APPLES ABOUND:

FARMERS, ORCHARDS, AND THE CULTURAL LANDSCAPES OF

AGRARIAN REFORM, 1820-1860

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APPLES ABOUND:
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AGRARIAN REFORM, 1820-1860

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ABSTRACT

This dissertation argues that apple cultivation was invariably intertwined with, and shaped by, the seemingly discordant threads of scientific agricultural specialization, emigration, urbanization, sectionalism, moral reform, and regional identity in New England and Ohio prior to the American Civil War. As the temperance cause gained momentum during the 1820s many farmers abandoned their cider trees and transitioned to the cultivation of grafted winter apples in New England. In turn agricultural writers used the social and moral rhetoric of antebellum reformers to compel individuals to become better apple growers, citizens, and farmers. Transitions in apple cultivation similarly created new negotiations between farmers, labor, and the land. This study offers new insight into the social and ecological boundaries of agricultural specialization and the often tempestuous interactions between progressive agriculturists and yeomen farmers as they tentatively embraced the elusive promise of scientific agriculture and market capitalism by abandoning the cider press for the cultivation of grafted winter apples like the Rhode Island Greening, Baldwin, and Roxbury Russet between 1820 and 1860.
DEDICATION

For Martha and Matilda
I owe many people my personal thanks for the completion of this work. The staff and collections of a number of universities and historical societies proved instrumental in shaping this work and I am indebted particularly to the librarians and assistants of the University of Rochester and the New Hampshire Historical Society. I would also like to thank John Ball at the Bierce Library of the University of Akron for his willing help in tracking down material from across Ohio and New England.

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CHAPTER I

INTRODUCTION: “APPLES ABOUND”

Peter Chardon Brooks gathered winter apples from the orchard, mowing, and pasture lots of his Medford, Massachusetts estate as delegates for the second state pomology convention in the Union convened in Columbus, Ohio in the fall of 1847. A Boston merchant, cider maker, orchardist, and progressive agriculturists since 1808, Brooks experienced the significant changes in antebellum apple culture among New England farmers culminating with the state pomology conventions in Maine and Ohio in 1847. In 1847, however, Brooks’ grafted apple orchards differed markedly from those of many of his yeomen neighbors as apple culture collapsed across large sections of New England despite the best endeavors of progressive agriculturists who championed orchard improvement and despite the long history of apple growing among the communities of the North Atlantic. *Apples Abound: Farmers, Orchards, and the Cultural Landscapes of Agricultural Reform, 1820-1860* explores how apple culture was invariably intertwined with, and shaped by, the seemingly discordant threads of scientific agricultural specialization, emigration, urbanization, sectionalism, moral reform, and regional identity in New England and Ohio prior to the War for the Union. In turn this study offers new insight into the social and ecological boundaries of agricultural specialization and the
often tempestuous interactions between progressive agriculturists and yeomen farmers as they tentatively embraced the elusive promise of scientific agriculture and market capitalism by abandoning the cider press for the cultivation of grafted winter apples like the Rhode Island Greening, Baldwin, and Roxbury Russet between 1824 and 1847. ii

Progressive agriculturists like Peter Chardon Brooks believed for good reason that apple culture might prove one of the profitable agricultural transitions of antebellum New England. Only three decades earlier Timothy Dwight wrote of the ubiquitous nature of native seedling cider trees that “Apples abound more in New England, it is believed, than in any other country.” iii By 1830, however, cider had fallen from favor and progressive agriculturists implored New England farmers to replace their native seedling cider trees with new grafted winter varieties for extra-local exchange with the burgeoning urban markets of Massachusetts, Connecticut, and Rhode Island. Wool growing and dairying provided welcome agricultural transitions relatively sheltered from the influx of Midwestern agricultural produce and agricultural journalists and horticulturists confidently predicted that marketing grafted winter apples would provide similar advantages for local New England growers.

Regardless of the promise of agricultural revitalization a new generation of grafted orchards represented it appeared to progressive agriculturists that many New England farmers resisted specialization in apple culture. Progressive agriculturists thought small farmers to be recalcitrant in their attitudes toward scientific agriculture while yeomen orchardists thought progressive agriculturists to be “book farmers” with little understanding of the social and ecological boundaries shaping the agrarian pursuits.
of most New England farmers. As farmers transitioned from cider to winter apple production from 1820 to 1850 increasingly fewer yeomen orchardists could reconcile the promise of potential long-term profit with near-term tensions such as increased labor obligations, the mastery of new technologies like grafting, trimming, sorting, packing, or shipping, while investing capital and labor into new orchards that would not return a profit for eight to ten years, if ever. In thirty years apple culture transitioned from a ubiquitous, ecologically viable, and labor efficient endeavor to one of the most demanding, labor intensive, ecologically fickle, and expensive activities New England farmers could pursue. Despite such formidable obstacles New England farmers produced the most value from their orchards per farm in the country by 1860. However, apple culture had nearly collapsed across large swaths of the region and in many more neighborhoods fewer growers produced apples.

As New England orchardists transitioned from cider making to winter apple cultivation prior to 1860 the rhetoric of apple culture became infused with sweeping demographic and social change. Temperance reformers called for the destruction of cider orchards as a path to improving the moral constitution of rural communities in the 1820s and 1830s. In turn progressive agriculturists thought well-kept grafted orchards were reflections of good farmers and articulated a similar rhetoric of civic responsibility and reciprocity as they extolled good apple culture for all farmers. They thought old cider trees and neglected apple orchards spoke to a declining agricultural New England where old farmers shunned new scientific agricultural practices and their sons left for the Midwest or joined the mechanic or wage laboring classes of the burgeoning urban centers.
of southern New England. Still others thought the biologically unique traits of many local New England apple varieties and the longevity of the New England cider tree might help foment regional identity and a collective sense of the past as New England became increasingly marginalized culturally and politically in the 1830s and 1840s. The contested nature of the larger agricultural and social meanings of the native cider tree and grafted apple orchard provides fertile ground for exploring agricultural and cultural change in rural New England prior to the War for the Union.

Despite the insight such a ubiquitous antebellum endeavor as apple culture provides in exploring transitions during the first five decades of the nineteenth century few scholars have examined orchards in an agricultural context and fewer still as biological referents offering insight into the cultural anxieties of the farmers, orchardists, and progressive agriculturists cultivating them. Of the agricultural histories that examine northern agriculture prior to the Civil War comparatively little has been devoted to horticulture in general, and even less to apple cultivation specifically. Only Ulysses Hedrick’s *A History of Horticulture in America to 1860*, deals in any real depth with the history of apple growing. Hedrick’s history is narrative in nature, and simply recounts the origin and spread of all manner of fruit culture across the Union prior to the American Civil War. Of the many state agricultural histories, Clarence Day’s surprisingly comprehensive overview of nearly two centuries of rural toil, *A History of Maine Agriculture, 1604-1864*, presents the most formative history of apple growing in any one state in the nineteenth century. Other works, most noticeably Robert Jones’ *History of Agriculture in Ohio to 1880*, Hedrick’s *A History of Agriculture in the State of New York*,
and most recently, Howard Russell’s agricultural history of New England, *A Long Deep Furrow*, provide some attention to apple cultivation in Ohio, New York, and New England in a narrative context. All of these studies offer only brief discussions of apple cultivation and emphasize economic catalysts for rural agricultural trends in specialization. iv

The finest studies of the history of apple cultivation in the northeastern states of the Union were not written by historians but by a number of agricultural scientists and pomologists working for state universities or agricultural experiment stations at Ithaca, New York, Geneva, New York, Orono, Maine, and Wooster, Ohio during the first decades of the twentieth century. Works like S.A. Beach’s famous *Apples of New York* and W.J. Green’s *Varieties of Apples in Ohio* were published to help early twentieth century orchardists identify and find the best market varieties for their farms, however, they incidentally left colorful and extensive histories of regional vernacular synonyms and in many cases, the historic origins of thousands of nineteenth century apple varieties. These men recorded much of the history of the development of early-mid nineteenth-century apple culture absent its historic context. This work builds upon the foundations of traditional historical agricultural narratives and the utilitarian works of early twentieth century agricultural scientists while looking toward the methodologies of the “new agricultural history” as well. v

In doing so, it fits comfortably with scholarship examining the culture resonance of agricultural specialization upon regional communities. John Moore’s study *Agriculture in Ante-Bellum Mississippi*, for example, elucidated how cotton culture defined
antebellum Mississippi within the social and ecological boundaries of that state. T.H. Breen focused on the inherent tensions and cultural values planters placed upon tobacco and wheat growing and how they shaped agrarian protest in *Tobacco Culture: The Mentality of the Great Tidewater Planters on the Eve of Revolution*. Michael Tomlan’s work, *Tinged With Gold: Hop Culture in the United States*, explored how hops culture left an indelible imprint upon the American landscape through culture and vernacular architecture from Maine to Oregon and, more recently, Tammy Horn’s study, *Bees in America: How the Honey Bee Shaped a Nation*, presented a comprehensive narrative of the history of beekeeping in America that revealed how the apiarian craft shaped popular perceptions of thrift, industry, and communal reciprocity during the antebellum period. Sally McMurry’s work *Transforming Rural Life* used dairy culture in the northeastern states of the Union to explore cultural and agricultural changes from 1820 to 1880. Apple trees offer as important an agricultural means of exploring period perceptions of agricultural and cultural change in antebellum New England as any study of cotton or tobacco in the slaveholding South or hops, dairying, or beekeeping in the North.

Apple culture offers a new and important view into agricultural and social transitions among antebellum New England farmers precisely because apple trees were such a historic and ubiquitous component of New England landscapes. Apple trees were not native to the Americas and transporting young trees across the North Atlantic was too difficult during the first half of the seventieth century. Plymouth colonists brought seeds of English varieties to southern New England and from these seedling orchards American apple culture was eventually carried into the Ohio River Valley by New England
emigrants nearly one hundred and fifty years later. These seedling orchards produced such famous early American varieties as the Westfield Seek-no-further, Roxbury Russet, Rhode Island Greening, Danvers Winter Sweet, and Hubbardston Nonesuch. Apples like these were among the first market or winter apple varieties in America and were grown by relatively small numbers of farmers in communities neighboring burgeoning colonial market towns of Boston, Providence, Hartford, New Haven, Salem, and Ipswich.

The vast majority of New England orchards, however, remained of seedling kinds planted for use in making hard cider. Early farmers in Plymouth, Massachusetts, Rhode Island, and New Haven quickly came against the boundaries of labor and environment inhibiting beer production in the colonies of the North Atlantic. Hard cider required less labor and apple trees proved well acclimated to the stony soils of New England. By 1700 hard cider emerged as the beverage of New England and the hardiness and biological diversity inherent in seedling apple trees allowed apple culture to spread quickly into even the most inhospitable climates of northern New England by the first decade of the nineteenth century. Ironically the transitions away from cider production after the third decade of the nineteenth century effaced much of the ecological and labor saving advantages of cider making. By 1860 fewer New England farmers produced apples for local or extra-local exchange while the northern limit of reliable apple cultivation actually retreated south across much of northern Vermont and Coos County, New Hampshire.

How progressive agriculturists transformed apple culture from a ubiquitous labor saving ecological viable agricultural pursuit practiced across all of New England to a market specialization that only a fortunate few could pursue across much of the same region
provides a focal point for this study and contributes significantly to why apple culture provides such an excellent medium for elucidating antebellum agricultural and cultural transitions.

The apple tree’s longevity and capacity for biological diversity is precisely what makes it so well suited to act as an agricultural prism for examining rural transformation. All cultivated plants on a nineteenth century farm changed genetically between generations, yet in winter wheat, barley, hops, corn, and other cereals this change was usually imperceptible to the cultivator. In apples, pears, grapes, and other fruits there is a genetic predisposition for much more exciting expressions of biological chaos. The seed of an Esopus Spitzenburg will seldom reproduce an Esopus Spitzenburg nor will the seed of a Roxbury Russet, Stark Sweeting, Sheepnose, Fall Wine, Marietta Pippin or any other variety recreate the identical traits of their parent. Apple trees are capable of limitless diversity, every seed of every apple of every tree creating biologically unique offspring. Farmers quickly discovered the only reliable way to reproduce a Westfield-Seek-no-Further, Pumpkin Sweeting, Chenango, Chimney Apple, June-Eating, or any other named variety was to take a graft or scion from an existing tree of the same variety. In cultivating apples and maintaining orchards, there was no more stringent form of careful and premeditated biological control which could engage the attention of the nineteenth-century farmer.

It is no accident that this work focuses on New England and the places where New Englanders came to settle in the Ohio country. Apples, like people, migrate as well, and carry with them tangible social, as well as biological, connections with the
communities from which they originated. Apples trees are carriers of both local and tacit knowledge, memory and tradition. They form part of an ecological fabric that ties communities in Connecticut and Massachusetts with those of the Western Reserve or Ohio Company lands of Ohio. Apple cultivation helped fashion the same bounds that were more traditionally created politically, religiously, culturally, and cartographically. Apples are biological markers of community heritage in the same way that place names and village greens connect people in Ohio and New York with villages of their New England ancestors. One can follow the transient wanderings of many land-starved rural New Englanders to the Western Reserve or the Ohio River Valley by tracing the changing histories of apple varieties or by examining old orchards early settlers left behind.

Apple trees were also formative biological markers of the cultural landscapes of antebellum New England. Kent Ryden’s monograph Mapping the Invisible Landscape recounted how landscapes along the Rhode Island border and Coeur d’Alene mining region of Idaho created local linguistic or cultural cartographic boundaries much in the same way that this study contends that local apple varieties became identifiable biological markers of vernacular landscapes among communities in New England and on the Ohio frontier. Judith Richardson’s study, Possessions: The History and Uses of Haunting in the Hudson Valley, also played an important role in the development of this study. Richardson argues that ghosts and apparitions of the Hudson Valley were merely constituent parts of the cultural landscapes of Upstate New York, and that they act as metaphors for the rapid social and ecological change which came to the area during the
nineteenth and early twentieth centuries. Cider trees and grafted winter apples, absent their more comfortable agricultural context, operate in the cultural sphere much the same way. They convey a number of sometimes contradictory meanings to any number of people, and their condition and cultivation often speak to rapid and unrelenting regional agricultural transitions. William Wyckoff’s study *The Developer’s Frontier: The Making of the Western New York Landscape* suggests that the way in which the young American republic organized space left perceptible imprints on both physical and cultural landscapes nearly two centuries later. Apple trees, with their eighty year life cycles, left similar biological imprints on the rolling landscapes of New England and imbued them with a cultural resonance which moral reformers and progressive agriculturists expropriated for their own use between 1824 and 1860.

A number of recent studies have demonstrated the inherent validity of using communities’ interactions with trees as a means of cultural exploration as well. Gayle Samuels’ monograph, *Enduring Roots*, exposed the value of using trees to explore local cultural themes. Thomas Campanella’s study, *Republic of Shade*, demonstrated that trees, specifically the American elm, provided an excellent means of illuminating cultural changes and reshaping the public memory of the American Revolution in the 1830s and 1840s. Tamara Thornton’s study, *Cultivating Gentlemen*, explicitly connected the cultivation of pear trees with the formation of elite cultural identity among Boston’s wealthy families prior to the War for the Union. This study finds that it was not the common American elm or the finicky pear but the apple orchard where nineteenth century communities discovered trees most capable of shaping regional identity. For New
England agriculturalists the cultural values associated with labor (for apple trees are not only aesthetic but they produce as well) made them especially well suited to reflect changing social norms and ideals. ix

This study offers new insights into the traditional historiography of both the agricultural and cultural history of antebellum New England. As an agricultural history it offers fresh perspectives into agricultural transitions sweeping across much of New England neighboring regions between 1824 and 1860. Early historical narratives of this period such as Harold Wilson’s study, *The Hill Country of Northern New England*, stressed such factors as emigration and rural decline for agricultural shifts during the antebellum period while, more recently, scholarship of Daniel Vickers, Christopher Clark, and J. Ritchie Garrison have emphasized antebellum agricultural specialization in the context of regional shifts away from subsistence plus production and rural reorientations toward extra-local urban markets. x Hall Barron reshaped the debate over the meaning of rural emigration in northern New England concluding that finite labor resources predicated the timing and degree of shifts from wool to dairying in his study, *Those Who Stayed Behind*.

Although focusing on the antebellum period, it is the tensions among New England farmers between the intensive labor obligations necessary for apple production locally rather than the more national sectional tensions between free labor and slave labor during the same period that proved to be most important. Thus the perspective of this research is rooted in local labor negotiations in the midst of agricultural transition in settled communities of antebellum New England and the Hudson Valley of New York.
Martin Bruegel’s extensive work on the Hudson Valley during the antebellum period, for example, was built upon the earlier, more traditional, agricultural narrative of David Ellis’ monograph, *Landlords and Farmers in the Hudson-Mohawk Region, 1790-1850*, and revealed dynamic social, household, extra-local, and ecological forces that shaped agricultural specialization and early participation in market capitalism. Combining the varied social, agricultural, economic, and ecological factors encountered by these scholars of agricultural change in New England and the Hudson Valley, the following chapters explore how they shaped local decisions to embrace apple culture as a specialization and correspondingly improve their orchards. The themes explored in this work in turn reveal how agricultural and cultural forces conspired to create new agricultural specializations in places like Essex County, Massachusetts, the Champlain Valley of Vermont, or the Ohio River Valley of Ohio.\(^{\text{xii}}\)

Another important contribution offered here is new insight into environmental change in antebellum New England. William Cronon’s study, *Changes in the Land*, elucidated environmental changes brought about by colonial New England farming and how colonial farmers exploited the bounty of natural resources the North Atlantic world provided. Brian Donahue’s extensive study of farming in colonial Concord Massachusetts, *The Great Meadow*, countered Cronan’s perceptions of the exploitive nature of colonial agriculture concluding that colonial farmers mastered a system of farming in balance with the ecological boundaries of their environment. Thus, apple culture becomes a means to expound upon the ecological and human tensions of what Caroline Merchant described as “the capitalist ecological revolution” between 1775 and
1865 in her study, *Ecological Revolutions*, while simultaneously supporting Donahue’s conclusions by contending that the dispersed native seedling cider trees that covered New England farms prior to 1830 were in harmony with the ecological boundaries of the region while the new orchards of market specialization of the antebellum period had detrimental ecological consequences.\textsuperscript{xii}

Apple culture was also affected by the social climate, and this work offers new perspectives into social and cultural tensions in antebellum New England. Traditional studies of agricultural reform in the nineteenth century such as Albert Demaree’s formative work, *The American Agricultural Press, 18199 – 1860*, have focused on the history of the agricultural press. Even with the emergence of the “new agricultural history” during the past thirty years, new studies of agricultural reform movements like Hall Baron’s *Mixed Harvest* or John Fry’s monograph *The Farm Press, Reform, and Rural Change, 1895 -1920* have focused on late nineteenth-century ideals of progress and reform rather than the more dynamic currents of reform, religious fervor, and progressive ideals of the antebellum period. Other scholarly works like P. Jeffry Potash’s study of Addison County, *Vermont’s Burned Over District*, examined the transformations of village life following the Second Great Awakening by studying local agricultural and ecological patterns, yet few scholars attempt to make more substantive connections between the reform movements emanating from the Second Great Awakening and the rhetoric of agricultural reform during the antebellum period.\textsuperscript{xiii}

By examining these issues, this research seeks to draw broad parallels between agricultural improvement and other social reform movements of the antebellum period by
exploring how the intersections of agriculture and social reform movements shaped the mentality of farmers, orchardists, and progressive agriculturists between 1820 and 1860. In 1824 the first of a number of temperance societies decrying the production and use of hard cider organized in Connecticut and similar institutions sprang up the northern states of the Union from New England to the Ohio River Valley. Twenty-three years later in 1847, the Maine Pomology Convention, the first of a number of similar rural societies, organized for the purpose of evaluating and regulating the new grafted winter apples that emerged after hard cider went out of fashion in part from regional pressure from temperance advocates decades earlier. This study finds that while the temperance crusade cannot be held accountable for some of the more dramatic claims of orchard destruction described by the agricultural and religious press, temperance reformers hastened the transition from cider to winter apple production just as the issue of incorporating hard cider into temperance pledges invariably fractured temperance societies. More significantly, this work concludes that progressive agriculturists were cognizant of the power of progressive antebellum social movements like temperance or education reform and willingly usurped similar rhetoric espousing such egalitarian themes as reciprocity and moral integrity to compel farmers to engage in more difficult agricultural specializations like setting and maintaining apple orchards of grafted winter fruit.

Similarly, this also offers insight into how New Englanders spoke of apple cultivation along sectional lines in the 1840s and 1850s. Throughout the first decades of the nineteenth century agricultural reformers in New England and the plantation South shared many common interests. Southern agricultural reformers like Edmund Ruffin dealt
with the ecological consequences of exploitative cash crop agriculture while New England agricultural reformers sought new ways to improve yields from soils that could not hope to compete with newly cleared Midwestern farms. Reformers North and South both seized upon soil improvement as a means to increase yields, however, Southern leaders looked to diversification of crops while New England leaders sought specialization in fewer agricultural practices. By the antebellum period progressive agriculturists both North and South were looking for ways to improve ailing soils and shape the agricultural endeavors of yeomen farmers in increasingly divergent ways.\textsuperscript{xiv}

During the 1850s antebellum apple culture in New England increasingly came to reflect the sectional divisions of agricultural reform. New England agricultural reformers constituted a small cadre of intellectuals who targeted yeomen farmers while Southern agricultural reformers were a small cadre of intellectuals who targeted instead another group of elites: the plantation aristocracy. Southern agricultural reform faltered during the antebellum period as reformers, planters, and intellectuals alike were swept up in increasingly radical sectional political participation during the 1830s, 1840s, and 1850s. Ironically New England reformers looked to specializations, like winter apple cultivation, to combat the influx of Midwestern agricultural goods while Southern reformers championed agricultural diversification to combat soil exhaustion and gain more agricultural self autonomy. New England yeomen farmed in a free labor system where acquiring hired labor at an affordable price became increasingly difficult within the ecological confines of the shortness of the growing season and the pull of landless
laborers to the Midwest while Southerners worked in a slave labor system that
discouraged agricultural diversification or improvement.\textsuperscript{xv}

In this larger sectional context, apple culture became an increasingly favored
means of dividing New England farmers from their Southern neighbors in the
increasingly tempestuous decade prior to the War for the Union. Southern farmers
gathered their peaches and apples as early as July although more typically from August
until September, distilling most of their produce into brandy.\textsuperscript{xvi} The northern agricultural
press claimed that the consumption of hard cider had largely ended among progressive
yeomen farmers in New England by 1840 and grafted winter apples were gathered from
late September to November for sale or export as table fruit rather than for distillation.
Most Southerners could not compete in this new market for grafted table apples as
Southern apples ripened too early and did not have the keeping qualities of the winter
varieties of the Northern states. Southerners faced ecological boundaries that
inadvertently gave New England reformers moral capital and in the Northern agricultural
press apples often represented a profitable free labor specialization starkly contrasted
against the cotton culture of the South.

