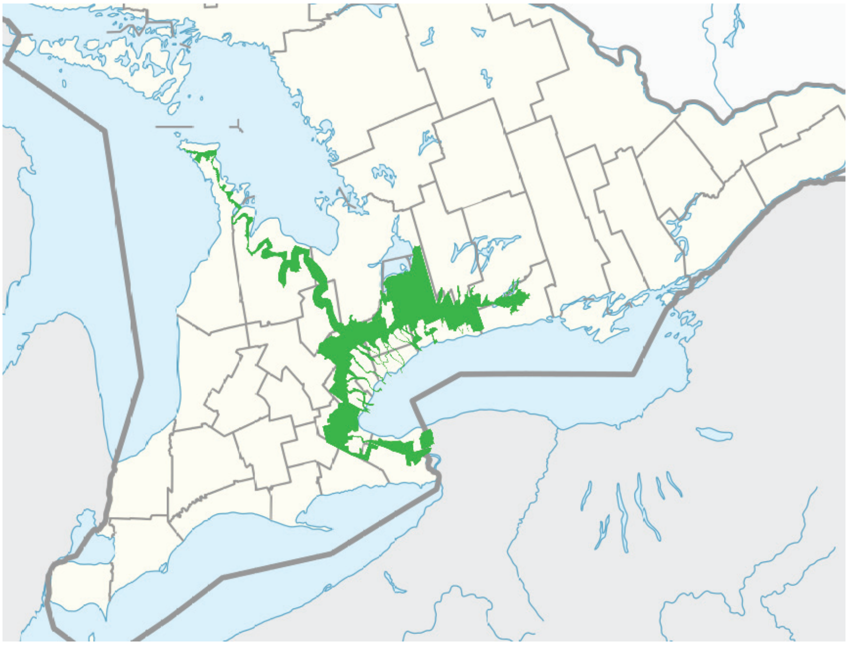

Figure 6.4. Ontario Greenbelt. Source: "Ontario Greenbelt," Wikimedia Commons.[78]

The greenbelt, which includes much more than the Niagara winescapes, is the cornerstone of Golden Horseshoe *Greenbelt Plan* adopted in 2006 and updated in 2017 and 2020. The plan attempts to accommodate future growth while protecting, among other things, agricultural systems providing "a continuous, productive and permanent agricultural land base and a complementary *agri-food network* that together enable the agri-food sector to thrive." This land base includes specialty crop areas such as the Niagara Peninsula Tender Fruit and Grape Area, although tender fruits increasingly give way to wine grapes. Expressing a more holistic understanding of the environment, "agricultural systems" are delineated through land evaluation area review (LEAR) to assess soils, climate, productivity, and land fragmentation as well as assessments of other plans and supportive infrastructure. The plan prohibits the redesignation of land to non-agricultural use, limits nonconforming activities, and prohibits towns from expanding into protected areas.[79] In its first fifteen years, its proponents contend, the greenbelt limited pollution, nurtured local foods, and expanded recreation. "Its permanent protection is essential for climate resilient communities and a thriving local economy." The greenbelt protects 750,000 acres of farmland, including peninsular vineyards, which earn 68 percent more revenue than the average Ontario farm, suggesting that such protective measures tend to stave off urban sprawl when lucrative specialty crops like wine grapes are involved.[80]

Conclusion

The Napa Agricultural Preserve, the Ontario Greenbelt, and their agricultural protections represented departures from pro-development land-use controls. Complex motives drove the growth-control movement, which found receptive audiences in both Napa and Niagara because of the damaging effects of sprawl, romantic notions of rural life, and, most importantly, the potential profitability of viticulture. This movement, however, needed government intervention to protect prime agricultural lands. Given the speculative value of these lands, viticulture in both regions faced challenges. Agricultural preservation in Napa and Niagara revealed that mixtures of governmental authority were necessary to protect disappearing farms. The motives behind the Niagara and Napa efforts are similar, combining in different measures nostalgia, viticultural profitability, and, over time, a more progressive environmentalism. While influenced by California's Williamson Act, the Napa agricultural preserve is a creature of local law. Voter initiatives gave it permanence. After unsuccessful attempts at the local and regional level, by contrast, the Ontario government created the Ontario Greenbelt. Whether it achieves the decades-long success of the Napa Agricultural Preserve probably depends on viticultural success. In the end, however, the preserve and the greenbelt remain fragile creatures, subject to amendment or reversal by new government officials, the loss of voter support, or shifting climatic trends that may diminish the economic value of their crops.

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