\textit{Apples Abound} offers new insight into how farmers and progressive
agriculturalists perceived the social consequences of emigration and urbanization in
antebellum New England. New England extra-regional emigration began in earnest with
the opening of the Erie Canal in 1824 and local perceptions of orchards and apple trees
offered palpable insight into regional anxiety resulting from such demographic shifts. In
1927, James Goldthwait, in his seminal article, “A Town That has Gone Down Hill,”
seemed to confirm the worst fears of early nineteenth century pundits in the agricultural press that towns like Lyme, New Hampshire had indeed suffered significant population loss and had been similarly visited by the loss of upland agricultural lots between 1820 and 1860.\textsuperscript{xvii} Only a few years later in 1936 the myth of a declining agricultural New England was almost codified as intellectual gospel by the work of Harold Wilson, who recognized the seeds of such declines as having been sown prior to the nineteenth century and then taken root by the 1830s. The conceptual model of emigration, rural depopulation, and agricultural decline in New England remained remarkably resilient among scholars as noted by Robert Gross who described Concord, Massachusetts as a town of limits facing emigration and decline as early as the 1770s \textsuperscript{xviii}

A new generation of scholars challenged the model of rural decline in New England perpetuated by Goldthwait, Wilson, and others in a series of articles published in the 1980s. Hall Barron’s study of hill country township of Chelsea, Vermont in \textit{Those Who Stayed Behind: Rural Society in Nineteenth Century New England}, was among the first works to redress the venerable Goldthwait thesis. Three years later, Michael Bell more directly addressed Goldthwait’s arguments in his aptly named article, “Did New England Go Downhill?” in which he ultimately concluded that New England farmers ultimately readjusted, embraced new markets and diversified, and thrived by the last decades of the nineteenth century. Donald Parkerson’s study, \textit{The Agricultural Transition in New York State}, dealt exclusively with antebellum agricultural transition in New York; however, his work showed that dynamic population shifts among rural farmers could
actually foment progressive agricultural improvement and the growth of market capitalism among farmers.

The issue, of course, was not if rural New England communities “went down hill” in the first half of the nineteen century, but whether New Englanders themselves perceived their rural communities as being in decline. This work demonstrates that the ways in which antebellum farmers and progressive agriculturists addressed apple culture in print spoke directly to issues of emigration, perceptions of rural population decline, anxieties concerning agricultural decay, and even to sectional tensions with Southern and Midwestern states. Some thought old, decaying or neglected orchards on the agricultural landscapes of rural New England were evidence that agriculture in the region had indeed spiraled into a state of decline. Others thought the complex intersections of labor, technology, and ecology required for turning a profit from grafted apples orchards might reinvigorate the ailing New England countryside with biological markers of the progressive agriculturists and simultaneously stymie the tide of rural emigration while promoting Yankee values of thriftiness, reciprocity, civic responsibility, and Puritan work ethic. Antebellum writers spoke of cider trees and apple orchards as melancholy biological referents of disquieting rural changes in the same ways that late nineteenth New Englanders spoke of abandoned fields, cellar holes, and old stone walls amidst second growth woodlots as symbols of regional rural decline.

In order to facilitate the exploration of these ideas this study, as broadly conceptualized, is divided into two sections. The first section, consisting of chapters 2 through 4, explores agricultural transitions and apple cultivation in antebellum New
England, while chapters 5 through 8 emphasize cultural themes which resonated through period discussion of apple culture among yeomen farmers, orchardists, country gentlemen, journal writers, and progressive agriculturists. Chapter 2 provides the foundation for the first section of this study by analyzing extant census returns and tax valuations to provide a comprehensive national and regional context for exploring antebellum transitions from cider pressing to winter apple cultivation. This chapter addresses the weakness of available statistics, particularly between 1800 and 1850, while exploring apple culture between 1850 and 1860. The extensive analysis of apple culture in the decade prior to the Civil War fits comfortably with the concluding emphasis on the state pomology conventions of 1847 as orchards that came into bearing by the 1850 and 1860 census would have been set by farmers during the 1840s.

Chapter 3 explores the antebellum transition from cider pressing to grafted winter apple cultivation from the worldview of the individual farmer. Traditional seasonal cycles of work and labor would have been dramatically and often detrimentally disrupted had countless New England farmers attempted to transition from cider producers to winter apple orchardists. Transitioning apple cultivation from its traditional role as the least labor intensive late fall activity on the farm to one of the most labor intensive and placing that new workload squarely in the midst of the fall corn and potato harvest exhausted the finite labor resources of many nineteenth century farmers. Transitioning to winter apple cultivation on a scale large enough for extra-local exchange was also an expensive luxury few farmers could afford as they waited eight to ten growing seasons for their first marketable harvest. This chapter contends that farmers who resisted calls to set orchards
and re-graft their old apple trees were ultimately looking out for their own best interest rather than obstinately resisting what agricultural elites unilaterally deemed as agricultural progress.

Chapter 4 finds that changing perceptions of agricultural space, especially in the relationship between apple trees, mowing, pasture, and home-lots, produced more efficient orchards that were not always in the best interests of yeomen orchardists. Many New England farmers had a variety of compelling practical, economic, and ecological reasons for not spatially redefining agricultural space for maximum yield per acre. Dispersal of apple trees often fit well in the slower cadence of apple cultivation for those who were not engaging in extra local markets while grafting winter scions onto hardy native varieties that had proved themselves increased the odds of getting some apple in return every season. Local strategies of scattering apple trees about home-lot, pasture, and meadow also negated the potential of total loss of the apple crop from disease, infestation, or late spring frosts. This chapter contends that local resistance often encountered by progressive agriculturists toward setting new orchards and treating them as unique agricultural spaces for the production of apples was based upon sound understandings and tacit knowledge of yeomen apple growers own agricultural regimes, which championed first “a comfortable subsistence” rather than passive allegiance to the agricultural practices of their fathers.

Chapter 5 reveals how the temperance movement of the 1820s and 1830s hastened the slow demise of cider consumption in New England. It recounts the rather contentious interactions of the agricultural and religious press as temperance zealots
called for cider to be included in the temperance pledge and peaks to the origin of the subsequent myth of the New England cider tree massacres of the 1830s. Instead it concludes that wanton destruction of cider trees by overzealous temperance farmers was almost certainly a figment of an anxious agricultural press and that whatever orchard losses that did occur were likely the product of a collusion of disparate social, economic, and agro-ecological forces. Significantly, however, these forces created a New England landscape cumbered by thousands of sickly cider tees that seemed to speak to farmers, social reformers and progressive agriculturists alike about the disquieting social and agricultural transitions taking place throughout many rural communities in antebellum New England.

Chapter 6 delineates the place of the cider tree and apple orchard as part of the cultural landscapes of mid-nineteenth-century New England. Farmers, reformers, progressive agriculturists, and Boston elites all imbued the apple tree with differing, and often contradicting, meanings that reflected larger regional anxieties in the decades preceding the War for the Union. Apple trees imbued with various kinds of veneration, local or regional identities, meant very different things among Boston aristocrats or hill country yeomen and such forms of memory were often emblematic of larger regional social anxieties. Apple trees were invariably less unifying than other arboreal symbols like the American elm and consequently were largely forgotten as New England struggled to find less contentious living biological markers to replace the founding generation of the American Republic in the 1830s and 1840s.
Chapter 7 explores how progressive agriculturists intuitively recognized the value of imbuing regional discussion of apple culture in New England with the rhetoric of moral reform as a means to compel farmers to become orchardists. During the 1830 and 1840s progressive agriculturists increasingly spoke of good apple culture as an endeavor that reflected positive or progressive attitudes toward civic duty, the improvement of moral character, and to reciprocity among neighbors and communities. Ironically this chapter finds that the ways in which agricultural writers spoke of apple growing was just as likely to reflect latent anxieties toward agricultural transitions among progressive agriculturists. In this context progressive agriculturists often discussed the failure of farmers to embrace moral crusades to improve their apple in ways that betrayed their own anxieties concerning emigration, urbanization, agricultural specialization, soil exhaustion, and climate change.

The final chapter of this study provides a bit of a departure from the traditional geographic boundaries of New England apple culture which have defined this work. Most of the preceding chapters dealt with apple growing as a New England agricultural specialization in response to regional emigration and the corresponding growth of agricultural competition from Midwestern communities. Chapter 8 recounts the experience of New England orchardists in Ohio and how they proved in many ways more influential in the Midwest than progressive agriculturists back home in the New England states. It positions the small cadre of New England farmers, orchardists, nurserymen, and progressive agriculturists who settled the fertile bottomlands of the Ohio River Valley between 1796 and 1850 as fundamentally shaping apple culture in Kentucky, Western
Virginia, Indiana, and beyond prior to the American Civil War. In the end, New England immigrants and apple varieties, a culture of New England apple growing, the New Orleans market, ecological factors, and interactions with Mid-Atlantic and Southern orchardists produced the most influential apple growing district in the Union by 1847.

Timothy Dwight noted that “apples abound” throughout the New England states during the first decade of the nineteenth century. Had he traveled through the Ohio River Valley only thirty years later he would have discovered, in communities like Marietta, Belpre, and Quaker Bottom, the most expansive and extensively grafted orchards in the Union. *Apples Abound* examines the agricultural and social transitions that shaped apple culture among antebellum New England farmers and in turn elucidates how their perceptions of apple growing spoke to their own worldviews toward social ferment and scientific agricultural specialization prior to the Civil War.
NOTES

i The term yeoman carries differing meaning for scholars of Southern or economic history. The term is also used to describe farmers in New England and New York and can be found in the work of northern agricultural historians such as Martin Breugel, Donald Parerson, Brian Donahue, and Christopher Clark.

ii The diaries of Medford, Massachusetts farmer Peter Chardon Brooks are held by the Massachusetts Historical Society and cover a period from 1808 until Brooks’ death 1 January 1849.


CHAPTER II

APPLE GROWING IN NEW ENGLAND, 1850-1860

In early October of 1853 Strafford Vermont farmer Jedediah Harris and his neighbors spent a handful of days picking winter apples and gathering cider windfalls from orchard-lots or from apple trees scattered about their upland pasture and mowing. The very act of apple picking in antebellum New England was in transition and Harris noted with apparent satisfaction that the “old uncultivated orchards” of his neighbors did not bear, but that his own “grafted fruit” were about an average harvest. Harris’s decision to abandon the native cider trees of his fathers and participate in burgeoning extra-local markets for table apples began in April when he “commence[d] setting apple trees” probably on the favorable slope opposite the Ompompanoosuc River but perhaps on the lower wetter ground nearer his home and outbuildings just south of Strafford’s common. In following weeks Harris tilled his orchard-lot and paid a man named Hazelton to graft his orchard even as his neighbors left their native apple trees to their own ways and moved on to other more pressing seasonal agricultural pursuits. By all accounts Jedediah Harris, alone among his Strafford neighbors, had transitioned to a hill country cultivator of winter apples by 1853 and his journal was replete with examples of how he mastered the often divergent threads of labor, knowledge, ecology, and technology necessary for abandoning the cider barrel for the cultivation of winter apples for extra-
local markets. Both his success and the inaction of his neighbors spoke poignantly of apple growing and agricultural transitions in antebellum New England.\textsuperscript{21}

Jedediah Harris succeeded where his neighbors failed by applying the new doctrines of progressive agriculturists to the traditional practice of apple growing among New England farmers. Harris replaced the native cider trees of his fathers with grafted varieties for winter use, set his apple trees in an orchard rather than among pasture, mowing, or fence-lines, invested in new technologies like trimming, budding, grafting, and was willing to combat orchard pests, learn to carefully pick, sort, and barrel his harvest, and engage extra-local markets far removed from Strafford. Good apple growers created a new agricultural specialization rooting New England farmers to the soil, making their farms competitive with Midwestern agriculture and in the process cultivated positive moral and civic traits among farmers. The cadre of progressive agriculturists, amateur horticulturists, and writers and editors of the regional farming journals residing near Boston, Massachusetts would have lauded Harris as a prime example of what yeomen apple growers could accomplish amidst unprecedented agricultural and social transition in antebellum New England.\textsuperscript{22}

Jedediah Harris might have been an iconic example of what hill country farmers could accomplish if only they embraced apple cultivation as a means to preserve New England agriculture, however, Harris himself was atypical of his Strafford neighbors. Unlike his neighbors, Harris was not a farmer by trade but rather a successful Strafford merchant. He successfully ran a number of stores in Orange County and only took up farming in the last thirty years of his life. Harris was also successful in the public sphere and held a number of civil positions at the local and state level between 1811 and 1844.
Strafford residents considered him a model progressive agriculturalist and noted that Harris subscribed to contemporary farming journals like the *New England Farmer*. Harris was a Strafford elite, a savvy merchant, respected local politician, and firm advocate of agricultural improvement and scientific farming.\textsuperscript{23}

Jedediah Harris’s agricultural activities were on the same scale as his political and business endeavors in Strafford and differed markedly from the majority of his Strafford neighbors. At five hundred acres Harris had the largest farm in Strafford and with a cash value of ten thousand dollars. It was worth four thousand dollars more than Charles Dow’s next most expensive farm in the township.\textsuperscript{24} Only five Strafford farmers reported no income from their orchards in 1850 while Harris was among three farmers who reported the most value in the township from their trees or approximately seventy-five dollars income from the “value of the products of the orchard.” Census takers credited Harris with 175 dollars worth of farm implements, a value shared with only two other Strafford neighbors, and Harris led Strafford in the cultivation of corn and oats at 175 and 125 bushels respectively. More regionally, Harris out produced the typical Orange County farmer in almost every agricultural endeavor (Table 2.1). Indeed, the only production that Harris’ hill farm neighbors seem to have soundly out produced him in was in pounds of maple sugar. Harris’ upland neighbors were gifted agriculturists, after all, expressing their divergent arboricultural interests in pounds of sugar rather than bushels of winter apples.\textsuperscript{25}

Although few Strafford farmers boasted returns from their orchards half as impressive as those reported by Jedediah Harris, apple growing was still largely an
egalitarian practice among Orange County farmers in 1850. Ninety-seven percent of Harris’ neighbors reported income from their orchards. That number plummeted to only thirty percent of Strafford farmers a decade later in 1860. Jedediah Harris’ favored economic standing, the seeming abandonment of apple culture among his hill country neighbors, the unforgiving ecological boundaries of Orange County farms, and the uncertain transition from cider pressing to winter apple marketing spoke disquietingly to the problem of apple culture in antebellum New England. These intersections of labor, capital, knowledge, and ecology palpably exhausted the most fervent horticultural
endeavors of yeomen farmers even as progressive agriculturists optimistically extolled the civic and economic virtues of apple culture throughout much of rural New England.

Although agricultural historians generally agree that grafted winter apples gradually supplanted native seedling or cider apples on New England farms between 1820 and 1860, hard statistical data elucidating the divergent threads conspiring to bring about such widespread regional transition is difficult to come by or accurately assess. Prior to 1840, comprehensive statistical evidence of the nature of apple growing in New England appeared only indirectly in the number of barrels of cider reported by farmers and recorded by township tax collectors. These valuations, particularly for Massachusetts, provide solid evidence of the ubiquitous nature of cider production in New England between 1760 and 1810. Particularly complete valuation lists compiled for Weston, Worcester and Concord Massachusetts reveal that Massachusetts farmers produced on average between seven and twelve barrels of cider during this period, however, few sources speak to cider production in other parts of New England. Even with such fragmentary evidence we can offer some informed suppositions as to the nature of apple growing in New England from 1760 to 1820.

From available evidence we can tentatively conclude that most farmers produced cider by gathering twenty-four to one-hundred and twenty bushels of cider apples from their orchards, mowing, fence lines, and pasture lands annually. The presence of cider and, conversely, the absence of winter apples among township valuation lists prior to 1830 suggest that cider was indeed the formative product of New England orchards and that most farmers cultivated no grafted winter apple varieties or produced too few market apples to make their enumeration worth the trouble for local assessors. There was already
a shift in utilization of New England cider orchards prior to 1824 as most published town valuations reveal substantive decreases in barrels of cider reported by Massachusetts farmers between 1810 and 1830. Cider disappears from townships valuations almost entirely after 1820 and two decades prior to the reemergence of orchard statistics in the first U.S. agricultural Census of 1840 or in state reports on agriculture and manufactures complied by Massachusetts and Connecticut in 1845.²⁹ It is within this twenty year absence of statistical data that much of the transition from cider production to the grafted winter apple varieties takes place. In the absence of quantitative data, farmer’s diaries, daybooks, store ledgers, horticultural books, and the writings of the agricultural press must necessarily provide the means for examining transitions in New England apple cultivation.³⁰

The first national agricultural census of 1840 produced a set of agricultural statistics more detailed and comprehensive than those collected by Massachusetts or Connecticut in 1845. As a means of observing transitions in apple culture in New England and nationally between 1840 and 1860 however, the information collected was fraught with myriad limitations. Foremost among these were that census takers only collected information under the nonspecific column of “value of the products of the orchard” and then recorded their findings in terms of dollar value rather than by bushels of fruit or by number of trees. This census column included not just apples but pears, peaches, apricots, cherries, plums, and quinces. Furthermore, while most of the figures reported undoubtedly came from the apple tree, there was no way to differentiate between winter apples, barrels of cider, and other lesser products such as cider vinegar, apple butter, dried apples, and apple jelly. Recording orchard products in monetary terms only
exacerbated the difficulty in using them to show regional shifts in apple culture in antebellum New England as values fluctuated widely depending on the kind of fruit, quality, final product, and location. A reported value of twelve dollars in 1850 might, for example, be four bushels of pears on the Boston market, twelve barrels of Baldwin winter apples in Cheshire County New Hampshire, six barrels of Baldwin apples in Essex County, Massachusetts, twelve to eighteen barrels of cider (if one could find a buyer in 1840) or one hundred and twenty bushels of cider apples on the Vermont Canadian border.\textsuperscript{31}

Agricultural historians often contend that the first agricultural census of 1840 probably suffered from significant underreporting. Census takers in 1840 also neglected to record the number of farms per county and only collected statistics on the number of improved and unimproved acres. Scholars consider the agricultural censuses of 1850 and 1860 more uniform in coverage and both censuses included categories for the number of farms and value of orchard products per county. Despite the limitations inherent with these figures, by dividing county values of orchard products by number of farmers we can get an approximate dollar value per farmer for 1850 and 1860 that provides a palpable sense of the overall importance of that branch of agriculture among different regions of the Union and among different counties comprising the six states of New England.

State returns for Massachusetts in 1855 can offer insight into what proportion of U.S. census returns for 1850 and 1860 represented products of the apple orchard. In 1855 Massachusetts enumerators recorded the number of apple trees and pear trees in every county (Table 2.2). Taking into account similar physiographic and environmental
Table 2.2 Apple and Pear Trees Massachusetts 1855

<table>
<thead>
<tr>
<th>County</th>
<th>Pear Trees 1855</th>
<th>Apple Trees 1855</th>
<th>Percentage Apple</th>
</tr>
</thead>
<tbody>
<tr>
<td>Massachusetts</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Barnstable</td>
<td>2,124</td>
<td>25,939</td>
<td>92.43</td>
</tr>
<tr>
<td>Berkshire</td>
<td>4,223</td>
<td>121,275</td>
<td>96.64</td>
</tr>
<tr>
<td>Bristol</td>
<td>22,108</td>
<td>157,161</td>
<td>87.67</td>
</tr>
<tr>
<td>Dukes</td>
<td>118</td>
<td>7,733</td>
<td>98.50</td>
</tr>
<tr>
<td>Essex</td>
<td>27,023</td>
<td>239,127</td>
<td>89.85</td>
</tr>
<tr>
<td>Franklin</td>
<td>963</td>
<td>66,009</td>
<td>98.58</td>
</tr>
<tr>
<td>Hampden</td>
<td>2,700</td>
<td>148,694</td>
<td>98.22</td>
</tr>
<tr>
<td>Hampshire</td>
<td>2,073</td>
<td>78,802</td>
<td>97.44</td>
</tr>
<tr>
<td>Middlesex</td>
<td>42,684</td>
<td>351,586</td>
<td>89.17</td>
</tr>
<tr>
<td>Nantucket</td>
<td>6</td>
<td>0</td>
<td>Na</td>
</tr>
<tr>
<td>Norfolk</td>
<td>41,941</td>
<td>175,723</td>
<td>80.73</td>
</tr>
<tr>
<td>Plymouth</td>
<td>15,572</td>
<td>194,521</td>
<td>92.59</td>
</tr>
<tr>
<td>Suffolk</td>
<td>1,020</td>
<td>4,500</td>
<td>81.52</td>
</tr>
<tr>
<td>Worcester</td>
<td>22,787</td>
<td>465,740</td>
<td>95.34</td>
</tr>
<tr>
<td>Total</td>
<td>185,392</td>
<td>2,036,810</td>
<td></td>
</tr>
<tr>
<td>Average</td>
<td></td>
<td></td>
<td>91.66</td>
</tr>
</tbody>
</table>

similarities we can reasonably suggest, for example, that most of Northern New England probably had ratios of apple trees to other pear trees approximating those found in Hampden, Hampshire, and Franklin Counties in Massachusetts. We can surmise that the numbers in the Seventh and Eighth U.S. census of agriculture must have had apple tree ratios constituting 96 percent to 98 percent of the values enumerated. As for Connecticut and Rhode Island in Southern New England we can similarly conclude that, even in regions of those states most hospitable to the cultivation of pear, peach, plum, apricot, and quince trees, apple trees comprised ratios similar to those recorded in Essex, Norfolk, and Bristol Counties in Massachusetts, or approximately eighty-one to ninety percent of
Ostensibly then, apple trees represented at least eighty percent of the total value of the “products of the orchard” recorded for Southern New England counties and anywhere from ninety-six to essentially the sum-total of orchard products enumerated in counties comprising Northern New England. The vast majority of antebellum New England farmers were almost wholly or entirely apple growers in practice.

Within a national context the optimistic pronouncement of Exeter, New Hampshire horticulturist J.G. Hoyt that “apple raising is as much the mission and “manifest destiny’ of New England, as cotton growing is ‘the chief end’ of Georgia and Mississippi,” appeared largely substantiated by U.S. census enumerators in 1850 and 1860. In 1850 only the Mid-Atlantic region produced more value from apple orchards per farm than New England and only on account of New Jersey’s favored geographic proximity to both the New York City and Philadelphia Markets (Table 2.3). Southern States could point to substantive progress in orchard value between 1850 and 1860, however, ecological factors limited winter apple cultivation and the plantation south continued to provide a ready market for surplus New England winter apples just as the West Indies provided welcome markets for New England cider a century prior. By 1860, even as New England farmers lost ground to western growers in English grains, corn, and livestock, they managed to remain well ahead of the Midwest in orchard value per farm and even manage to surpass the Mid-Atlantic region. It appeared the labors of New England agricultural writers indeed proved fruitful and apple growing could be counted among a fortunate few specializations ecologically adapted to the cold North Atlantic region and reasonably secure from western competition by 1860.
Table 2.3 Average Values of Orchard Products per Farm 1850-1860

<table>
<thead>
<tr>
<th>State/Region</th>
<th>Value per Farm 1850 (Dollars)</th>
<th>Value per Farm 1860 (Dollars)</th>
<th>Percent Change per Farm 1850-1860</th>
</tr>
</thead>
<tbody>
<tr>
<td>Maine</td>
<td>$7.33</td>
<td>$9.01</td>
<td>+22.92</td>
</tr>
<tr>
<td>New Hampshire</td>
<td>$8.51</td>
<td>$18.29</td>
<td>+114.92</td>
</tr>
<tr>
<td>Massachusetts</td>
<td>$13.62</td>
<td>$25.99</td>
<td>+90.82</td>
</tr>
<tr>
<td>Rhode Island</td>
<td>$11.88</td>
<td>$15.48</td>
<td>+30.30</td>
</tr>
<tr>
<td>Connecticut</td>
<td>$7.81</td>
<td>$20.21</td>
<td>+158.77</td>
</tr>
<tr>
<td>Vermont</td>
<td>$10.59</td>
<td>$6.71</td>
<td>-36.64</td>
</tr>
<tr>
<td>New England</td>
<td>$9.96</td>
<td>$15.94</td>
<td>+60.04</td>
</tr>
<tr>
<td>New York</td>
<td>$10.33</td>
<td>$18.92</td>
<td>+83.16</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>$5.67</td>
<td>$9.47</td>
<td>+67.02</td>
</tr>
<tr>
<td>New Jersey</td>
<td>$25.41</td>
<td>$15.53</td>
<td>-38.88</td>
</tr>
<tr>
<td>Delaware</td>
<td>$7.68</td>
<td>$17.16</td>
<td>+123.44</td>
</tr>
<tr>
<td>Mid-Atlantic</td>
<td>$12.27</td>
<td>$15.27</td>
<td>+24.45</td>
</tr>
<tr>
<td>Ohio</td>
<td>$4.84</td>
<td>$10.72</td>
<td>+121.49</td>
</tr>
<tr>
<td>Indiana</td>
<td>$3.46</td>
<td>$9.55</td>
<td>+176.01</td>
</tr>
<tr>
<td>Illinois</td>
<td>$5.85</td>
<td>$7.85</td>
<td>+34.19</td>
</tr>
<tr>
<td>Michigan</td>
<td>$3.89</td>
<td>$17.98</td>
<td>+362.21</td>
</tr>
<tr>
<td>Mid-West</td>
<td>$4.51</td>
<td>$11.53</td>
<td>+155.65</td>
</tr>
<tr>
<td>Virginia</td>
<td>$2.31</td>
<td>$8.65</td>
<td>+274.46</td>
</tr>
<tr>
<td>North Carolina</td>
<td>$0.61</td>
<td>$8.56</td>
<td>+1303.28</td>
</tr>
<tr>
<td>Kentucky</td>
<td>$1.42</td>
<td>$6.66</td>
<td>+369.01</td>
</tr>
<tr>
<td>Tennessee</td>
<td>$0.73</td>
<td>$3.69</td>
<td>+405.48</td>
</tr>
<tr>
<td>Upper South</td>
<td>$1.27</td>
<td>$6.89</td>
<td>+442.52</td>
</tr>
<tr>
<td>South Carolina</td>
<td>$1.17</td>
<td>$6.45</td>
<td>+451.28</td>
</tr>
<tr>
<td>Georgia</td>
<td>$1.59</td>
<td>$2.84</td>
<td>+78.62</td>
</tr>
<tr>
<td>Florida</td>
<td>$0.29</td>
<td>$3.24</td>
<td>+1017.24</td>
</tr>
<tr>
<td>Alabama</td>
<td>$0.37</td>
<td>$4.05</td>
<td>+994.59</td>
</tr>
<tr>
<td>Mississippi</td>
<td>$1.29</td>
<td>$5.95</td>
<td>+361.24</td>
</tr>
<tr>
<td>Lower South</td>
<td>$0.94</td>
<td>$4.51</td>
<td>+379.79</td>
</tr>
</tbody>
</table>
Although New England farmers might have emerged as the foremost apple cultivators in the Union between 1850 and 1860 census figures conceal more disquieting evidence that apple growing at the county level amongst New England farmers actually became much less egalitarian during this same period. Substantial gains in average value of orchard products per farm in Connecticut and much of Massachusetts concealed equally dramatic decreases across large swaths of northern New England (Maps 2.1 and 2.2). In Northern Vermont the most spectacular declines were found among the counties above the so-called Baldwin-Greening Line, the northernmost point of reliable cultivation of the most marketable varieties of winter apples. In Essex County the average value per farmer declined 80 percent between 1850 and 1860 while in Caledonia and Lamoille Counties the average value of orchard product per farmer declined a phenomenal 99 percent for the former and 100 percent for the latter. Washington, Franklin, and Grand Isle counties all posted losses of between 41 percent and 96 percent for average value per farmer during the same ten year period (Tables 2.4 and 2.5).

In the Connecticut River Valley of Northern New England eight of the nine river counties in Vermont and New Hampshire posted similar declines. While the three New Hampshire river counties reported declines less precipitous than those in neighboring Vermont Counties between 1850 and 1860, the average decline of from 20 percent to 27 percent per farm must have lent credence to the anxious rhetoric of agricultural improvers that farmers’ sons were abandoning the hill country for the life of the mechanic or the new lands of the Midwestern states. Indeed, if as to punctuate the matter the three northernmost Connecticut Valley counties: Caledonia (Vermont), Essex (Vermont), and Coos (New Hampshire) reported declines that averaged 92 percent between 1850 and
Map 2.1 Percent Increase Orchard Value per Farm, 1850 – 1860
Map 2.2 Percent Decrease Orchard Valley per Farm, 1850 – 1860
<table>
<thead>
<tr>
<th>County</th>
<th>1850</th>
<th>1860</th>
<th>Change</th>
<th>County</th>
<th>1850</th>
<th>1860</th>
<th>Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Androscoggin</td>
<td>Na</td>
<td>10.96</td>
<td>Na</td>
<td>Oxford</td>
<td>8.24</td>
<td>18.39</td>
<td>+123.06</td>
</tr>
<tr>
<td>Aroostook</td>
<td>0.80</td>
<td>0.57</td>
<td>-28.25</td>
<td>Penobscot</td>
<td>6.62</td>
<td>5.96</td>
<td>-9.96</td>
</tr>
<tr>
<td>Cumberland</td>
<td>3.24</td>
<td>7.35</td>
<td>+126.82</td>
<td>Piscataquis</td>
<td>8.53</td>
<td>5.78</td>
<td>-32.26</td>
</tr>
<tr>
<td>Franklin</td>
<td>9.30</td>
<td>16.67</td>
<td>+79.17</td>
<td>Sagadahoc</td>
<td>Na</td>
<td>5.37</td>
<td>Na</td>
</tr>
<tr>
<td>Hancock</td>
<td>1.65</td>
<td>2.33</td>
<td>+41.58</td>
<td>Somerset</td>
<td>8.14</td>
<td>9.37</td>
<td>+19.49</td>
</tr>
<tr>
<td>Kennebec</td>
<td>13.55</td>
<td>13.78</td>
<td>+1.70</td>
<td>Waldo</td>
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<td>Belknap</td>
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<td>22.65</td>
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<td>Carroll</td>
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<td>14.37</td>
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<td>Merrimack</td>
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<tr>
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<td>7.27</td>
<td>-21.74</td>
<td>Sullivan</td>
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<td>5.70</td>
<td>-10.52</td>
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<td>6.78</td>
<td>-62.73</td>
<td>Lamoille</td>
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<td>Bennington</td>
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<td>3.45</td>
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<tr>
<td>Caledonia</td>
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<td>0.03</td>
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<td>Orleans</td>
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<td>0.09</td>
<td>-96.88</td>
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<td>Chittenden</td>
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<td>14.41</td>
<td>12.53</td>
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<td>Washington</td>
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<td>2.93</td>
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<tr>
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<td>3.48</td>
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<td>33.11</td>
<td>19.31</td>
<td>-41.68</td>
<td>Windsor</td>
<td>10.44</td>
<td>7.33</td>
<td>-31.70</td>
</tr>
</tbody>
</table>
1860. For all the optimism of the agricultural press in the early 1850s the typical farmer in the Northern Connecticut valley reported a decline in the value of the products of his orchard of 37.86 percent by 1860.

Despite widespread regional declines in the value of orchard products per farmer in extreme Southeastern Massachusetts, much of Vermont, and the Upper Connecticut River Valley, forty of sixty-four New England counties posted gains between 1850 and 1860. It is probable that much of the increase reported in some neighborhoods came from a corresponding increase in the overall value of apples per bushel during the same period. In Vermont, for example, the average price of a bushel of apples nearly doubled.
Map 2.3 Value Orchard Products per Farm 1850
Map 2.4 Value Orchard Products per Farm 1860
from $0.20-$0.39 between 1850 and 1860. An equally significant portion of the increase undoubtedly came from new orchards coming into bearing with winter apples which commanded higher prices across urban markets in New England. It is not surprising that the counties producing the most values from their orchards in New England were generally clustered together in Connecticut, eastern Massachusetts and southern New Hampshire by 1860 (Maps 2.3 and 2.4). All these increases were reported in locations with affable climates and close proximities to urban markets, water transportation, or burgeoning mill towns in southern New England. It was from this worldview of increased urban demand, proximity to markets, and genial seasonal climate variation that the horticultural elite of New England came so fervently to believe that apple culture might save the New England farmer. The incongruity in the experience of apple growing in favored regions of Southern New England and the equally disheartening experience of farmers in Northern New England is easily perceptible through the differing experiences of farmers in Essex County, Massachusetts, and Orange County, Vermont Between 1850 and 1860.

During the first half of the nineteenth century Essex County was at the epicenter of horticultural experimentation and intellectual negotiations concerning the regional dissemination of scientific agricultural methods. Neighboring Boston was the center of an emergent agricultural press during this period beginning with the publications of the transactions of the Massachusetts Agricultural Society in 1798 and culminating with the publication of *New England Farmer* in 1822. By 1850, *The New England Farmer*, *Massachusetts Plowman*, and *Boston Cultivator*, were all published in Boston and were supported by a growing cadre of intellectuals, reformers, agricultural improvers, and
countless subscribers in neighboring Essex County. Similarly, a number of established
state and county agricultural organizations like the Massachusetts Society for Promoting
Agriculture, the Middlesex County Agricultural Society, The Norfolk Agricultural
Society and the Essex Agricultural Society provided a means for disseminating
horticultural knowledge and brought farmers, horticulturists, and nurserymen together for
agricultural fairs and other related forums. These organizations were particularly
interested in horticultural pursuits and offered expansive treatises on orchard cultivation,
pruning, grafting, and varieties selections, as well as premiums for best orchard and
awards for finest winter or market apples.  

Agricultural Societies in Orange County were less storied in years and far fewer
in number than in Essex County, Massachusetts. The first society devoted to orchard
growing in Northern New England was established only in 1850 and then under the
leadership of Burlington horticulturist Chauncey Goodrich. The Green Mountains proved
a formidable natural barrier between Orange County farmers and Burlington
Horticulturists, just as the temperate climate of Lake Champlain and the burgeoning
market and capital created by that northern city similarly fostered ecological, economic,
and social barriers between Eastern and Western Vermont. Orange County farmers and
mechanics organized the Orange County Agriculture Society in 1849 and directed their
meetings and premiums to sheep, dairy cows, hay and oats rather than apples, peaches,
and pears. Returns for members in neighboring Chelsea Township suggest, however, that
if improvements championed by society members were more utilitarian in nature the
society itself was more democratic and structure than those found in Essex County. Many
members came from smaller farms as well as from the artisan and merchant classes. Here
was an organization expounding agriculture improvement that was not necessarily dominated by men like Jedediah Harris. Unlike the more venerable Essex Societies of Massachusetts, silage and husbandry rather than horticulture were the purview of Orange County agricultural improvers in the 1850s.\textsuperscript{39}

Setting orchards and grafting winter apples fit comfortably within the quickening cadence of urbanization in Essex and neighboring Massachusetts counties in the decades prior to the War for the Union. In only five years between 1850 and 1855 the number of townships in Essex County increased from thirty to thirty-four. The incorporation of new townships was just one indication of the rapid population growth. Every single township in Essex increased in population and eleven townships reported gains of 10 percent or greater. Indeed the total population of Essex County increased 18.75 percent from 127,170 to 151,018 in just five years and much of that increase came at the expense of rural Northern and Western New England communities like Strafford, Vermont. Essex’s surge in population was not atypical of Southern New England more generally. In the three Southern New England states the population of Massachusetts, Connecticut, and Rhode Island increased between 1850 and 1860 roughly 23.8 percent, 42.1 percent, and 18.4 percent respectively.\textsuperscript{40} Essex farmers lived in a world seemingly awash in mechanics and day laborers providing ready local markets for their products of the orchards and market gardens.

Among Jedediah Harris’s Strafford neighbors it might seem that the prosperous communities of Essex Massachusetts were populated by the itinerant youth of Orange County townships. Within Harris’ time the population of Strafford fell 22.17 percent between 1830 and 1860 from 1,935 to 1,506 individuals. Similar evidence of substantial
emigration was evident from the 23.76 to 24.05 percent population declines returned by the neighboring townships of Thetford, Sharon, and Norwich, Vermont during the same three decades. These declines were not atypical of northern New England counties on both sides of the Connecticut River during the antebellum period. Of the seventeen townships comprising Orange County fifteen enumerated population declines in 1850 and sixteen townships posted losses in 1860. Incredibly, half of all the townships in Vermont recorded population losses on the eve of the American Civil War.41

In 1850 there might not have been any farmers in New England more tied into local, extra-regional, national, and international markets than those in Essex County, Massachusetts. Good roads connected all Essex townships and the gently rolling almost level topography of Essex County presented little obstacle to selling produce in nearby towns. Andover, Haverhill, Danvers, Ipswich, and Salisbury were all connected to rail to Boston, Lowell, and the rest of Southern New England. Similarly, all the Essex County port towns of Marblehead, Gloucester, Salem, Newburyport, and Rockport were integrated into the regional rail network. Farmers might cart or use rail transit to take their winter apples to local markets or they might bring them into Essex port towns. Dried apples proved invaluable on sea voyages and barrels of apples could be profitably shipped by way of the Atlantic to the Southern States or just as easily to the West Indies or the British Isles. Ironically, winter apples raised on farms of ardent abolitionists from Essex County provided the sustenance that bolstered the Southern plantation system just as Essex cider provisioned the slave colonies of the West Indies prior to the American Revolution.42
Travel and access to extra-regional markets for farm produce was easier for many Orange County farmers by 1850 but still proved largely elusive for others in townships far removed from the Connecticut River Valley. The valley townships of Thetford, Fairley, Newbury, and Bradford had direct connection to the growing urban markets of Boston and southern New England with the completion of the Connecticut & Passumpsic Railroad to Wells River on 6 November 1848. In southwestern Orange County, the townships of Braintree and Randolph gained similar opportunities for marketing agricultural goods with the arrival of the Vermont Central Railroad in 1849.\textsuperscript{43} For farmers far removed from the Connecticut River Valley, like Jedediah Harris, access to a railhead required a rather arduous and twisting climb from the village of South Strafford over the highlands between the Ompompanoosuc River and White River watersheds to the neighboring Windsor County village of Sharon. By 1860, the farmers of only six of seventeen Orange County townships had direct rail access and more favorable connections to extra-regional New England markets.

In Massachusetts, Essex County townships were not only favored with local urban markets and ample infrastructure but also a climate and topography as welcoming as any New England county for horticulture pursuits. Most Essex townships averaged a growing season of from 160 to 190 days, while only in the most west central townships did the growing season decline to an average of 150 days. Even these cool central lands averaged a growing season 20 days longer than the best Orange County, Vermont townships. The highest points in Essex County were seldom four hundred feet sea level and provided just enough undulation to the topography of Essex townships to provide good orchard sites with fine air drainage for the propagation of apples, pears, and peaches. The proximity of
the Atlantic Ocean moderated temperature change, delayed autumnal frosts, and contributed to the longer growing season. If the ability to reliably engage in pear culture can be measured as another indication of favorable climate for apple cultivation, Essex townships were among the best, averaging nearly twelve percent of the fruit trees propagated on farmers’ lands. Essex pomologists and horticulturists practiced their agricultural improvement in Essex townships ideally suited to their endeavors.44

Unlike in Essex County, the winters were long and the summers fleetingly short for most Orange County yeomen. The average date of the last frost in spring was from 21 May in the Connecticut Valley townships to 1 June in the western uplands. Autumnal frosts came about 21 September and 1 October respectively. The most favored regions of Orange County averaged at best 130 growing days and in the westerly townships, and those regions above 1,500 feet, as few as 110 growing days. More significantly, practically all Orange townships were considered by later Vermont horticulturists to reside above the so-called “Baldwin-Greening” line, the northernmost limit of reliable cultivation of the Rhode Island Greening and the Baldwin apple. Temperature stations in the Connecticut Valley reported official lows in and about Orange County from -30 to -35 degrees. Temperatures of that severity could kill native cider trees as well as Baldwin, Rhode Island Greening, and practically all other grafted market varieties. Strafford and other Orange Townships most likely experienced such frigid lows during the winters of 1831-1832, 1854-1855, and 1859-1860. It was these seasons of winter kill, more so than late spring or early autumnal frosts, that posed the greatest ecological constraints to grafting winter apples in most Orange County townships. Of the intersections of labor
and climate one hill country farmer in neighboring Windsor County, Vermont noted that there were simply too many labor obligations in too short a growing season.45

Essex horticulturists, like their contemporaries in neighboring Suffolk, Middlesex, and Norfolk Counties, came to associate orchards with agricultural improvement because most Essex farmers were successful apple growers. The choices Essex farmers made between 1850 and 1860 were based in part upon natural ecological advantages and even more so upon the proximity of the Boston market (Table 2.6). Essex farmers pastured few sheep and harvested little English grain. Between 1850 and 1860, Essex farmers shifted their cultivation patterns in two significant ways. They increased the average income per from orchard products from $24.27 to $68.10 and expanded their incomes from market gardening from $48.90 to $64.43 per farm between 1850 and 1860. The number of dairy cows on Essex farms increased, however, the amount of butter and cheese produced on those same farms fell precipitously between 1850 and 1860. This was not on account of poor husbandry but likely the cause of the growth of a market for fluid milk in Boston, a product not enumerated by the U.S. censuses of 1850 and 1860. Essex farmers increasingly turned their attention to fluid milk, orchard products, and market gardening in the decade prior to the American Civil War. It was within this context of favored location and regional specialization that horticulturists and writers for the agriculture journals advocated apple growing for all New England farmers. It was from this same favored locality that agricultural improvers came to equate poor apple orchards with poor farmers.

In Vermont, Strafford Township was not declining as progressive agriculturists feared the condition and apparent value of their apple orchards might suggest but,
Table 2.6 Agriculture Essex, Massachusetts and Orange, Vermont 1850 – 1860

<table>
<thead>
<tr>
<th>County</th>
<th>Essex, Massachusetts</th>
<th>Orange, Vermont</th>
<th>Change 1850 - 1860</th>
</tr>
</thead>
<tbody>
<tr>
<td>Census Year</td>
<td>1850</td>
<td>1860</td>
<td>1850</td>
</tr>
<tr>
<td>Farm Size</td>
<td>73.9</td>
<td>68.1</td>
<td>129.9</td>
</tr>
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<td>Farm Value</td>
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<td>$3,883.21</td>
<td>$934.42</td>
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<tr>
<td>Value Orchard Products</td>
<td>$24.27</td>
<td>$68.10</td>
<td>$8.99</td>
</tr>
<tr>
<td>Value Market Gardening</td>
<td>$48.90</td>
<td>$64.43</td>
<td>$0.10</td>
</tr>
<tr>
<td>Hay (Tons)</td>
<td>21.4</td>
<td>20.9</td>
<td>26.5</td>
</tr>
<tr>
<td>Wheat (Bushels)</td>
<td>0.5</td>
<td>0.7</td>
<td>19.8</td>
</tr>
<tr>
<td>Corn</td>
<td>58</td>
<td>57</td>
<td>66.2</td>
</tr>
<tr>
<td>Potatoes</td>
<td>125</td>
<td>92</td>
<td>224.9</td>
</tr>
<tr>
<td>Oats</td>
<td>15</td>
<td>14.7</td>
<td>77.4</td>
</tr>
<tr>
<td>Milch Cows</td>
<td>3.8</td>
<td>3.9</td>
<td>3</td>
</tr>
<tr>
<td>Butter (Pounds per Cow)</td>
<td>55</td>
<td>42</td>
<td>80</td>
</tr>
<tr>
<td>Cheese (Pounds per Cow)</td>
<td>0.3</td>
<td>0.1</td>
<td>8.4</td>
</tr>
<tr>
<td>Sheep</td>
<td>0.8</td>
<td>0.7</td>
<td>26.8</td>
</tr>
<tr>
<td>Wool (Pounds)</td>
<td>3.3</td>
<td>2.3</td>
<td>1.2</td>
</tr>
</tbody>
</table>

instead, was thriving in the decade prior to the American Civil War. Despite an aggregate loss of population in many townships like Strafford, Thetford, and Vershire, the number of farms in Orange County actually increased 13.27 percent while the number of improved acres per farm increased 16.66 percent as total unimproved acreage per farm decreased 6.08 percent. Average value of orchard products per farmer had indeed decreased by 56.56 percent between 1850 and 1860; however, Orange County farmers reported similar decreases of from 10 to 40 percent in such staples as potatoes, corn, and wheat. Such change spoke to adjustment rather than decline for these same farmers substantially increased the number of sheep, “milch” cows, as well as butter, cheese, and wool produced during the same period. Orange County farmers reported anywhere from 15.29 to impressive 150.02 percent increases in hay and silage crops like oats and buckwheat needed to keep their increased numbers of dairy cows and sheep well fed through long hill country winters. Clearly Strafford farmers, and their Orange County...
neighbors, were making conscious decisions to invest in dairy and sheep at the expense of apples, root crops and English grains for human consumption.\textsuperscript{46}

For agricultural reformers who equated the improvement of apple orchards with a rural community’s commitment to improvement by scientific agriculture there was other more compelling evidence of progress even as Orange County orchards languished. The improvement in the yield of the number of pounds of butter or cheese per cow was often an indication of a progressive agriculturist and Orange County farmers increased their yields between 1850 and 1860 by four pounds of butter and nearly sixteen pounds of cheese per “milch” cow. Such increase in dairy numbers in butter probably spoke as much to the extension, by rail, of the Boston milk-shed into the upper Connecticut Valley by 1860 as to the breeding or acquisition of superior livestock in Orange County. It was in the production of wool, however, that Orange County farmers exhibited a singular prowess in agricultural improvement even as much of the rest of northern New England more rapidly transitioned to dairy production. While the number of sheep residing on Orange County pastures increased a modest 17.66 percent the wool produced from Orange County flocks increased nearly threefold at an impressive 281.37 percent. Orange County wool growers who produced on average a mere 1.15 pounds of wool per sheep in 1850 increased their production to 3.71 pounds per sheep only ten years later. Even as apple cultivation declined Orange County farmers proved innovative dairymen and continued to refine their wool producing skills.

Though Orange and Essex represented the antebellum extremes in apple growing New England a third region in northwestern Vermont points to the complexity of agricultural transition and concurrent local negotiations in apple growing during this
period. As orchard production plummeted across much of north central New England between 1850 and 1860 the production of Chittenden County farmers in Vermont actually increased a modest 32.56 percent (Table 2.7). In the five small townships in neighboring Grand Isle County production decreased 41.68 percent, however, Grand Isle was still ranked second overall for the entire state. Together these two northern counties seemingly bereft of any advantages in geography, infrastructure, or proximity to urban markets, formed the nucleus of the Champlain apple growing belt that would emerge in the decades following the American Civil War. Success such as this on the northern periphery of New England spoke to agricultural transitions and local negotiations in apple growing just as pointedly as Essex County, Massachusetts and Orange County, Vermont in the decades prior to the War for the Union.

The size of Chittenden farms decreased more than their Grand Isle neighbors, and Chittenden farmers more substantially engaged in the production of market garden goods, probably for the local Burlington and Winooski markets. Chittenden farmers maintained hay and wheat yields while substantially increasing oat production. Significantly, the production of corn and potatoes reflected marked decreases that spoke of conscious decisions to engage in apple growing as winter apples needed to be picked, sorted, and barreled just as potato and corn harvests came in. What appeared most dramatic between 1850 and 1860 was the extent to which Chittenden farmers replaced sheep with dairy cows over that ten year period. The average number of sheep per Chittenden farm declined nearly sixty percent even as the number of dairy cows increased from 6.7 to 9.3 per farm during the same period. A shift to dairying was not only an indication of progressive specialization in northern New England; it was also thought by many
Table 2.7 Agriculture Chittenden, Vermont and Grand Isle, Vermont 1850 – 1860

<table>
<thead>
<tr>
<th>County</th>
<th>Chittenden, Vermont</th>
<th>Grande Isle, Vermont</th>
<th>Change 1850 - 1860</th>
</tr>
</thead>
<tbody>
<tr>
<td>Census Year</td>
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<td>1860</td>
<td>1850</td>
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<tr>
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<td>Value Orchard Products</td>
<td>$17.74</td>
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<td>$33.11</td>
</tr>
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<td>Value Market Gardening</td>
<td>$5.72</td>
<td>$6.47</td>
<td>$0.04</td>
</tr>
<tr>
<td>Hay (Tons)</td>
<td>30.1</td>
<td>31.2</td>
<td>20.6</td>
</tr>
<tr>
<td>Wheat (Bushels)</td>
<td>19.1</td>
<td>18.6</td>
<td>92.4</td>
</tr>
<tr>
<td>Corn</td>
<td>104.1</td>
<td>81.3</td>
<td>68.6</td>
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<tr>
<td>Potatoes</td>
<td>200.8</td>
<td>166.4</td>
<td>93.8</td>
</tr>
<tr>
<td>Oats</td>
<td>96.8</td>
<td>158.7</td>
<td>239.0</td>
</tr>
<tr>
<td>Milch Cows</td>
<td>6.7</td>
<td>9.3</td>
<td>4.0</td>
</tr>
<tr>
<td>Butter (Pounds per Cow)</td>
<td>66</td>
<td>77</td>
<td>69</td>
</tr>
<tr>
<td>Cheese (Pounds per Cow)</td>
<td>130.0</td>
<td>114.7</td>
<td>19.8</td>
</tr>
<tr>
<td>Sheep</td>
<td>30.0</td>
<td>12.7</td>
<td>55.9</td>
</tr>
<tr>
<td>Wool (Pounds)</td>
<td>3.2</td>
<td>4.2</td>
<td>3.7</td>
</tr>
</tbody>
</table>

agricultural writers that apple cultivation and dairying were complementary specializations.

Grand Isle farmers made transitions in the decade prior to the War for the Union that differed from their neighbors in Chittenden County and still more from their Connecticut Valley neighbors on the opposite side of the Green Mountains. Most noticeable was a shift away from wool growing and dairying, the staples of agriculture north of Massachusetts. The number of sheep declined 27.73 percent while the number of pounds of wool collected by Grand Isle farmers fell 18.27 percent. The number of dairy cows residing in the five townships increased a modest 12.46 percent; however, the total pounds of butter and cheese produced decreased 8.86 and 44.76 percent respectively. It appeared Grand Isle farmers were moving away from animal husbandry generally as evidenced by a corresponding decline of 18.14 percent in the tons of hay mowed, raked, and taken into Grand Isle barns in 1859.
As in Orange County, Grand Isle farmers proved themselves formidable producers in other agricultural endeavors even as they recorded significant declines in hay and husbandry. The number of farms decreased across the county by 6.08 percent, yet Grand Isle farmers produced increasing yields of oats, corn, potatoes, and buckwheat between 1850 and 1860. Of English grains, only the number of bushels of wheat declined prior to the Civil War and was typical of counties across New England and of the older settled regions of the Hudson and Mohawk valleys in neighboring New York. Among the five townships comprising Grand Isle, the value of orchard products decreased a marked 44.95 percent from $33.11 dollars per farm in 1850; however, the county was second only to neighboring Chittenden in leading Vermont in the average value of orchard products produced at an average of $19.31 per farm in 1860. The two leading counties in Vermont for orchard production per farm were, ironically, two of the northernmost counties in the state.

It was no accident that Chittenden County became the leading orchard producing county in Vermont by 1860 while neighboring Grand Isle managed to maintain second place despite declining dollar values per farm. These two counties had more in common with favored Essex, Massachusetts than with neighboring Orange County, Vermont. Lake Champlain moderated the climate in eastern Chittenden and all of Grand Isle providing these townships with growing seasons nearly as long as those of Essex townships. The Chittenden County city of Burlington, Vermont was one of the largest in the state and provided one of the few true urban markets for Chittenden and Grand Isle growers. By 1850, Burlington infrastructure proved comparable to that found in most cities in Essex, Massachusetts. Two railroads connected Burlington with urban markets in southern New
England while Lake Champlain provided commercial navigation to New York City and, more significantly, markets in Quebec.

This region shared one more commonality with more southerly counties like Essex, Massachusetts in that Burlington and it environs hosted a smaller but equally vibrant horticultural community of progressive agriculturists by 1860. Burlington nurseryman and amateur horticulturist Chauncey Goodrich was by far the most influential. Goodrich published the respected *Northern Fruit Culturist* in 1849 and 1850, helped found the Vermont Horticultural Society, and contributed to many of the Boston agricultural journal until his death in 1855. In neighboring Charlotte, Vermont, Quaker naturalist Cyrus Pringle established a small nursery just prior to the Civil War and upon his return would contribute many articles on improving winter apple varieties in Northern Vermont. Still others like Dr. Hoskins of Newport, Orleans County, Vermont corresponded with Goodrich, members of the Vermont Horticultural Society, and others in Burlington concerning cold resistant winter apple varieties for even the most northerly sections of the state. Farms in both of these counties were fortunate to have access to a small cadre of specialists who established nurseries, tested winter varieties, provided grafts, and served as conduits for disseminating information concerning market apple cultivation.

In Isle La Motte and South Hero Townships, fewer farmers produced a greater proportion of orchard products listed in census returns by 1860 (Table 2.8). Orchard production among all Grand Isle farmers decreased nearly forty-two percent between 1850 and 1860. However, among farmers who reported returns in 1860 those on Isle La Motte only decreased twenty percent while those on South Hero decreased a mere twelve
Table 2.8 Apple Growers South Hero and Isle La Motte Townships 1850 – 1860

<table>
<thead>
<tr>
<th>Township</th>
<th>Isle La Motte 1850</th>
<th>Isle La Motte 1860</th>
<th>Percent Change 1850 – 1860</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Growers</td>
<td>Non-Growers</td>
<td>Growers</td>
</tr>
<tr>
<td>Farms</td>
<td>32</td>
<td>4</td>
<td>13</td>
</tr>
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percent during the same period. There were far fewer farmers returning orchard values in 1860, yet those who remained saw much smaller decreases in production than county level returns might suggest. The difference in numbers of farms in both townships reporting returns from their orchards strongly suggests that there was no gradual decline in production, but rather, a sizable number or growers opted to get out of the business of growing apples. The choices that led farmers to abandon the orchard as a source of profit differed radically between townships and were probably typical of choices faced by yeomen farmers across much of New England.

By 1850, La Motte farmers had seemingly reached the ecological limits of their island township. Statistics for neat cattle and sheep dating back to 1837 suggest overgrazing was commonplace and contemporaries reported considerable soil erosion on the island by 1850. Isle La Motte farmers responded by moving away from sheep and dairy cows between 1850 and 1860. In turn, census figures reveal a renewed commitment to English grains and other tillage of silage crops like corn and potatoes. Isla La Motte farmers apparently replaced their pasturage with till and devoted more of their agricultural endeavors to producing crops for human consumption or for supporting dairying and wool growing in neighboring townships.

The number of La Motte farmers producing orchard products decreased nearly sixty percent and those who remained had farm sizes averaging thirty acres more than their non-orchard producing neighbors. Apple growers produced yields of hay, wheat, corn, and potatoes that were roughly comparable with non-orchard producing farmers. Orchard producers, however, produced more sizable yields of oats, a late summer grain that could be harvested prior to winter apples in early fall. Apple growers decreased their
numbers of sheep and dairy cows as reported in 1850 and had fewer of both than their non-apple growing neighbors in 1860. However, apple growers produced greater yields of wool and butter from smaller numbers of livestock suggesting a commitment to progressive agriculture that would keep them producing market apples as well. Orchard producers reported increased yields in maple sugar production suggesting a predisposition for arboricultural or that these farms may have had natural environmental advantages, as woodlots were generally located on the township’s north-south ridge providing good air drainage and sheltered orchard sites.

South Hero apple growers like their Isle La Motte neighbors worked farms that averaged thirty or more acres than non-apple growers. Apple growers produced more wheat, corn, oats, and potatoes in 1860 and recorded hay yields slightly larger than non-apple growing neighbors but that had declined considerably since 1850. Both growers and non-growers increased their sheep and dairy herds between 1850 and 1860, however, apple growers emphasized sheep while non-growers invested in dairy cows. Interestingly, apple growers had larger sheep and dairy herds while yields of both wool and butter per animal were smaller than their non-apple growing neighbors. Maple sugar production declined among both apple growers and non-growers, though orchard producers posted greater declines overall. As with their Isle La Motte neighbors, farm size and commitment to improvements in animal husbandry appeared to create the most systematic divides between apple growers and non-apple growers.

The experience of Isle La Motte and South Hero apple growers between 1850 and 1860 suggests that, in spite of the rhetoric of agricultural writers, there was no single favored, or easy path by which farmers might transition to become market apple
producers in antebellum New England. Farmers who continued producing value from their orchards in 1860 generally had farms that were larger than their non-apple growing neighbors by thirty or more acres. Isle La Motte farmers showed evidence of intensive agricultural transition in both animal husbandry and arboriculture. They maintained their orchards while getting greater yields of wool and butter from smaller herds of sheep and dairy cows. Conversely, South Hero apple growers could not expand their dairy and sheep herds, continue to produce from their orchards, and increase yields of wool and butter simultaneously. Most significantly, in both townships, the number of farmers not recording any value from their orchards increased over one hundred and three hundred percent respectively while the decrease in average value of orchard products per producing farm was only twelve and ten percent. These figures suggest that apple trees did not disappear from Grand Isle townships farm between 1850 and 1860, but that a majority of farmers reached a point where their orchards would not pay to be harvested in the context of other seasonal agricultural and labor patterns. Agricultural writers and horticulturists like Robert Downing, Robert Manning, and Chauncey Goodrich could not perceive, or refused to acknowledge, the finite boundaries of labor, capital, environment, and ecology the great majority of New England farmers must have needed to negotiate by 1860.

In 1856, for example, Goodrich implored his neighbors in townships like Isle La Motte and South Hero to set grafted orchards of winter apples as they would be the most profitable part of the farm and required the least amount of labor. Goodrich earnestly believed that “no other article grown pays one-half the profit to the farmer as good varieties of apples” and that “an acre (of apple trees) produces more value than any other
crop, and with less labor.” His own tribulations in improving a gangly cider orchard of mixed native and grafted trees betrayed his own words, however. In an article for the *New England Farmer* in 1856 Goodrich recounted in detail the formidable amount of attention his orchard required to return it to a profitable and bearing condition.

The first spring after taking possession of the orchard Goodrich provided better drainage and hauled fifty cartloads of course manure. Each load cost him a dollar making for an investment of more capital into his orchard then most neighboring farmers would receive in dollar value from their producing orchards in one to three years. He applied nearly two hundred bushels of refuse lime and had a hired man cultivate the ground around the roots of each tree. The following summer Goodrich employed two men to trim the remaining trees and remove all the dead and damaged wood. At this point in the second year of renovation six of the remaining apple trees were so decayed internally as to need to be shored up with “heavy posts” to keep from collapsing when they did start to grow again. The year after this Goodrich commenced grafting winter varieties and every year following he mulched the orchard ground with “long stable manure” consisting of “straw or swamp hay” used for bedding horses and cows, and mowed the orchard as often as necessary. At some point Goodrich set and grafted trees to fill in the void spaces in his orchard left by the trees missing from the orchard when his first purchased the property. After concluding this discourse upon the extensive labor and capital need to bring a Vermont apple orchard back from its “near worthless state,” Goodrich confidently confided to his readers that “this may look like too much work,” but for those who persevered “after fifteen years experience he will find a balance of profit equal to any other part of his farm and probably much greater.”
Goodrich’s orchard was typical of many, perhaps most, across New England by the late 1840s. His orchard comprised a patchwork of old neglected trees, some native, some grafted, and still others missing entirely from want of attention, disease, winter kill, or requisitioned as firewood by former tenants. Indeed, the only thing exceptional about the orchard land Goodrich inherited in that far off region of northern Vermont was that its slope and proximity to Lake Champlain made it more productive than most in the region. His Burlington town lot was approximately one mile from Lake Champlain and 250 feet above the surface of the lake on a westerly slope. In spite of such advantages refurbishing the orchard was an uncertain affair requiring considerable time, labor, capital and not a little good fortune that his grafts would take and his trees mature before another of Northern New England’s inevitable tree killing winters.49

The ease with which Goodrich perceived apple growing as an egalitarian affair proved indicative of the unrealistic worldviews of most agricultural writers and horticulturists. Like Goodrich they were men of better than average means and living near growing urban centers which offered ample markets allowing them to abandon other agricultural pursuits entirely. Even as Goodrich implored his neighbors to improve the profitability of their orchards in 1851, 250 of his 370 acre Burlington estate remained listed as “unimproved” the preceding year. In 1850 Goodrich reported sizable yields of Rye, Corn, and Potatoes, but only fifty bushels of oats and a mere three tons of hay from his ample acreage. Such small hay yields proved adequate, for he reported no sheep, only five cattle, and just 3 “milch” cows producing a modest 100 pounds of butter for the year. Goodrich found measured success in his orchard-lot by abandoning wool and dairy the very foundations of agricultural specialization in northern New England. Such was the
worldview of horticulturists like Chauncey Goodrich that they could deride their neighbors for their gangly orchards and be seemingly oblivious to their own shortcomings in progressive agricultural practices in upland English hay and animal husbandry.50

Men like Chauncey Goodrich, Jedediah Harris or their Essex contemporaries were a relatively fortunate few. For most New England yeomen, apple growing was not about agricultural progress or moral improvement just as inaction was not a form of rural recalcitrance toward the increasingly privileged nature of scientific agricultural. Decisions about apple cultivation were very calculated ones, thoughtful in nature and mindful of myriad social, environmental, and economic changes sweeping across antebellum New England. The ecological, social, and economic tensions of apple growing in antebellum New England were such that few yeomen cultivated apples even as progressive agriculturists touted their material and cultural value. As the census returns of Jedediah Harris’ silent hill country brethren or Chauncey Goodrich’s forgotten Champlain island neighbors elucidate, many ordinary New England farmers were not just producing less from their orchards by 1860, rather a sizable majority of farmers simply opted not to produce any apples form their fathers’ orchards at all for sale in emergent extra-local markets.
NOTES

20 The Diary of Jedediah Harris, Vermont Historical Society, Montpelier, VT, 15 October 1853.

21 Harris Diary, 26-27 April, 5 June, 1853. The description of Strafford in the 1850s comes from the following sources. Zadock Thompson, History of Vermont, Natural, Civil, and Statistical, in Three Parts (Burlington, VT: Published for the Author by Chauncey Goodrich, 1842), 166-167; Hamilton Child Gazetteer of Orange County Vermont 1888 (Syracuse, NY: The Journal Office, 1888), 33; H.F. Walling, Map of the Village of Strafford, Orange County Vermont (New York: Baker & Tilden 1858).


23 For discussion of Harris as a prominent Orange County merchant and Vermont politician see A.M. Hemmingway, The Vermont Historical Gazetteer: A Magazine Embracing Each Town, Civil, Ecclesiastical, Biographical and Military, Volume II (Burlington, VT: Published by Miss A.M. Hemmingway, 1871), 1,071-1,072; E.P. Walton, Records of the Governor and Council of the State of Vermont, Volume VII Montpelier, VT: Steam Press of J. & J.M. Poland, 1879), 299-300.

24 The Dow farm was probably located among kin on equally valuable bottom land along the Ompompanoosuc River in the post village of South Strafford approximately two miles form the Harris Farm. In 1850 Dow also produced the forth largest income from his orchard in Strafford at sixty dollars, just behind Harris, Wood, and McMaster.


28 The numbers cited for a tentative probability of the number of bushels of cider apples produced by New England farmers was arrived at by taking local tax valuations and statistics compiled by scholars such as Robert Gross and Daniel Jones which suggested farmers produced from 3 – 12 barrels of cider on average and then multiplying those numbers by 8-10 which was the commonly cited number of bushels both farmers and agricultural writers reported as necessary for the production of one barrel of cider.

29 The state of New York produced two excellent agricultural censuses in 1855 and 1865. Census collectors counted the number of bushels of apples and barrels of cider (1855) and the number of apple trees, bushels of apples, and barrels of cider (1865). Together these records constitute the best statistical data concerning apple growing in the antebellum northeast. Unfortunately these records were of little use in the context of this study. Eastern New York townships in the Hudson and Mohawk River Valleys experienced agricultural transitions similar to those found in New England, however, cider production for New York farmers held little of the cultural resonance found in New England and most New York townships experienced changes more in line with Midwestern states than with neighboring state comprising New England. For enumerated versions of this data for comparison see Franklin B. Hough, ed., *Census of the State of New York, 1855* (Albany, NY: Charles Van Benthurysen, 1857).
Both Connecticut and Massachusetts published reports on industry and agriculture in 1845 that recorded both township and county statistics for the number of bushels of fruit produced. Neither state made distinctions between differing kinds of fruit. Both states neglected asking for information on cider making, however, a number of townships in Massachusetts and Connecticut made returns for cider, cider vinegar, and cider-brandy; Daniel P. Tyler, *Statistics of the Condition and Products of Certain Branches of Industry for the Year Ending October 1, 1843* (Hartford, CT: John Boswell, 1846), 9-187; John G. Palfrey, *Statistics of the Condition and Products of Certain Branches of Industry In Massachusetts for the Year Ending April 1, 1845* (Boston, MA: Dutton and Wentworth State Printers, 1846), 37-313.

Many agricultural historians concede that the returns for the 1840 agricultural census were probably underreported in many areas. The U.S. census did not record or enumerate the type or number of fruit trees on farms until the agricultural census of 1890. In the Non-Population Census Returns for Agricultural for 1880 enumerators did collect statistics for the number of acres of orchard, the number of trees, and the value of orchard production for peach and apple trees, however, these numbers were never published and only appeared in the original township returns under each individual farmer.

These figures do not include those enumerated by the Massachusetts Census of 1855 for the County of Nantucket as 100 percent (all six fruit trees on the island) were apparently pear trees.


Average value of orchard products per farmer would have decreased by 52.61 percent between 1850 and 1860 if not for the inclusion of Windham County, Vermont, the only river county to post a gain (80.14 percent) during the same period.
These gains in value of orchard products per farm ranged from a modest 1.7 percent in Kennebunk County, Maine to an impressive 588.12 percent increase for Litchfield County, Connecticut.


Francis DeWitt, Abstract of the Census of the Commonwealth of Massachusetts, 1855 (Boston: William White, Printer to the State, 1857), 206-207; Newbury Township reported a loss of 66.70 percent but was not considered in the total as much of the township was annexed to Newburyport 17 April 1851. Similarly, townships which were newly incorporated and enumerated for the first time were not included in the list of townships with a greater than 10 percent increase nor were existing townships like Newburyport which benefited from annexation of land from neighboring townships; for populations statistics for southern New England see Percy Wells Bidwell, “Population Growth in Southern New England 1810-1860,” American Statistical Association, n.s., 15 (December 1917): 837-838.


For railroad connections in Essex County in 1850 see Samuel Augustus Mitchell, Map of Massachusetts and Rhode Island (Philadelphia, PA: S. A. Mitchell, 1850).


These numbers were gathered from figures taken from the enumerated U.S. census figures for Orange County, Vermont for 1850 and 1860.


Chauncey Goodrich, “How to Treat an Old Orchard,” *New England Farmer* 8, no. 6 (June 1856): 253.

For the U.S. Non-Population Agricultural Census Schedules for Burlington Township, Vermont 1850 see The Manuscript Schedules, Burlington, Vermont, U.S. Census of Agriculture 1850, Vermont Division of Public Records, microfilm.
CHAPTER III

CIDER TREES AND WINTER APPLES

Few crops on the early mid-nineteenth-century farm were more governed by traditional seasonal cycles of rural labor than the propagation of the apple tree. Labor proved such a precious resource among nineteenth-century New England farmers that it was a resource to be carefully husbanded, and administered for maximum effect. Only the mowing of summer English grasses and collection of manure might be more carefully managed, and each required much of a farmer’s precious labor resources in their own right. In such an agricultural regime, the cider tree was particularly well suited for maximizing the limited labor resources of the northeastern farmer. Cider apples need not be perfectly ripe, nor did they need to be picked off the tree blemish free like their winter or market apple counterparts. The prospective cider-making farmer could, when he thought the time most convenient, gather his cider apples from the ground at any time between August and October when opportunity rose between the reaping and harvesting of late summer and fall crops. Furthermore, he might make his cider during a respite from other late summer early fall agricultural endeavors or, like most of his New England neighbors, he could wait until late fall or even early winter when his harvests were in his cellar or put up in his barns. For many agrarians, cider trees and cider making
seemingly fitted harmoniously with seasonal variations in crops and the very real labor limitations encountered in nineteenth century New England.  

When agricultural reformers, and journals like the *New England Farmer* and *Albany Plowboy*, began seriously pushing for the setting and grafting of “winter” or “market” apples in the 1820s and 1830s, they inadvertently threatened traditional seasons of work and labor. The New England cider tree was independent, resourceful, and thrifty in its yearly labor interactions with the farmer while the “market” or “winter” apple asked much of the valuable labor resources of the orchardist. Much to the rural farmer’s chagrin such attention, seemingly more seasons than not, went unrequited in terms of the fall apple harvest. Care of grafted trees translated to expenditure of labor on the nineteenth century farm, and such trees required much attention in terms of grafting and trimming in the early spring or late fall-early winter season. More disconcerting was that the harvesting of market apples required they be picked from the tree, thus impinging upon valuable labor resources. Attention to the ripening and physical condition of market apples similarly meant that farmers would be required to pick such apples as they invariably became ripe at the height of the potato and corn harvesting season. By an unhappy agricultural coincidence market apples came to season just as New England farmers were transitioning from late summer English grain crops like wheat, rye, and oats, to fall crops like corn and potatoes. Such confluence of agricultural work would invariably have equally unhappy reverberations on seasons of harvest and rhythms of labor for many a New England farmer.  

While agricultural reformers might well have believed the setting of new grafted orchards represented the next logical step toward rural improvement, such actions by
rural smallholders invariably entailed dramatic shifts in seasonal work and labor obligation. Grafted orchards of Hubbardston Nonesuch, Esopus Spitzenburgs, Swaar, and Baldwin apples, for example, invariably added new seasons of work in spring. An orchard awash in Northern Spy, Rhode Island Greenings, Roxbury Russets, and Westfield Seek-no-Furthers invariably created disruptions during the fall harvest season as well. Farmers could not let winter apples fall to the ground and gather them there but had to collect them at once from the tree, even as their corn and potato crops came in. While the collapse of the cider industry in the third decade of the nineteenth century led to markedly little disruption in rhythms of labor for most farmers, transitioning to the kinds of grafted orchards advocated by progressive agriculturists could produce chaos on the nineteenth-century farm.

Invariably, the enthusiasm with which nineteen-century farmers embraced agricultural progress in the apple orchard often determined the corresponding degree and tenacity of such disruption. How farmers reacted to such transitions from cider trees to grafted apples, as advocated by the agricultural press, might speak volumes about why farmers may have seemed (to progressive agriculturists at least) so recalcitrant in changing their traditional apple growing practices. Similarly, changing cycles of seasonal labor in the orchard might speak volumes about farmers’ views toward book farming and agricultural reform, and why such resistance toward what reformers ostensibly deemed progress, might instead be thought of as rural protest to new agricultural regimes which might substantially and methodically disrupt traditional seasons of labor and rhythms of work for the nineteenth century smallholder.
To understand the potential seasonal disruption which might emanate from agricultural progress in the orchard one must first place apple culture into the larger seasonal cycles of the nineteenth-century farmer’s agricultural regime. Spring, it would seem, would be a time to let the apple tree to its own devices, and perhaps this was so in the colonial era when the cider tree reigned ascendant. However, on the nineteenth-century farm, labor in the orchard had its place among the more mundane patterns of plowing, harrowing, hilling, dunging, and finally planting. As the table or “winter” apple increasingly became the main locus of the farmer’s orchard endeavors in the 1830s and 1840s, setting, trimming, and grafting became as important to apple growing as hoeing and weeding tillage crops like potatoes, pole beans, and corn. Therefore the nineteenth-century apple grower—having committed to replacing his cider trees with Esopas Spitzenburgs, Roxbury Russets, and Baldwins—found he must increase his work load, and change his labor patterns in March, April, and May accordingly.\textsuperscript{53}

As winter snows passed from his upland and meadow, farmers devoted several days in March and April to trimming their apple trees just as the spring thawing of their till fields called for them to break and harrow for the coming spring. April and May became a time for grafting at whatever point farmers were reasonably sure the worst of the spring killing frosts had receding north into Vermont, New Hampshire, and the highlands of upstate New York. Grafting could substantially alter traditional patterns of spring planting and preparation and disrupt seasonal rhythms of labor accordingly. Mid to late May was the time for pest control in such cycles and dealing with the depredations of the borers and dispatching the caterpillars were both labor-intensive activities which could, and occasional did, occupy the farmer’s attention into early June. Looking back
over three decades between 1820 and 1850, however, pest control seemed to have been the least palatable of the many new labor regimes that nineteenth century-apple growers found themselves obligated to adopt. It would not be unfair to suggest that many farmers ventured into their orchards after seasons of such neglect only to find themselves with a healthy crop of caterpillars and only a handful of knurled and twisted winter apples.\(^{54}\)

June was largely a time of hoeing, weeding, and replanting if necessary, and the apple orchard only figured into such work when farmers devoted their orchards to the tillage of potatoes, beans, corn, or similar crops. Farmers devoted most, if not all, of July and August to haying, by far the most strenuous and most involved single labor activity on the nineteenth-century farm.\(^{55}\) The apple orchard only played an ancillary role in this process as farmers usually devoted one or two days to mowing orchards that were not in tillage. The grasses found in most orchard lots in the first decades of the nineteenth century tended to fall somewhere in between the fine English grasses of upland meadow lots and the coarser native grasses of the New England’s river meadows and salt marshes. Farmers whom took advantage of such opportunity to avail themselves of another ton or two of hay from the grasses in their orchards generally described them of mixed quality and would most often mow them after the more valuable upland English was gathered but before they turned their attention to their river meadow lots.\(^{56}\)

The reaping and gathering of small grains usually followed haying, and, in turn the gathering of these English grains often overlapped with the cutting of cornstalks, which for many farmers marked the transition from the summer to the fall harvest season. Apple picking was by all accounts a fall activity although many farmers usually had a small number of summer apples, which ripened as early as the first week of August.
Although picking summer apples conflicted with more pressing issues like cradling, raking, and gathering English grains, and in some instances even with the gathering and carting in the last of the meadow and salt marsh grasses of the haying season, they were of such little account on the typical nineteenth-century farm so as to cause little interruption in the rhythms of work of the late summer season.\textsuperscript{57}

Fall was orchard season, and apples shared the months of September and October with that of gathering corn and potatoes, and on many farms apple gathering took on peripheral importance to the latter two. While corn and apples vied for the attention of the farmer and his laborers with equal tenacity for nearly two centuries, potatoes were a relatively new and formidable addition to the fall harvesting regime. Corn proved ubiquitous, as ever, to the fall harvest season of New England and New York farmers, yet pink-eyes, blue, round and long red potatoes gradually usurped the place of flax, buckwheat, and barley in the farmer’s fall harvest patterns pushing those crops, when they were grown at all, back into the late summer months. As corn and potatoes emerged as the predominant agricultural staples (after haying and dairying of course) in the first decades of the nineteenth century managing the labor cycles of apple picking, digging potatoes, gathering stalks, and husking corn—all three of which came to perfection within mere days of one another—was arguably the most challenging three to five weeks of the farmer’s year.\textsuperscript{58}

November was the time of the cider press, and while other tasks such as plowing, furrowing, threshing oats, peas, and barley, sowing and planting winter rye and winter wheat called November their own as well, farmers could approach such tasks more pragmatically as all his roots and grains were in the barn and cellar for the coming winter
months. If autumn put the most stress on rhythms of labor and work on nineteenth-century farms, cider making often created the most intricate labor patterns of the farmer’s year. Most farmers through the early 1830s made cider, yet few owned the means to make it. For every barrel of cider produced, most farmers needed to negotiate with the men who picked his cider apples. Then they were obligated to contract for time and use of a local cider mill as well as the laborers who would grind their apples and press the pomace. They may have needed to barter with their neighbors who made or hooped their barrels, and often had to arrange the transportation of their apples to the mill and to bring the barrels back to their own cellars. Cider making then, truly, created some of the most intricate labor patterns and social negotiations on the nineteenth century farm. These were intricate labor patterns, however, that took place after the labor intensive interactions of the autumn harvest season\textsuperscript{59}

Such a view of farm labor of course is overly simplistic. In an admitted zeal to place the changing work and labor patterns of the apple orchard into the more general context of nineteenth-century New England agriculture, one must focus on the relationship between apple trees, mowing grasses, English grains, and root crops, at the expense of other, seasonal cycles of the farm. April and May, for example were also the time for manure management. Every spring farmers would take their carts, trudge down to their meadow ditches for mud, or up to their stalls and hog pens for manure, to rivers and bays for seaweed and fish, and perhaps even to cities like Boston or New Haven whose citizens always seemed to be hip-deep in the precious commodity. Once their carts were full they would begin the repetitive and labor intensive process of delivering the soil affirming material to their till fields, gardens, upland English hay fields, and perhaps even
to their orchards. Manuring almost always followed or preceded the mending of fences, the removal of “rockweed” upturned in pastures and till fields by spring frost, and the application of said material in the construction of more substantial, and winter resistant, stone walls.60

The mending of fences set the stage for the final component of the nineteenth-century farm to manifest itself in the form of husbandry. Secure in the steadfastness of their fences farmers let their livestock into upland pastures, usually as early in April, as most farmers, rather shrewdly, kept just enough hay on hand to get their cattle to the spring grasses. A few days in May and June were also devoted, by those farmers who still had such animals, to washing and shearing sheep. For the typical farmer the end of hay season in late August conveniently corresponded with the “burning up” or “wasting out” of upland pastures from some combination of drought, the hot summer sun, and overgrazing by the farmer’s stock. Though we traditionally think of farmers going after the “aftermath” or “rowen” as the term most apt to be used in New England for the mowing of the same ground the second time, most farmers let their livestock do the work for them. As their upland pasture burned out in late summer, farmers frequently moved their livestock from mowing lot to mowing lot and even into the orchard, to eat the rowen rather than go through the extensive process of mowing, raking, cocking, and bringing the aftermath to their animals.61

November and December were indeed the time for cider making, however they were also the months for turning woodlots to cord wood and shingles, and livestock into hides and hams as well. Like cider making, the processing of animals usually lasted a handful of days. Chopping wood, however—for domestic use as well as for sale in
Boston, Hartford, and growing mill towns—occupied much of the remainder of the farmer’s time from December through February. Though the above overview illuminates the most regular seasons of work and labor on the nineteenth century farm, it does not even touch on the myriad domestic manufactures playing out within the farmhouse walls, nor is it meant to suggest, especially in patterns of apple propagation, there was not substantial geographic or cultural variations to these rhythms of work and labor.62

About the only true constant in the yearly labor cycles of nineteenth-century apple growers was in harvesting and cider making. Farmers gathered their apples at some point between August and November, but most likely in September or October. Likewise, farmers pressed their cider apples anywhere from August to December, but most usually from late October to early December. Even these time frames still cover almost half the growing season and nearly a third of the calendar year. The other varied tasks of apple growing, most notably the ones of care and attendance, were even more subject to seasonal variation as they gained favor with the push toward growing winter or table apples in the 1830s and 1840s. Trimming and pruning tended to be in the spring and less generally in the fall, but one can find an instance of “pruning,” “trimming,” “chopping limbs” and such in every month of the calendar year. Farmers generally grafted in spring, sometimes too early and sometimes too late. However, through tradition, experiment, accident, or ignorance, one can find instances of grafting almost any season of the year. By examining the rhythms of apples growing in the large context of labor regimes and agro-ecological cycles we can perhaps take away a better appreciation for how dramatically the demise of the cider tree and the rise of the winter apple affected the
intricate interaction between labor and agriculture cycles in the rural sections of the northeastern states of the Union in the 1830s and 1840s.⁶³

Spring care and maintenance of apple trees and orchards came to most farmers in the 1830s and 1840s in direct correlation with the transformation of old cider trees into new grafted orchards meant to produce table apples for growing urban markets. This new way of culture inevitably resulted in increased labor and farmers first saw such trends in March and April, prior to their spring plowing and sowing obligations. Though agricultural reformers and pundits for the temperance cause were quick to point at the labor saving virtues of abandoning one’s cider trees, they were equally apt to downplay, or outright ignore, the increased care and labor that accompanied the new grafted orchards of agricultural reform. A more thoughtful look at changing cycles of seasonal work and labor negotiation in reference to the apple tree will quickly illuminate how such transformations attended the end of the era of the cider tree and the ascendancy of the Baldwin apple, and show why many farmers were so reluctant to embrace such change. Farmers were not tied to the traditions of their fathers and recalcitrant toward progress, rather they sought to avoid agricultural transitions that could seriously impair more pressing labor interactions and agricultural cycles on their nineteenth-century farms.⁶⁴

The two hundred year reign of the New England cider tree was born of the rather peculiar New World disparity between work and labor. There was little doubt New England’s first sons and daughters preferred beer, yet to produce a barrel of beer asked much of the limited labor resources of New England’s first generation. After finding suitable locations for hops and barely, no small task on New England’s thin soils, prospective colonial beer makers had to plough, harrow, sow, and eventually reap, cradle
and gather their barley, while also planting, weeding, poling and gathering hops. Both crops had to be protected from roaming bands of New England’s free ranging livestock. The beauty of the cider tree, which reigned unchallenged on New England farms from the second half of the seventeenth century to the 1820s was that it required precious little labor and attention from farmers, often hard pressed to clear till fields, provide fencing, and improving their coarse meadows and provide a comfortable subsistence for their families. Cider trees required such little labor that their propagation quickly produced a change in colonial English beverage consumption from beer to cider, a change which would characterize New England and the places New Englanders went in Upstate New York and Eastern Ohio well into the 1820s.

In a world dominated by the cider tree, words such as “trimming,” “setting,” and “grafting” were seldom part of the great majority of farmers’ vocabulary. However, the 1830s and 1840s fast became the era of the Baldwin, Newton Greening, Nonesuch, and Seek-no-Further, and the propagation of such table apples presaged a dramatic transformation in the language of apple growing. This language was built, in large part, by the added cycles of labor required for growing such apples, which were added to the nineteenth-century farmer’s substantial calendar of seasonal obligations. Setting, trimming, grafting, and budding were, to varying degrees, part of the farmer’s lexicon prior to the 1830s. For farmers who engaged in such activities they were most often marked in cycles of years, rather than in annual seasonal cycles.

For the typical nineteenth-century farmer, trimming most certainly was the most recognizable of these new rhythms of labor, which invariably accompanied the propagation of the table apple. Generally cider trees received little attention, however,
every farmer had at least one seedling cider tree that also produced tolerably palatable winter apples, or perhaps even had a tree or two of grafted varieties in his dooryard, orchard, or pasture for family use, and these trees would at times be accorded some pruning and trimming. A lucky tree might see careful calculated attention on a yearly basis. More commonly, early pruning was a more sporadic affair practiced perhaps only a handful of seasons in the long life of the apple tree, and farmers were just as apt to dispatch branches deemed superfluous with the hatchet or wood yard axe as a pair of pruning shears. This appalled agricultural reformers who often derided their rural brethren in the press for accosting their trees with any instrument big enough to bring down a white pine or rock-wood maple in the name of trimming.

Setting out and trimming trees became reluctantly embraced by farmers committed to growing market apples only in the 1830s and 1840s. Such orchard care naturally fell into seasonal cycles less taxing on labor for the farmer, and two seasonal rhythms gradually developed. The first was preferred by most farmers and occupied that time as weather permitted in March and April. It preceded, as much as possible, spring obligations of plowing, harrowing, sowing, and planting, which usually commenced between the second and last week of April. This time was rather fortuitous for looking after apples trees as this was a period of drawing rocks from seasonal upheaval, mending fences, hauling manure and gleaning drift wood and debris from river meadows and plain tillage. These activities took the farmer across much of his lands where he might work on scattered apple trees as he engaged in other more pressing duties which brought him to his upland pastures or course grass meadow for the first time that spring.
Not surprisingly, the other period of trimming farmers chose among their other seasonal obligations was sometimes in late October, but generally in November when time sensitive fall crops were already in the barn or cellar. Though this season was generally secondary for most farmers for such work in preference for spring, agricultural reformers often thought late fall proved better for the tree, as the sap was running out of the tree toward winter rather than into the tree as in spring. It was thought by some that his bleeding of the tree in spring caused rot and encouraged disease. Despite these arguments, most farmers preferred spring, as the end of harvest in October did not bring an end to work. While there was no longer the time sensitivity that came with harvesting, November was still a time for processing the raw staples of the till fields. Corn needed to be husked, stalks laid up, and English grains needed to be shocked and thrashed. Trimming it seems, was in the end a matter of labor rather than what may or may not have been best for the tree, and on this account, early spring emerged as the preeminent of the two periods for the cleaning and trimming orchards.68

Much like trimming, the manuring of apple trees could take place any season at the farmer’s discretion but most consistently was an early spring or early winter affair. If trimming was a seldom-practiced art by most farmers prior to the 1830s, using a precious resource like manure to increase the output of thrifty cider trees was almost unheard of. Manuring apple trees in any capacity did not develop as a seasonal cycle until the introduction of market apples made such practice appear worthwhile. As earlier noted, such actions often had interesting agro-ecological repercussions. Unlike trimming, the choice of season offered no advantage or entailed no potential harm to the apple tree. Therefore, placing manure “round apple trees” was more dependent upon the farmer’s
tillage cycles as anything else. Farmers tended to draw their manure either in April and May, in preparation for planting, or in late October and November in preparation for the sowing of winter grains or the breaking up of fallow lands to be placed back into rotation the following spring. Drawing manure was a labor intensive exercise and it appears apple trees, when manured, were almost always looked to when farmers manured their till fields.  

Grafting and setting trees were perhaps the only two of these new seasonal cycles which did not develop into an activity conducted across several seasons. One can find examples of farmers—through experimentation or (more often) spectacularly bad foresight—grafting in other seasons; but for the vast majority of farmers such endeavors were a spring affair. Setting apple trees came about concurrently with the end of the cider tree, which was most often propagated by seed. Grafting entailed the use of stock trees, which were initially set in nurseries, and then moved to the orchard site after the farmer was convinced of the vitality of the tree. Grafting was done either in the nursery or after the host tree has been set at its permanent location. All this was done in spring as the whole business was generally traumatic to the tree and ensuring the warmest months were still ahead increased the odds the newly set and grafted apple tree would survive the winter.

Farmers grafted old cider trees or re-grafted trees with obsolete varieties with newer more popular kinds of winter apples. As with grafting set trees, grafting or “top grafting” old trees and orchards was accomplished in the spring as well and generally for the same reasons. Grafting required a certainly ecological knowledge not required of farmers for trimming and manuring. Grafting required that farmers who lacked the
requisite skills to hire outside labor for one or more days in April or May depending upon
the number of scions to be grafted. Initial interactions with these itinerant grafters often
provoked much distrust and anxiety from local farmers, and it appears that after
knowledge of grafting spread sufficiently, farmers almost always went with a trusted
friend or recommended acquaintance to do his grafting after the 1830s. For a typical
farmer, the cost of grafting in labor may have been a handful of days over the course of
several years. Dramatic transitions from cider to table or winter apple production could,
however, cause marked shifts in seasonal rhythms and labor negotiations on nineteenth-
century farms. 72

Winter apples on the tree did the average farmer precious little good until they
made their way to the cellar, cider barrel, or storekeeper’s shelves. Furthermore, the
words and actions recorded in the diaries and daybooks of eighteenth and early
nineteenth century farmers strongly suggest that the majority of farmers seldom picked
their apples from the tree. Prior to 1830 when cider was the main reason for keeping
pasture apples, kitchen trees, or home lot orchards, farmers’ diaries were replete with
references to gathering, picking up, or going after windfall apples. Keeping in mind that
cider apples did not need to have a pleasing appearance, and damage from falling was a
condition of equally little concern as such apples were to be squeezed or ground up
anyway, gathering fallen apples rather then picking them from the tree made much sense
in conjunction with other seasonal responsibilities of September and October. Cider
apples on the ground were not time sensitive, in the way that getting in other crops like
corn and potatoes were. Farmers could, and regularly did, use apples that had deteriorated
quite extensively for their cider. This flexibility with “harvesting” the cider apple kept the
farmer from having to go after the apple on the tree, and gave the farmer the flexibility to gather such apples at times which were in more convenient relations with getting in his other main fall crops.\textsuperscript{73}

The absence of any mention of the one tool necessary for picking apples, namely the picking ladder, adds credence to the theory the late eighteenth and early nineteenth century farmers seldom actually picked their apples off their trees. Farmers’ diaries abound with mundane references to the other tools of agriculture such as carts, draft animals, seed, and scythes, yet no mention is made of ladders. As described in Chapter 4, many farmers’ trees where scattered across many lots on their property and surely the act of dragging cumbersome ladders from cider tree to cider tree across the breadth of an individual’s farm would have warranted a passing line in the daybook just as frequent mention was made of finding wagons to cart the apple harvest from the fields. In fact, the only troublesome counterpart to this observation is that there is precious little mention of the use of ladders in grafting, however, one must remember that, despite calls from the agricultural press, few farmers attempted to regraft the knurled sprawling tops of their ancient cider trees. This is not to say that such farmers never picked their apples off the branch. The famous proprietor of the original Roxbury Russet was said to have been killed from a fall from a ladder while picking apples in his Roxbury, Massachusetts orchard. What such evidence really suggests is that, prior to the decline of the cider tree, the average farmer probably collected most of his cider apples by gathering them up as they fell from the tree, and that winter apples for personal use and cider apples within arms reach were indeed picked from his trees at opportune times between more pressing cycles of gathering corn and digging potatoes during the fall harvest.\textsuperscript{74}
Another more seemingly inappropriate means of gathering the season’s apple harvest lends further credence that the average farmer was seldom inclined to climb into his cider trees. The act of shaking apple trees appears sporadically in farmers’ diaries and other correspondence well into the 1860s. While gentleman farmers and advocates of agricultural reform no doubt found this to be the most appalling of actions (short of chopping down the tree of course) the act itself probably was not as destructive as the name may imply. New England cider trees were a very hardy, very large lot, and shaking trees probably referred to the shaking, one might even say gentle rocking, of heavily laden lower branches, where many apples would have fallen just from the act of picking its neighbors off the branch anyway. Again, whether the apple was bruised or damaged was immaterial to the cider maker, so shaking the tree provided a quick means of gathering fresh cider apples when the farmer felt inclined to harvest them, and windfalls were few and far between. It is highly unlikely that shaking apple trees remained a viable option for gathering apples after farmers switched from cider to market varieties as bruising, blemishing, and other superficial esthetic damage invariably occurred.75

What all of this meant for most farmers prior to the transition from cider making to market apple production was that gathering cider apples during the fall season only nominally disrupted the gathering of corn, dig, of potatoes, and the late fall feeding of cattle and other stock on rowen, all activities which provided the average farmer a much more substantial percentage of his income than the cider barrel. By taking advantage of windfall apples and the propensity for ripe apples to fall from the tree farmers could gather their crop in such a way as to minimize interaction with cutting stocks, shocking and husking corn, digging and carting potatoes. Furthermore, picking
cider apples off the ground cost less time in labor hours of hired hands than picking them from the tree, and it also required much less knowledge by the hired hand as well. All apples were good cider apples regardless of insect damage, size, ripeness, blemishes or damage. Indeed the cider tree fit comfortably into the farmer’s seasonal rhythms. The market tree, however - one which produced Baldwins and Greenings rather than the twisted apples of his forefathers - was another matter entirely.

As for bringing in the equally important fall potato harvest, there is much stronger evidence to suggest a regional New England proclivity to try and get the apple harvest in before gathering the potato crop. As Medford, Massachusetts farmer Peter Chardon Brooks recorded in 1835, “better always to, I believe, to gather orchard before digging potatoes- say last of September or 1 October.” Albert Mason, of New Hampshire, espoused a similar philosophy as to the corn and apple harvest as well. New Hampshire neighbor Samuel Dresser noted that he, “Finished digging our Potatoes about half crop finished the apples before this enough to make more than we ever made before.” Massachusetts farmer David Greenough never spoke directly to the issue of picking apples prior to digging potatoes, however, his farm diary recorded that he annually began digging potatoes within a day of getting in his apples.

The transition to market or winter apples fundamentally transformed labor interactions in the orchard and among neighbors as well. Faced with only finite labor resources while gathering fall corn and potato harvests, many farmers resorted to new labor interactions among neighbors. Nathan Abbot, a New Hampshire farmer and apple grower, noted that he sold his winter apples on the trees to a man named Carleton. Such arrangements were not uncommon after 1830, and allowed farmers like Abbot to
sell their apple crop without the labor intensive and time sensitive need to collect it. A neighboring New Hampshire farmer, Albert Mason, came to a similar arrangement of purchasing apples in exchange for picking a neighbor’s orchard:

Wind west and very warm for the time of year finished picking C.K. Bullock’s apples for which I have one fourth of the Pair apples and one half of the cider apples that is I am to make the same into cider at my own expense. Began to gather my apples by picking some in the little orchard rained in the P.M.\textsuperscript{80}

As cider went out of favor in the early 1830s, Medford, Massachusetts farmer Peter Brooks faced a labor crisis with his apple trees. Cider apples became so little valued among farmers that Brooks found he must give them away to his neighbors in exchange for picking them just to keep them from fouling his pastures and having his livestock get after them and become distressed.

As grafted apples gained popularity after the third decade of the nineteenth century, farmers began developing labor patterns distinguished by the differing uses for their apples. In late summer many farmers continued gathering their windfall apples for early or windfall cider. Beginning in early October, most (but not all) farmers gathered their more time sensitive and easily damaged winter or market apples prior to bringing in their fall cider apples. As the more important corn, potato, and winter apple crops simultaneously came to harvest, farmers eventually found time to gather their cider apples when other more pressing seasonal obligations in their till fields concluded.

Farmers continued to gather their cider apples after the temperance cause gained popularity for a number of reasons. Many farmers continued to make cider for use despite it falling out of favor more generally. Many others took the advice of the agricultural press to heart and collected their cider apples to give to their hogs and other livestock.
There were exceptions to such general trends. Massachusetts farmer David Greenough, for example, often picked his winter apples consecutively with or prior to his cider apples. His yearly patterns revealed that he began by gathering his windfall apples for his windfall cider, then he gathered his “winter” apples, and finally his men picked the apples for his regular cider. Either from the lay of his land, or perhaps as a cause of planting varieties prone to dropping, Greenough always had a substantial amount of windfall each year. Though the motivations for such a pattern are lost, the order of gathering his apples proved consistent throughout his work diary. Similarly, Greenough shared the apple-picking season with a number of even higher priority agricultural activities. His men usually tried to get in corn stalks during the same general time period they were engaged in getting in the apple crop. Like so many other New England farmers, Greenough invariably found himself gathering his winter apples while trying to get in corn and potatoes, his two most important fall crops.  

There was perhaps no greater seasonal activity on the farm that called for more intricate labor negotiations than the ones it took to produce one barrel of apple cider. Even hay season—which of course called for more work and longer contractual obligations to mow, rake, and jagg the coarse river meadows and salt marshes of New England, or the upland English meadows of New York and Ohio—could not compare with the number of interactions it took the average farmer to put cider in the cellar every November. When temperance men and agricultural reformers alike spoke to the potential labor saving value of removing cider making from seasonal routines, farmers intimately understood such arguments and often acted accordingly. We shall see, however, that such
arguments, however valid, invariably reveal that the end of large scale cider consumption tended to save farmers labor in all the wrong places.\textsuperscript{82}

Cider making begins with the cider mill, and a survey of early-mid nineteenth century account books and diaries clearly show that the average farmer did not have one. In fact, such sources tend to reveal that most farmers in any given region had seasonal access to two perhaps or at most three cider mills within five to seven miles of his grounds. For the majority who did not own a mill, cider season began at some indiscernible point earlier in the season with a (no doubt) verbal agreement for the right to use another’s mill a certain number of days in October or November. For those few who did own their own mills, such setups occasioned their own constellations of labor negotiation in rural New England.\textsuperscript{83}

The typical nineteenth-century cider mill looked nothing like its water powered counterparts used in the milling of corn and English grains in New England, Western New York, or Eastern Ohio. Most such buildings were seasonal affairs and no larger than a woodshed, barn, or other ancillary building on the nineteenth century farm. Peter Brooks, for example, who regularly made 90-100 barrels of cider between 1808 and 1831, kept his cider pressing equipment in the cellar below one of his barns. Most mills were above ground and many where only semi-permanent affairs, designed to be raised and taken down the coming and ending of each pressing season. Maintaining equipment and raising or maintaining such structures often required specialized labor contracted by the mill owner each new season.\textsuperscript{84}

Understandably, one might wonder why any farmer would go through the process of raising and taking down his cider mill each season. The simple answer is that cider
making is both heavily taxing on both equipment and buildings, and the site itself probably became quite foul by the last pressing in mid November. Squeezing and pressing put much stress on the physical infrastructure of the mill as well. Farmers bolted the press directly to supporting beams and it was not uncommon for the same stresses which squeezed the juice out of apples to warp or break supporting beams in the mill. Another factor in favor of taking down the mill was that the acidic juices and pomace left by pressed cider apples proved highly destructive to floorboards and underlying supporting beams. Finally, the site itself was, by the end of November, fairly awash in piles of rotten apple pomace and for many mill owners, it must have been simply easier to set up in a new location the following season rather than cleaning the site his mill currently occupied.

Much of this kind of maintenance the average farmer was incapable of doing by himself. As early as July, just after or perhaps during the last days of his haying obligations, the cider mill owner would begin to look for someone to raise his building. If his mill was more permanent, he could be found replacing beams and shingling the roof as early as February or March. More likely, putting his mill in working order began just as his English grains came in from his till fields and before the fall harvest began in earnest in mid to late September. Floorboards were replaced and pressing nuts fashioned by a local blacksmith. This seeming conflict between putting his cider mill in working order and getting in his English grains – or if earlier still, the more pressing process of getting in his coarse meadow hay – was occasioned not by any zeal to be ready almost three months prior to cider season but by the almost inevitable appearance every August and September of the ubiquitous windfall apple in orchards and fields from Eastern
Maine to the Western Reserve of Ohio. Thus it was that the mere happenstance of wind 
blown apples obligated the cider mill owner to interrupt his rhythms of mowing and 
reaping with the preparation of his cider mill months before the great majority of its use 
would be realized.85

For the farmer who found himself without a cider press, which clearly constituted 
the majority of nineteenth century farmers, seasonal rhythms and contractual negotiations 
were more complex still. Having already spoken to the harvesting aspect of cider making, 
one should observe again that the actual process of making cider seemed to take place in 
two distinct seasons within the larger seasonal rhythms of work and harvesting on the 
farm. The first season came as early as August and lasted into early September. The more 
traditional season for cider making began in mid-October and lasted through most of 
November. How consistently farmers followed these patterns was a product of seasonal 
climate and the tenacity of New England weather.

Each of these two seasons for cider making, summer and early winter, had their 
own sets of potential advantages and shortcomings. Of the two, the summer season was 
still a more intensive time for the farmer, despite the fact that the making of windfall 
cider usually fell in that more low key period between haying and gathering the mainstay 
fall crops of corn and potatoes. August and early September were not, however, without 
their own rhythms of seasonal activity. Despite the arguments of some scholars, most 
farmers during the 1830s and 1840s were still growing limited quantities of English 
grains like wheat, barley, and oats, all of which had to be cut and cradled through August 
and early September. For farmers with livestock, August was the time many of their 
pastures began to give out, and cattle needed to be moved from pasture to mowing lots to
take advantage of fall feeding on the rowan. Farmers needed to be aware of such obligations while deciding if it was better to collect windfalls apples or let them go bad on their grounds.

Although the early winter season was much less time sensitive, this is not to suggest, however, that some work during this time of year was not dependent on weather, or that there was not much work to go around. Farmers often devoted late October and early November to breaking ground for use the following spring. Come the end of October, tillage lots needed to be plowed and winter wheat and winter rye sowed and harrowed in prior to the ground freezing in November and December. Cider making shared the remainder of this season with activities much more easily managed by the farmers as husking corn, and threshing beans, wheat, oats, and barley, as well as laying up potatoes, turnips, apples, and other crops in the cellar for the coming winter. Such activities were time consuming but not necessarily time sensitive in the ways that getting in such crops from the fields were in September and November.

Mid-October through late November, of course, became the primary season for making cider. After collecting their apples and sorting and separating them from any winter apples (usually with hired helped as previously discussed) the farmer needed a way to get his apples from his barn to the cider mill and back. Interestingly, close examination of period diaries and account books demonstrates that many farmers had to hire a third party, or contract the use of their cart or horse and oxen, to get their apples to the mill. Farmers paid for use of cart, oxen, or both in a number of ways. As with most such transactions on early and mid-nineteenth-century farms, money seldom changed hands and debt was paid in trade or labor. Thus the act of cider making often cost the
farmer not only the days he actually was engaged in sorting, transporting, and pressing the beverage, but in days he owed labor to those who helped him in moving apples and cider from mill to cellar and cellar to market as well. Understandably, the individual to whom he owed such labor farmed as well, and often required fulfillment of that labor obligation during his haying or harvesting season, which of course was exactly when the farmer owing such labor did not want to be away from his own meadows and till fields.

Once the farmer found a way to get his apples to the cider mill proper, another set of labor relationships came to the fore. Unlike larger water operated mills for English grains that required specialized skills to operate, the cider mill usually had no dedicated labor force. That is to say, the cider mill owner almost always contracted with farmers for the uses of the cider pressing equipment rather than to make the cider for the farmer. Prior to 1820 payment for use of the mill usually came in the form of a certain percentage of the cider made by the farmer. After the early 1830s, however, those who continued to make cider were usually forced to pay with cash, as the value of cider depreciated to the point where it was no longer worth the time and effort of the mill owner to attempt to sell barrels of cider provided as payment from the farmer.

This rather unique relationship between cider mill owner and prospective apple presser explained the anxiety often exhibited by the agricultural press toward sanitary conditions in cider mills in the 1820s and early 1830s. The working parts of the cider mill, unlike grist mills, were a public space and must, on this account alone, have been a very dirty place as well. In this kind of arrangement the quality of the current user’s cider was often dependent on how well the last farmer cleaned up after himself. By late October, the floors, bolts, and presses of the cider mill must have been coated with apple
juice and the floors and surrounding grounds covered with pomace and other apple refuse. Contemporary diaries show little inclination by mill owner or farmer to clean the premises after his use. In fact, only Kendal Nims of New Hampshire mentions – in passing – the use of a tool he called the cider shovel, presumably a tool for removing his pomace from the cider press and the mill house floors after making his cider each season.86

The act of grinding apples and pressing the pulp often required additional labor. Usually the farmer’s sons, or the same hired hands who picked the apples, helped in making the cider as well. Often, a few barrels for the hired hands or several barrels or more for the farmer’s aging father would be made during his pressing as well. After grinding down his apples, the farmer placed a cheese cloth over the barrel and the juice from pressed apples collected in the barrels. Interestingly, the number of trips to the cider mill was just as often a product of distance as number of barrels being made. Farmers closer to cider mills seemed more likely to make several small trips during the height of harvest season on days unfavorable for gathering corn, picking apples, or digging potatoes. If the farmer resided a comparatively long distance from the cider mill, say three to five miles or more, he was more likely to take his apple in one or two large trips after being freed from the obligations of the fall harvest in late October or early November. The farmer usually brought his entire product back to his cellar rather than to market. This can be explained by the fact that by the time he finished making his cider in October or November the market was often glutted. It made more sense then to absorb the cost of bringing his cider home only to bring it back to town months later when the price of cider increased as a result of increasing scarcity.
A substantial number of farmers spent a handful of days making cider right through the busiest weeks of their harvest season. As already suggested, sometimes the mere proximity of a mill presented farmers with an opportunity to get their cider up during fall harvest. More often, however, this was a result of two differing yet interrelated factors. Farmers with only a handful of apples, and who planned to make only a handful of barrels of cider, could expect to complete the task in a single evening or two. Seasonal cycles of harvesting and crop yield varied remarkably in nineteenth century New England, and farmers could fairly regularly expect the failure of at least one of his primary fall crops. Even partial failure of the corn or potato crops could open up a few days for a farm to finish his cider making early in a single season, providing he could negotiate for time at his local mill. Apples, by nature, were just as prone to failure, perhaps more so, than corn or potatoes. Peter Brooks of Medford, Massachusetts, for example, made 100 barrels of cider one year and only a few barrels the following year.

Despite the marked fluidity of the potential cider-making season, generally, most New England farmers made the majority of their cider in late summer or early November. So how then did the collapse of the cider market in the early 1830s ultimately affect the seasonal rhythms of work and labor for the average farmer? For many farmers who openly disdained the temperance cause, or who simply continued to make cider for home consumption and local exchange, almost no change occurred in their seasonal practices and relationships with their hired hands. Occasionally, such farmers found it increasingly difficult to find a place to press their cider as many local mills went out of business in the late 1830s. Often cider pressing equipment was picked up from such sites by farmers still committed to producing the beverage, and after the 1850s portable cider
presses for making relatively small amounts of cider increasingly came on the market. For farmers who embraced the temperance cause early and stopped making cider altogether in the 1830s, seasonal rhythms changed little as well. For most such men, their cider trees were almost feral at this point anyway; so continued neglect changed little after cider apple became an obsolete farm commodity. The apples themselves were allowed to rot on the ground or to be eaten by livestock. Some farmers collected such windfalls and boiled them along with potatoes and pumpkins for their hogs, however, most individuals would probably circumvent such labor-intensive processes by letting their swine into the lot where their old cider trees resided and let the animals do the work of gleaning the orchard of fruit. Most farmers made cider on such a modest scale that only a few days in labor were saved by not picking or gathering windfall apples in the summer and fall, and another couple evenings in October and November by not pressing cider. Farmers electing not to make cider tended tountangle themselves from more complex labor relationships and neighborhood negotiations implicit in the traditional cider making activities of making barrels, hauling apples, working at the cider mill, and eventually hauling the cider home and to the market. Freedom from such negotiations, which often ended with labor obligations to one or more individuals, no doubt saved the farmer many more work days than it initially took to produce the beverage.

Despite the impassioned rhetoric of the agricultural and religious press, the end of cider making in New England caused surprisingly little disruption in seasonal rhythms of work and labor for most agrarians. For the handful of farmers invested in large-scale production of cider in and around Boston, the temperance crusade and the collapse of the cider industry could produce marked interruption in seasonal activities on the farm. For
Peter Brooks, the drying up of the cider market in Boston in the mid 1830s not only deprived his farm of substantial income, but threatened his business in livestock as well. Brooks’ situation in the 1830s ad 1840s presents a remarkable instance of just how changing tastes in cider consumption, regardless of whether they were driven by moral causes such as temperance or social preferences (like a shift from cider to tea and coffee consumption) could alter seasonal patterns of work and labor negotiations on a farm which traditionally derived much of its income from cider production.  

In November of 1836, a frustrated Brooks toured his Rock and Hither pastures with a hired hand named Shapley and ordered his old cider trees cut down as he thought them “injurious to the cattle and soil.” In fact, Brooks, who produced over 100 barrels of cider in 1832 and watched that number plummet rapidly through the mid 1830s, made only three barrels of cider the day following his order to remove his pasture apple trees. Brooks’ remark is especially telling, however, as one of the two reasons he gave for removing the trees was so the discarded cider apples would not hinder his livestock. He came to this seemingly drastic solution of cutting down his trees not on account of any particular proclivity for the temperance cause, but from the fact that he could not construct new labor patterns which reconciled his need to remove his cider apples and turn his livestock into pasture, mowing, and orchard lots for “fall grazing.” Ironically, the few days of labor saved in early November by the collapse of the cider industry came not only at the expense of the lucrative trade he enjoyed in that beverage for many decades with Boston merchants, but created ripples in his dairy and livestock business which proved equally disruptive.
Peter Brooks’ troubles with his apple trees and cattle began to reveal themselves in the early 1830s. Unfortunately for Brooks, his renewed interest in breeding Ayashure cattle came just at the time cider was falling out of favor with his Boston merchants and their urban constituents. Despite this confluence of cattle and apples, Brooks’ problems were (initially, at least) agro-ecological rather than the product of social or cultural change. The extra livestock quickly taxed even Brooks’ ample acreage, and as soon as his hay was mowed, raked, cocked, and put into the upper and lower barns in August, he quickly turned his cattle into his mowing lots on his Cleuly parcel and along the Mystic River ponds. Turning cattle into mowing lots in the fall to dispatch the rowen was by the 1830s a centuries old New England tradition which relieved the farmer and his men from the labor intensive responsibilities of collecting the aftermath from his upland English and river meadow lots, at precisely the time that such labor was so dearly needed for gathering corn, picking apples, and digging potatoes.\(^9\)

Brooks’ cattle did not suffer for want of feed, but from another transformation in the relationship between Boston and its peripheral agricultural communities in the first decades of the nineteenth century. A review of Brooks’ hay totals for 1830 through 1836 show a steady rise in English hay stacked in his upper and lower barns each season, yet his cattle would suffer for want in the midst of agricultural abundance. In the first half of the nineteenth century hay became one of the leading market crops for communities like Medford situated a mere half dozen miles from the growing commercial center of Boston. In a conscious decision to engage such market trends, rather than look to the immediate needs of his livestock, Brooks brokered an arrangement with a man named Wyman to take his hay in exchange for all the manure from Wyman’s livery stables. Brooks, in turn,
used the massive influx of manure to dramatically increase the output per acre of his upland English, corn, and potatoes plots each season. Much of this surplus came back on the market the following year. Shrewdly, Brooks turned Boston’s ample supply of manure into the very grass and garden products he sold back to Bostonians the following harvest season. What then did this mean for Brooks’ Ayarshure cattle? The same thing it meant for cattle on many contemporary New England farms. The gentleman farmer fed his cattle the coarse grasses of the river meadows in winter and let his livestock subsist by moving through the mowing lots and devouring the English rowen as they went through late summer and early fall. 91

Ostensibly, the apple tree appeared to have little place in the broader cycles of animal husbandry and Peter Brooks’ Medford farm. From 1832 to 1836, however, Brooks became increasingly concerned about clearing apples from his lots before bringing his cattle in to graze on the rowen. In September of 1832 Brook finished, “picking apples in Cluely & turning cattle there.” 92 A year later, Brooks walked his property with Shapley for the first time, “to mark trees to be cut down on the Cluely side & in the orchard,” as the author put it, “a great number.” 93 It is no accident that Brooks’ determination to cut down his trees for the first time coincided with the height of the temperance crusade against the cider tree. Despite an apparent increase in dry weather and a decrease in pasture and rowen quality between 1834 and 1836, Brooks continued to sell off his English hay and made more ominous connections between turning in his cattle for fall feeding and removing his increasingly valueless cider apples for his mowing lots. In September of 1834 he complained that he “gathered Cony apples because of cattle.” 94 As his lands remained dry in 1835 Brooks confided in October that he had, “not quite
finished apples in orchard,” that collecting his cider fruit was a “tedious” affair, and that he finally “turned cattle to the orchard” as he felt “the feed wanted.” Another cool dry summer in 1836 seems to have goaded Brooks into the removal of his remaining pasture cider trees as he again complained on several occasions of needing to remove all apples from the orchard before turning his livestock in to graze, and that, once again, he felt the “feed much wanted” as his pastures gave out early for the second and perhaps third year in succession.

Peter Brooks was true to his instructions to his hired hand Shapley in November of 1836, as in June of 1837 he recounted that, “having cut down all my old apple trees in the pastures we have been piling up brush out of the way of feed.” Despite such action, removing his cider trees did not alleviate Brooks’ problem, as even a table apple was nothing more than a cider apple after it fell from the tree. For decades Brooks’ men gathered these windfalls and made extensive amounts of cider with them. With no market for cider, Brooks had little use for the many bushels of market apples blown from the trees in lots all across his extensive Medford farm. Furthermore, Brooks thought such apples dangerous for his cattle and that they needed to be removed from his rowen acreage regardless of whether they had any value. The season of 1839 was fair typical of the way in which Brooks’ increasingly useless cider apples came to impede his husbandry. In May, he moved the cows to the Rock Pasture, devoid of apple trees since 1837, and in July his men moved the livestock to the “lower” (probably his Hither) Pasture. By September Brooks’ men were “picking some windfall apples in orchard, to let in the cows,” and by the 18th of September, his men were “picking apples below canal merely to let in the cattle.” Clearly, Brooks needed to implement new labor regimes
which would get cider and windfall apples out of his orchard and fall rowen lots with the least amount of labor and expense as most such apples were now entirely worthless.  

Peter Brooks drastically adapted his labor patterns in a number of surprising ways. The first, in a spirit of reciprocity born from the need to remove the offending windfall apples from his rowen prior to the arrival of his cattle, was to simply give his cider and windfall apples to any neighbor willing to gather and haul them away. Brooks resorted first to such seemingly drastic action in the fall of 1838. When speaking of a man named Hufmaster (presumably a Medford neighbor) Brooks wrote, “I have given the most of the cider apples to, if he would gather them at once, which he is doing. – I know not how to account of it – but cider is not worth making. – To drink it seems to have become unfashionable with all classes.” Two days later Brooks confided, “Hufmaster & his neighbors – have in two days cleared the orchard of cider fruit and had the fruit for their labor – say about 200 bushels or more. - We gathered some at same time. – We know not what to do with apples. – Some give them to cows and hogs. – To cows I have been afraid to do it.” In these entries Brooks reveals not only his continued inability to find means of managing his orchards which will not cost him in labor or income, but also exposes his anxiety toward letting his livestock graze on windfall apples. Such anxiety, though “some give them to cows and hogs” is precisely why the end of large-scale cider consumption in New England proved so detrimental to his traditional seasonal activities and labor patterns on his Medford estate.

In 1840 and 1841 Brooks took another approach which would both clear his rowen for fall feeding and find him some return on his windfall and cider apples. In October of 1840 he allowed Moses Pierce the opportunity of picking his cider apples at
halves, an arrangement whereby Brook’s allowed Pierce to keep half the windfall apples gathered in exchange for picking them up off the fields. This arrangement most certainly included windfalls and presented Brooks with a means of cleaning his fields and getting labor for collecting what few cider apples he needed for his own use that winter. In September of 1841 a more charitable Brooks “gave Mr. Wyat the windfall apples for picking.” These were windfalls in the true sense the word—being too early to be anywhere near ripe—they most probably were knocked from the trees in a sudden late summer storm. Brooks, no doubt, made such a generous arrangement which Mr. Wyat as his pastures were yet again overrun with thorns and he needed to move his livestock. Further evidence of the rapidity with which he needed his rowen cleared for cattle came nearly two weeks later as Brooks’ men cleared yet another lot (the Weir Bridge Lot) and made it “ready to turn in cattle.” Although Brooks made what he called “a present” of the first summer windfalls to his neighbor Mr. Wyat, he more shrewdly engaged Mr. Pierce to collect the remainder of his windfall and cider apples at halves in the fall of 1841. In September of 1846, Peter Brooks made another “present” of his windfall apples to P.C. Hall. Thus Brooks solved, in part at least, the predicament created by the disruption of traditional seasonal harvest and labor patterns which accompanied the demise of the cider tree in New England.

This is not to suggest, however, that Brooks did not continue to incur hardship, and no little inconvenience, from his seeming inability to find a perfect solution to the incongruities between his arboreal endeavors in the orchard and his interest in animal husbandry. Giving away apples, or perhaps having them gathered at halves, only helped Brooks when he could find a neighbor willing to engage the expense in time and labor to
collect such apples across the broad expanse of the orchard, pasture, and till lots of his Medford Massachusetts estate. What Brooks described as “a severe drought” rekindled his anxiety toward getting his apples up from his rowen as he confided in early September that his men where “mowing some clover, upper Cleuly, where we cannot turn in the cows on acc.[account] of the apples.”

His pastures indeed must have been overrun with thorns and thistles as two days later his men were “gathering 5 barrels of winter apples from lower limbs of trees – at weirs to unable us to turn in the cows, being troubled for feed for them, owing to the very dry season.” In September of 1846, only two seasons prior to Brooks’ death in January 1849, his men where still looking to clean up windfalls and pick winter apples within reach of livestock prior to turning them into fall feeding. When Peter Brooks died on January 15, 1849, he left his sprawling Medford Estate to his eldest son Edward Brooks, and an agricultural legacy of seasonal patterns permanently disrupted by the transformation of the cider trees of his forefathers to the “winter” apple orchards of the market economy. Though a wealthy successful Boston businessman and a well known respected gentleman farmer, Brooks never could undo changes brought to his farm by the end of the era of the ubiquitous New England cider tree.

While farmers who were heavily invested in the cider business occasionally suffered seasonal disruptions in their cycles of work and labor, farmers who attempted to enter the table apple market on a scale intended for market surplus production often faced seasonal disruptions of an equally disquieting nature. North of Boston in neighboring New Hampshire, Kendall Nims’ experience was typical of many an unsuspecting farmer whom embraced the ideal of reform through agriculture in his orchard. We cannot know
how Nims handled the collapse of the cider making industry in the early 1830s as his
diary begins in November of 1839. However, Nims’ seasonal routines throughout the
1840s exhibit patterns which must have been familiar to any New England farmer who
continued to press cider for home use, yet were too cautious or too shrewd to invest in re-
grafting or top setting new varieties on his lands. Throughout the 1840s the apple season
on the Nims farm commenced with trips to the Chapman and Batheller lots for cider and
winter apples. Either Nims never mastered separating his harvesting of crops, or perhaps
had too few apples to worry about such things, as mid October usually devolved into a
convoluted mix of apple picking, corn gathering, husking, and potato digging. With
potatoes in the cellar and corn husked and sorted Nims and his men devoted a final three
to four days drawing apples to the mill grinding, and pressing cider.

In the spring of 1851, Nims must have made a conscious and dramatic decision to
move his orchards from the cider and home use production of his forefathers and embrace
the cultivation of winter or market varieties as advocated by reformers and the
agricultural press alike. In Early April, Nims paid a Mr. Fish, of Gilsum, New Hampshire
$1.50 each for scions of thirteen apple varieties. A number of these, including most
notably the Baldwin, Esopus Spitzenburg, and the Hubbardston Pippin were among the
most popular market varieties in New England at the midpoint of the nineteenth century.
By May of 1851, Nims followed up his first purchase of scions with two more from
Robert Wilson of Keen, New Hampshire. Interestingly, while six varieties came from
Wilson’s own orchard, including the Northern Spy of East Bloomfield, New York fame,
the remaining seven varieties originated with a Mr. Downing of New York. Undoubtedly
Wilson received the latter from the famous pomologist Andrew Jackson Downing, of
New York. In total, Nims grafted twenty-five new varieties onto his apple trees in the spring of 1851, and increased the total number of different apples propagated on his farm from perhaps seventeen to at least forty-two by his pomological exertions in the name of agricultural progress. 106

Not surprisingly, the disruption to traditional seasonal cycles of work and labor became pronounced within a mere matter of weeks after Nims grafted his orchard and pasture apple trees. Remarkably, in May of 1851, Nims spent part or all of 22 days working in some capacity with his apple trees. Indeed, if one does not count Sundays, for Nims like many New England farmers refused to work on the Sabbath, he worked with his apple trees 22 out of the 27 days he labored in his farm fields and home lots in the month of May. Six years prior in May of 1844, by comparison, Nims spent only five days working with his apples trees, trimming branches and clearing brush. 107 In 1847, Nims spent two days trimming apple trees in his Batcheller lot, and four days drawing stones from and manuring his orchard ground, cutting down old apple trees, and removing worms and other pests from the branches. 108 Nims recounted doing no work with his apple trees worth mentioning in his journal in 1845, 1846, or 1849.

Just how potentially disrupting new labor obligations among his grafted orchards might be was aptly demonstrated by disruptions to Nims’ traditional seasonal activities in May. For Nims, May was a time sowing oats in his South Lot and new clearing, and mending fences to keep out his neighbors’ encroaching livestock. Other years the month of May might be a time for sowing oats in the Batcheller Lot or carting and spreading manure in his upland meadows and till fields. However, in May of 1851, with increased obligations toward grafting, trimming, scrapping, and removing apple tree brush, Nims
managed only three days of work devoted to such traditional spring tasks as turning over ground and mending fences.\textsuperscript{109} Nims’ 22 new days of labor devoted wholly or partially to his grafted apple orchards came at a seasonal pressure point between early late spring and early summer obligations. April and early May were traditionally devoted to preparing his till lots for cultivation, while late May and early June, in turn, were a time for sowing and planting English grains, garden crops, corn, and potatoes. Nims managed to cope under the pressure of these new labor constraints and obligations in May of 1851, but a late spring or wet inclement weather could have pushed these new seasonal cycles of labor and cultivation even further out of equilibrium.\textsuperscript{110}

For Kendall Nims, his fall harvest season was thrown into even greater disruption than his obligations in May. Such attention to his apple trees in October might only have been possible as a result of the other crops Nims chose to sow or plant in his till lots. Nims’ journal recounts the sowing of English grains like barley, oats, and rye, but is silent as to the cultivation of corn. As English grains like oats and barley were reaped and cradled prior to the apple harvest, they would be impacted little by closer attention to apple trees in October. Potatoes, however, were a prominent crop on the Nims family farm and were in direct competition with his grafted apple trees for labor resources during the fall harvest season. Nims opted not to manure and dig around his apple trees after the fall of 1852. Similarly, it is probably not a coincidence that his yields in bushels of round reds, long reds, and pinkeye potatoes shot up to 231 bushels in 1852, and 130 bushels in 1855. Nims gave no account of how many bushels he brought in during the height of his labor obligations to his apple tree in the fall of 1851, but recorded only devoting a single day gathering potatoes for that month. Had Nims’ heavily cultivated his
fields with both potatoes and corn, it is highly unlikely he could possibly devoted as much labor to his apple trees as he did in the fall of 1851 and 1852.\textsuperscript{111}

Perhaps a final indication of just how disruptive Nims’ change to market apple growing was to traditional seasonal labor relationships was in how few bushels of apples he recorded as harvested in the mid to late 1850s. In 1854 for example, Nims recorded only 23 bushels from his Batcheller Lot, and listed no bushels at all in the following two years of 1855 and 1856.\textsuperscript{112} More tellingly, the years 1857, 1858, and 1859 only yielded fifteen, twenty-seven, and twelve bushels of apples respectively. Though Nims’s time spent trimming and grafting eventually declined to seven days in May of 1857, it would be hard to justify, by any standard, the days in labor devoted to grafting and trimming apple trees, at the cost of time devoted to sowing and harvesting between 1851 and 1856.\textsuperscript{113}

In southern New England Orange Township, Connecticut farmer Carleton White suffered seasonal disruptions, both economic and ecological, from his decision to plant to new orchards of grafted winter apples in the early winter of 1850. For years (and undoubtedly decades) prior to 1850, White’s farm lots were awash in scattered grafted and ungrafted apple trees. Unlike Peter Brooks or Kendall Nims, it appeared White never had enough acreage, at least in the right proportions, to make his farm truly self-sufficient. In 1849, for example, lack of pasturage placed White in a position where he had to graze his cows in W. Pruman’s pasture.\textsuperscript{114} While White certainly never had enough pasturage for his livestock, it became abundantly clear through the 1850s that he increasingly lacked the hay resources to support his livestock or the manure to grow his market garden produce for neighboring New Haven as well.\textsuperscript{115}
In the grand scheme of agricultural progress advocated by reformers from 1820 through 1850 Peter Brooks and Carlton White both aptly represent the pressures such change wrought upon Northeastern farmers. Brooks’ Medford estate, lying a mere half dozen miles from Boston, was covered with grafted apple trees for market production at least since the turn of the nineteenth century. Disruptions in Brooks’ seasonal cycles of agricultural labor and reduction came not from the production of new market varieties, but instead from the fall from favor of cider consumption in Massachusetts during the early 1830s. Carlton White’s agricultural disruptions in labor and ecological balance mirrored those of New Hampshire farmer Kendall Nims, for issues of labor and ecological balance on his farm were only exacerbated by the setting of two new grafted orchards in 1850. Though the increase in labor days devoted to his orchards were only modest in comparison to Nims, White’s increased reliance on his neighbors for pasturage, upland English, and manure, reflected his changing worldview of rural New England. No longer would White be content with the craggy cider apples of his father. Similarly, White would abandon his system of low intensity, yet largely sustainable, practice of mixed farming for the specialization that came from supplying neighboring New Haven with garden produce.

Perhaps most indicative of the increasingly specialized nature of White’s farming, as well as the lack of balance between till, pasture, and meadow on his lands, resided with his patterns of manure usage in the 1850s. White already needed to rent pasturage for his livestock by the 1849. If pasturing his livestock on rented land was meant to alleviate pressure on his hay supply by allowing him to devote potential pasture lots to upland English, White must have been largely unsuccessful. In January of 1850 and
1851, White found himself compelled to purchase several tons of hay for his livestock, as the cutting from his previous summer mowing must have run out. White might have been able to devote more of his limited acreage to upland English but for the fact that he also needed that acreage for the garden vegetable crops and English grains which he undoubtedly sold in neighboring New Haven. Consequently, not a blade of herds grass, red top, course or natural meadow grass was left uncollected on White’s farm by 1849. Like all good New England farmers, White collected his upland English, then his grass in the orchard lots, providing they were not in cover crops, and then collected has natural grasses from the Dyke Meadow Lot as well. Indeed even the “coarse grass” which he deemed too rough for his livestock was methodically collected from his Dyke Meadow Lot, ditches, and anywhere else it might reside, for use in making fertilizer for next season’s till crops.

Only more pressing on White’s pasture, meadow, and till lots was his lack of access to sufficient quantities of manure. White’s reliance on, and insatiable appetite for access to, fertilizers became readily apparent as early as 1849. In 1849 White spread ash in his horsetooth corn mounds and recounted spreading and plowing in fish into his North West Lot in June of that same year. By 1854, White’s manure usage expanded to the point where he began carting in loads of the material from neighboring New Haven. From February to March 1854 White brought in at least thirteen cartloads of manure from New Haven and another five cartloads from other unspecified places. In March and April White turned these cartloads of manure, as well as “muck” from his own bottom lands, onto his till lots, and meadows.
Though White undoubtedly had space on his farm specifically utilized as orchard prior to 1849, he dramatically increased his potential for market, or winter apple production, by planting two new orchards in 1850. Like fellow farmer Kendall Nims, White chose to radically transform the course of apple cultivation on his farm in a mere handful of days. On 27 November 1850 White went to the nursery of Mr. Smith and purchased 49 apple trees. Among these trees were some of the finest market or winter varieties of the day including the Newton Pippin and Rhode Island Greening. Apparently satisfied with his decision to so wholeheartedly embrace agricultural reform in the orchard, White returned to Smith’s nursery three days later. White came home with at least 43 additional apple trees including the Roxbury Russet, Seek-no-further, Northern Spy, and the increasingly popular Baldwin. White set out his new grafted apple trees into two distinct orchards. The first, consisting of the trees purchased on 27 November 1850, was located in the lot west of White’s garden, while the second resided in another lot at on the far end of White’s garden.\textsuperscript{119}

Every indication suggests that White never had enough acreage to run a traditional largely self-sufficient farm. It appears he was committed to an agricultural regime which resembled the truck-garden operations on the para-urban fringes of industrial cities during the first decades of the twentieth century. Under such a regime, White’s commitment to setting to new orchards on his limited acreage no doubt impacted his ability to grow potatoes, corn, and garden vegetables for urban consumption in nearby New Haven. Of equal concern was that White’s new orchards exacerbated limitations in manure, a necessity for the kind of intensive market garden activities he engaged in. His new grafted orchards required each tree be manured in order to make them more
profitable, and it was not surprising that such obligations in the orchard forced him to begin purchasing large quantities of manure from New Haven the year following the setting of his new orchards.

After examining the patterns of a number of farms across New England and New York one may conclude, as the agricultural press of the 1830s and 1840s so vehemently did, that the end of the era of the cider tree liberated the farmer from a costly and labor exhausting seasonal cycle. Many farmers did simply let their apples fall where they may after cider went out of fashion in the 1830s, however, for most farmers, production was on such a scale as to only save himself and his men a few days labor at best. Of course the real savings in time and labor were realized in November when farmers no longer found it necessary to pay for the use of a cider mill, employ men in grinding and squeezing apples, or transport the apples to the mill and cider barrels back home.

While the end of wide spread ubiquitous cider making in New England and New York only had modest repercussions in planting cycles and labor negotiations at best, there is absolutely no doubt that setting and maintaining new orchards proved to have dramatic repercussions for farmers foolhardy enough to transform his cider orchard into the place of rural taste and culinary variety championed by those in the agricultural press. To ask farmers to embrace “market” apple growing as a tenet of agricultural progress and moral reform was to ask such smallholders to substantially increase their labor obligations in one of the busiest seasons of their agricultural year. Agricultural elites never quite understood this, and invariably labeled such resistance on the part of smallholders as some form of recalcitrance against agricultural improvement.
Despite resistance to large scale and dramatic change to traditional apple growing practices in the northeast, farmers’ work diaries and journals provide ample evidence that most smallholders engaged in improvement in the orchard on a modest scale. Such limited, if practical, forms of progress the agricultural journals often even ignored. Through the early 1850s the typical article concerning rural orchards claimed that not one in fifty farmers grew apples worthy of notice. Such elites could not see the orchard for the trees, as there was overwhelming evidence that most farmers grafted a few scions of the best kinds of market apples for home use and local exchange.

To put it another way, those farmers who expected only modest rewards from their orchards experienced only minimal, or at most subtle changes, in the yearly cycles of planting, harvesting, and negotiation of labor. For farmers that were invested heavily in the cider tree when such trade in “vicious and vapid juices” collapsed through moral and social pressure in the 1830s, the corresponding ripples through their systems of agricultural work and rhythms of labor could be, and often were quite powerful. Likewise, farmers with traditional modest fiscal and cultural investment in apple growing, who attempted to rapidly expand and profit from the growing market in table apples in the 1840s and 1850s tended to cause equally disquieting reverberations in their cycles of growing and rhythms of labor on their farms as well. In a world of limited labor resources, and the seasonal pressures of corn and potato harvesting particular to the late fall season, any reasonable farmer might balk at adding a third, and equally labor intensive, endeavor like “market” apple picking to their agricultural regime. Slow and moderate transformations from cider to market apple trees seemed to be the only road that ended in success for small growers. Ironically it was this slow deliberate
transformation moral reformers took for lethargy and resistance to the fundamental tenets of agricultural improvement.
For an overview of the labor shortages in colonial New England see Daniel Vickers, *Farmers & Fishermen: Two Centuries of Work in Essex County, Massachusetts, 1630-1850* (Chapel Hill: The University of North Carolina Press, 1994), 45-46, 48-49; labor was such an importation consideration on the New England farm that, nearly a century later, H.C. Woodworth implored orchard growers to “confine” their “labor to the essential needs of the orchard” and to abstain from using hired hands for “unimportant and debatable operations.” H.C. Woodworth, “Readjustments in Farm Organization in New England,” *Journal of Farm Economics* 14, no. 3 (July 1932): 448.


For examples of grafting and trimming apple trees in Vermont see the Nathan Parkhill Diary, 25 March 1851, Vermont Historical Society, Montpelier, VT; The Jedadiah Harris Diary, 26 April 1853, Vermont Historical Society, Montpelier, VT, 26; for New Hampshire see the Nims Family Diaries and Accounts, 6 May 1844, 18-19 May 1847, New Hampshire Historical Society, Concord, NH; for Maine see the Tobias Walker Diary, 10 May 1842, Maine Historical Society, Portland, ME; for Massachusetts see the Heath Family Papers: Anonymous Farm Diary, 22, 24, 31 March and 22 April 1845, Massachusetts Historical Society, Boston, MA; for Connecticut see the Edmond
Smith Diary, 12 March 1844, 12-13 March 1845, Connecticut Historical Society, Hartford, CT. Trimming and grafting could take place as late as May, especially with farmers who had apple trees scattered across their till and pasture lots. See the Journal of Joseph Andrew, May 1757, 1759, and 1761, Massachusetts Historical Society, Boston, MA. References to caterpillars and other pest control were less common but see for example David Greenough who took his hired hand with him into his orchard with the intent of “killing caterpillars” on 17 May 1826 and noted that “others [were] killing caterpillars” one year later on 11 May 1827. David Greenough Papers, 17 May 1826, 11 May 1827, Massachusetts Historical Society, Boston, MA; Ebenezer Paul spent 28 May “getting off caterpillars” from his apple trees in 1847. Ebenezer Paul Diary, 28 May 1847, Massachusetts Historical Society, Boston, MA; Kendall Nims “went to [his] Bathcheller lot & got worms nests of apple trees” as early as 9 April in 1846. Nims Family Diaries & Accounts, 9 April 1846, Connecticut Historical Society, Hartford, CT.

55 For the cultural development of corn cultivation in America see William Parker, “A Note on Regional Culture in the Corn Harvest,” *Agricultural History* 46, no. 1 (January 1972): 181-189; For an introduction to haymaking in northern New England see, Allen Yale, Jr., *While the Sun Shines: Making Hay in Vermont 1789-1990* (Hanover, NH: University Press of New England, 1991); Clarence Danhof estimated that the average farmer could at best bring in one acre of mowing per day, and that after mowing, curing, cocking (raking into windrows), and hauling into the barns the farmer had from one to one and a third ton of hay from that day’s labor. Clarence Danhof, “Gathering the Grass,” *Agricultural History*, 169.

56 William Nutting, for example, “plowd & howd in the orchard field” in June 1802 and “began to reap in the old orchard” in July and a week later he was “plowing the corn in [the] orchard field.” William Nutting Diary, 17 June 22 July 1802, Massachusetts Historical Society, Boston, MA. Albert Mason “hoed potatoes in [his] orchard” in the summer of 1847. Albert Mason Diary, 6 July 1847, New Hampshire Historical Society, Concord, NH. In Maine Tobias Walker “mowed the oats in the orchard” in August 1846. Tobias Walker Diary, 6 July 1847. Carleton White “cut grass in [his] orchard” in the summer of 1849. Carleton White Diary, 26 June 1849, Connecticut Historical Society, Hartford, CT. On the Greenough farm “White & Hobrook mowd clover in orchard” in the summer of 1827. David Greenough Farm Diary 21 July 1827. Medford farmer Peter Brooks “mowed the orchard” in the summer of 1814 and pronounced the hay crop “excellent” as well. Peter Brooks Farm Journal, 5 July 1814, Massachusetts Historical Society, Boston, MA.

57 For examples of reaping in orchards see Albert Mason who “finished reaping wheate [sic] in the orchard” in September of 1841, Albert Mason Diary, 7 September 1841; For the gathering of summer apples see Peter Brooks who spent an August day “gathering Mill Yard apples – June Eatings” and reported that “all summer fruit [was] now ripe.” Peter Brooks Farm Journal, 29 August 1837. Nathan Abbot noted that his
“early apples began to ripen” in late August. Nathan Abbot Diary, 17 August 1834, New Hampshire Historical Society, Concord, NH.

58 While potatoes may have been introduced in New England as early as 1628, they did not emerge as a primary crop until the 1730s and 1740s with the migration of Scottish farmers to Londonderry and the Merrimack Valley of New Hampshire. Howard Russell remarks that potato cultivation did not reach the Connecticut River until after 1750. By 1820 apple gathering in New England would have competed for labor with potato harvesting for 70 or 80 years in some sections of New England. Russell, A long Deep Furrow, 137-139.

59 For Brian Donahue’s argument concerning the labor saving advantages of transitioning from beer to cider production during the first half of the eighteenth century in colonial New England see Brian Donahue, The Great Meadow, 164-166. Brian Donahue revisits this same theme of how the transition from beer to cider in colonial New England shaped labor relations during the summer haying and reaping seasons in Brian Donahue, Reclaiming the Commons, 184-185.


63 The work of Tobias Walker of Maine proved representative of seasonal cycles of apple growing in New England. Walker’s apples for winter use were picked first, followed by the gathering of his cider apples. Walker then made his cider either in the last week of October or first two weeks of November. Tobias Walker Diary, 15 October, and 8, 12, November 1832, 1, 18, 23-26, 28 October 1833, 10, 18, 22 October and 3, November 1834, 3, 5, 10, 25 October and 14, 15 November 1835.
The agricultural press often ignored spring care of new grafted apple orchards while extolling the labor saving value of abandoning cider trees. Allen Dodge, for example, writing for the improvement of orchards for the Southern Agriculturist in 1841, acknowledged that much labor was needed to set a good orchard, yet he promised hesitant farmers that such obligations would decrease after a number of years. See Allen Dodge, “The Orchard,” Southern Agriculturist, Horticulturist, and Register of Rural Affairs, 12 (December 1841): 657.

For barley and beer production in colonial and early nineteenth-century New England see James McWilliams, “Brewing Beer in Massachusetts Bay, 1640-1690.” The New England Quarterly 71 (December 1998): 556-557, 569; McWilliams recounted that cider edged out beer in New England, but that New England brewers did find new markets in the West Indies and in the Chesapeake and Carolina low countries. McWilliams, “Brewing Beer in Massachusetts Bay:” 568-569.

The earliest agricultural journals most often advocated for spring maintenance of apple trees even though it might conflict with other seasonal obligations. See “On the Bad Management of Orchards,” The Massachusetts Repository and Journal 6, no 1 (January 1820). Some farm activities, like trimming apples, however, were not always regulated to spring or early winter in practice. Vermont farmer Willard Stevens, for example, recounted that he “trimmed apple trees and put the limbs among peas” in early June. Willard Stevens Diary, 9 June 1837, Bailey/Howe Library, University of Vermont, Burlington, VT. For Maine see Tobias Walker who trimmed his apple trees in March or April as well. Tobias Walker Diary, 31 March and 28 April, 1843.

David Smith noted that Seneca County, New York farmer Henry Dey trimmed his orchard in April much like his New England counterparts. See David Smith, “Middle Range Farming in the Civil War Era,” in Studies in the Land, 145. For examples of spring trimming see Nathan Parkhill Diary, 25 March 1851; Erastus Williams Dairy, 7 and 23 April 1832.

Winter activities were limited to butchering and wood chopping for home use or neighboring urban markets. For early winter seasonal patterns of livestock dressing for Boston markets see David Smith and Anne Bridges, “The Brighton Market: Feeding Nineteenth-Century Boston,” Agricultural History 56, no. 1 (January 1982): 4.

Not all manure was thought equal by agricultural writers when it came to apple trees. Many thought manure from the cow yard much better for apple trees than “unfermented” manure form the horse stable. See “Minimus—On Orchards,” Prairie Farmer 5, no. 7 (July 1845): 166.

Edmund Smith, for example, “set fruit trees” in mid-December of 1840, though he was silent as to whether his endeavor ultimately proved fruitful so late in the season. Edmund Smith Diary, 16 December 1840. Carleton White of Orange, Connecticut set out

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two orchards in November of 1850, and his diary entries through 1855 suggest he saw precious little return on those trees. Carleton White Diary, 27, 30 November 1850.

71 Writers for the agricultural press often thought summer the best time for grafting, however, seasonal labor obligations for farmers in June appeared to have encouraged farmers to graft in April or May instead. See “Cions,” *The Genesee Farmer and Gardener’s Journal* 1, no. 1 (1 January 1831): 5.

72 The presence of new words like “sorted” in the diaries of farmers such as Nathanial Parkhill suggest that they began grading their apples for market prior to the Civil War. Nathanial Parkhill Diary, 9, 12, and 20 November 1852.

73 Picking winter apples before they fell from the tree meant that farmers such as Erastus Williams, for example, committed to picking them in the snow to get them packed for market. Erastus Williams Diary, 30 October 1833. Care of handling apples became so important that the *Ohio Cultivator* encouraged its subscribers to pick their cider apples as carefully as they would their winter fruit for market. See “The Orchard,” *Ohio Cultivator* 1, no. 5 (1 March 1845): 35.

74 Interestingly, there is no evidence of picking ladders in any of the farm journals examined even as those same diaries recounted such things as scythes, pomace shovels, axes, barrels, stoves, and other accoutrements. Vermont farmer Willard Stevens, for example, recounted getting his scythes ground before the summer haying season but never mentioned ladders for fall apple picking. Willard Stevens Diary, 12 and 17 July 1837, Stevens Family Papers, Bailey/Howe Library, University of Vermont, Burlington, VT.

75 Willard Stevens, for example, recounted how he “shook apples off a tree in the garden, and picked up [the] same which was done, after the former was written.” Willard Stevens Diary, 19 September 1838; Harvey Basset “shook some apple trees and pictup [sp] apples” on his Connecticut farm. Harvey Basset Diary, 21 August 1854, Connecticut Historical Society, Hartford, CT.

76 Peter Brooks Farm Journal, 13 October, 1835.

77 Samuel Dresser Jr. Diary, 23 October 1827, New Hampshire Historical Society, Concord, NH.

78 For examples of this pattern repeated annually on the David Greenough farm see the David Greenough Diary, 9, 10, 12, October 1822, 15, 16, 20 October 1823, 6, 7-15 October 1824. There was a bit of overlap in apple picking and potato digging in 1823, however, Greenough was ill, and even then it appears that he tried to keep to the pattern by finishing his potatoes some days after his apple picking.
Intricate does not necessarily mean time consuming, often New England farmers produced only small amounts squeezing or pressing their cider apples after the fall harvests were in the barn or cellar. See Nathanial Clark Diary, 5 October 1849, Clark Family Papers, Connecticut Historical Society, Concord, NH.

Evidence that most farmers took their apples to local mills abounds in nineteenth-century farm diaries. See, Tobias Walker Diary, 24 October 1833, 14 November 1836; Nathanial Parkhill Diary 5 November 1852; Ralph Pelton Diary, 12 October 1840, Connecticut Historical Society, Hartford, CT.

Peter Chardon Brooks, of Medford Massachusetts was typical of those farmers of larger means who had their own small cider presses. See Peter Brooks Farm Journal, 19 September 1840.

Some indication of just how much seasonal work might be found in preparing the cider mill for the fall cider season is evident in the Dennis Allen Journal & Account Book even into the early 1850s. In the late summer of 1846, for example, Allen “raised [the] Orin Chittenden Cider Mill,” and in the fall of 1853 Allen “finished Leeland’s Cider Mill [and] put one new timber under the press [and] one sleeper and finished off the nuts after Moses Bixby.” Dennis Allen Journal & Account Book, 29 September 1846 and 19-20 October 1853, Bailey/Howe Library, University of Vermont, Burlington, VT.

The early agricultural press was constantly chastising farmers for poor sanitary conditions while making cider or using cider mills. See, for examples, J. Dill, “The Orchard,” Ohio Cultivator 1, no. 5 (March 1845): 35. Kendall Nims of New Hampshire, for example, was exactly the kind of unsanitary cider making farmer the agricultural press loathed. Nims recorded in December of 1855 that he “Worked [to] put a head in to an oil barrel & carried it over to the Parsonage cellar & filled it with cider.” Nims Family Diaries & Accounts, 10 December 1855. Massachusetts farmer, David Greenough recorded that he “finished pickg [sic] over Apples ground up [the] rotten [apples and] made say 3 B. cider” on his farm in 1822. David Greenough Diary, 13 November 1822.

Most ledgers, farm journals, and diaries reveal that the typical New England farmer made only a few barrels of cider and would fit it in around fall crops, at least through the third decade of the nineteenth century and prior to the temperance crusade.
Such observations are in keeping with observations made from tax valuations listing cider in barrels rather than apples or apple trees in New England prior to 1830. See, for example, Jones, *Social & Economic Change in Rural Rhode Island*, 7-8.

88 Small farmers were little affected by the temperance crusade and the end of large-scale cider consumption in New England, however, large cider producers around Boston, such as Peter Brooks, experience much anxiety as cider consumption declined in New England. See Peter Brooks Farm Journal, 10-12 October 1830, 19 September 1840.

89 See Peter Brooks Farm Journal, 9 November 1836 and 10 November 1832. For the popular perceptions that apples could cause certain livestock, particularly cattle, distress see the *New Harmony Gazette* 1, no. 46 (9 August 1825). This problem was known as “Choking” where apples got into the gullet and livestock could not spit them out or swallow them. See “To Prevent Cattle form Choking,” *New Haven Gazette* 1, no. 46 (9 August 1825): 367. One author writing an article for the *Brattleboro Messenger* that was subsequently republished in *The Genesee Farmer* noted that the prevailing notion among many farmers was that dairy cows let into orchards had their milk output drop precipitously. This was known regionally as to “dry up.” See “Apples Good For Cattle and Hogs,” *The Genesee Farmer and Gardener’s Journal* 3, no. 47 (23 November 1833): 376.

90 Allowing livestock to gather the rowen from orchard and meadow lots was in sharp contrast with other traditional labor cycles such as hand mowing or taking corn stocks in, which England farmers appeared to have clung to well into the 1850s. For labor and mowing see Danhof, “Gathering the Grass” *Agricultural History*: 170-171; for gathering corn stalks see, Parker, “A Note on Regional Culture in the Corn Harvest” *Agricultural History*: 185.

91 Peter Brooks’ hay total for 1844, for example, appeared to by over 77 tons. See Peter Brooks Farm Journal, 28 June, 1844.

92 Peter Brooks Farm Journal, 24 September 1832.

93 Peter Brooks Farm Journal, 12 November 1833.

94 Peter Brooks Farm Journal, 13 September 1834.

95 Peter Brooks Farm Journal, 13 October 1835.

96 Peter Brooks Farm Journal, 17 October 1836.

97 A number of authors have looked at the cold summer of 1816, but few seem to have recognized the period from 1835 to 1836 brought comparisons to “the year without
summer” from more than a few New England farmers. See, for example, Nathan Abbot Diary, 2 May 1836.

98 Peter Brooks Farm Journal, 19 May, 4 July, 11, 18 September, 1839. The direct quotation is from Peter Brooks Farm Journal, 18 September 1839.

99 Windfall apples were a common crop on nineteenth-century New England farms. Carleton White, for example complained bitterly that a strong August gale from the northwest resulted in “large quantities of apples & pears blown off the trees.” Carleton White Diary 26 August 1851; on the Kennebunk, Maine farm of Tobias Walker “a great many apples blowed of the trees” in August 1832 and again in September 1833. Tobias Walker Diary 25 August 1832 and 1 September 1833; Massachusetts farmer David Greenough consistently made “windfall cider” from year to year. See, David Greenough Diary, entry following 30 October 1822, entry following 30, November 1823, entry following 30, November 1824.

100 Though feeding of apples to cows or cattle was a traditional cause of anxiety among many New England farmers. Others, however, like one anonymous farmer who wrote for the Albany Cultivator in 1836 acknowledged that he used the pomace from his cider mill for fattening his dairy herd. “The Apple Orchard,” The Family Magazine; or Monthly Abstract of General Knowledge 4 (1836): 467.

101 Peter Brooks Farm Journal, 16 September 1841.

102 Peter Brooks Farm Journal, 8 September 1846.

103 Peter Brooks Farm Journal, 5 September 1844.

104 Peter Brooks Farm Journal, 7 September 1844.

105 For a discussion of Peter Chardon Brooks as a prominent businessman and one of Boston’s elite see Charles Brooks, History of the Town of Medford, Middlesex County, Massachusetts, From its First Settlement in 1630 to 1855, revised by James Usher (Boston, MA: Rand, Avery, & Company, 1886), 453-554.

106 Kendall Nims Diaries, 27 May 1851; here Nims included a complete list of forty-two apple varieties on his farm. Also included are three lists of scions purchased in April and May of 1851. These lists include the following new winter varieties. From Mr. Fish Nims acquired the Baldwin, Hubbardston Pippin, Pecks Pleasant, Esopus Spitzenburg, Seaver Sweet, Red Canada, Porter, Lyscomb, Gravenstein, Red Astrochan, August Sweeting, Fall Sopsavine. From Robert Wilson’s Orchard Nims received, Lady Sweet, Wagner, Swaar, Northern Sweet, Late Strawberry, Dutch Magnoune, and Northern Spy. Also from Mr. Wilson but originating from Mr. Downing of New York
Nims received the Gravenstein, Aunt Hanna, Red Canada, Red Russet, Fort Miami, Pomme Gris, and Norton’s Melon.

107 Kendall Nims Diary, 6, 12, 15, 24 May 1844.

108 Kendall Nims, 22 April, 8, 10, 15, 20 May 1848; Nims was drawing rocks and dressing the ground in his Batcheller lot Orchard in preparation for harrowing in seed though he does not mention what kind.

109 Kendall Nims Diary, 13, 17, 19 May 1845, 22 May 1846, 10, 20 May 1848.

110 Advocates for agricultural improvement in the orchard wrote articles encouraging farmers like Kendall Nims to set large grafted orchards in the 1830s and 1840s. If they mentioned an increase in labor obligations at all, they were often minimized and represented as only being potentially repressive the first few years after the orchard was set. See Allen Dodge, “The Orchard,” *Southern Agriculturist* 1, no. 12 (December 1841): 657.

111 For potato harvest in bushels for 1852, and 1855 see Kendall Nims Diary, 19-21 October 1852; for number of days spent digging and placing manure around apple trees see Kendall Nims Diary, 11, 14, 15, 16, 17, 18, 21, 22 October 1851. Some of this zealosity might account for Nims’ anxiety to make sure the newly grafted trees survived their first New Hampshire winter.

112 Kendall Nims Diary 2-3 October 1854; Nims recorded cider production for 1855 at 15 barrels but recorded no cider or apples for 1856. See Kendall Nims Diary, 10 December 1855.

113 Kendall Nims Diary, 17 October 1857, 21 October 1858, 24 October 1859.

114 Carleton White Diary, 16 June 1849.

115 For examples of ecological limitations upon the natural resources of Carleton White’s farm concerning pasturage, meadow, and manure see the following entries. Carleton White Diary, 14 January 1851, 11 March 1852, 29 July 1853, 2, 3, 4, 6 March 1854.

116 In 1850, for example, Carleton White bought one half ton of hay from Oliver Smith and in March bought another ton of hay from W.J. Gorham for $11:00; in 1851, White bought three and one half tons of hay mostly from Oliver Smith. Carlton White Diary, 29 January, 1 March 1850, 14 January 1851.

117 For a typical summer haying season showing such division and careful attention to the mowing and gathering of all grasses, even if they were only good for
mixing with manure, see Carleton White Dairy, 23-25 June, 18-19, 22, 29 July 1853. In 1859 Carleton White found it necessary to pasture his colts with John P. Newton of Woodridge for 50 cents a week. See Carleton White Diary, 8 June 1850.

118 Carleton White Diary, 22 May, 1 June 1849.

119 Carleton White Diary, 27, 30 November, 4 December 1850.
CHAPTER IV
PASTURE APPLES AND ROWEN ORCHARDS

On some forgotten day in the early 1830s, Josiah Adams wrote to the Massachusetts Society for Promoting Agriculture’s Committee on Fruit and Forest Trees, concerning the premium for award orchard and the entry of Nathaniel Bennett, a smallholder from Farmington, Massachusetts:

Mr. Bennett’s is very large and occupies 6 different lots, which are separated only by stonewalls & the road. The trees are about 540 in number, & were set out some in every year from 1825-1830. The trees are set a little less than two rods apart, except that, between every two rows, a space is left of four rods, & in some instances this space is also left also cross wise, making the trees stand in squares of four trees each. There is some variety in this manner, but the effect & object, in each case is to let in the sun’s rays so as to make the land productive for other purposes. In order to suffer cattle to graze without injury to trees, they are engrafted about six feet from the ground, the limbs generally take a direction upward more than usual…cxx

Josiah Adams’ observations concerning Nathaniel Bennett’s apple orchard elucidated changing attitudes toward conceptions of agricultural space among progressive agriculturalists in regards to the traditional mixed agricultural endeavors of New England farmers. Progressive agriculturists viewed the reordering of agricultural space as a necessary component for increasing yields and moving from mixed agricultural or extensive agricultural methods of cultivation toward the more rigid tenets of intensive agricultural specialization. Accordingly, agricultural reformers across New England, New
York, and Eastern Ohio endeavored to fundamentally change the way in which their rural smallholding counterparts perceived their agricultural spaces in the third and fourth decades of the nineteenth century. Yeomen, however, resisted such spatial and agricultural change as it often jeopardized traditional mixed agricultural practices. Resistance was not merely recalcitrance against agricultural improvement, as purported by the agricultural press, but rather a calculated response to potentially damaging agricultural changes and unwanted interference by agricultural elites.

A number of observations in Adams’ report spoke to such tensions between agricultural progress and traditional practices of mixed agriculture as practiced by rural New England smallholders. Adam noted, for example, that Bennett’s trees were grafted, perhaps the one defining practice early advocates of agricultural improvement looked for as an indication that the smallholder had been brought around to the gospel of agricultural progress. Adams’ interest in the size and breadth of Bennett’s orchards was commensurate with changing elite attitudes toward the organization and agricultural import of orchard space. Many of Mr. Bennett’s more traditional neighbors would certainly not have had 540 apple trees, and probably substantially fewer than 100 on their farms. The fact that Mr. Bennett’s orchard also occupied the entirety of six lots supported his commitment toward having a specific area on his farm devoted to the orchard. Many of his more traditional neighbors might well have had their apple trees scattered about their till lots, meadow, and pasture lands.

Despite the ostensibly positive observations of Mr. Bennett’s actions that might be considered indicative of agricultural progress, Adams noted disapprovingly an equal number of traits that were reflective of a past generation of New England farmer. Adams
rather prosaically noted that Bennett spaced his trees in the orchard in such a way as to let in enough sunlight to allow for the sowing or planting of various cover crops between his orderly rows of apples trees. Adams’s rather tepid description of such spatial ordering was typical of the agricultural press, and agricultural reformers, of the early 1830s. Such men and organizations, caught in changing perceptions of agricultural progress, simply had not come to a consensus by the time of Adams’s report if such traditional practices as planting cover crops in the orchard should be abandoned in exchange for greater apple yields. Adams’s position on Bennett’s propensity to allow his livestock to amble about his orchard was much more cynical. His comment that Bennett grafted his apple trees at least six feet from the ground to allow his cattle to graze among his trees spoke volumes. Adams may not have been sure whether cover crops should be allowed in the orchard lot, however, like his elite contemporaries, he thought the orchard no place for the pasturing of livestock, even though pasturing livestock on late summer rowen in the orchard had been something of a New England tradition for uncounted generations. Adams and the Massachusetts Society for Promoting Agriculture, however, were not alone in dealing with the seeming contradictions between traditional agricultural practices and the reordering agricultural space in the name of progress in the third and fourth decades of the nineteenth century.

Traditional New England agricultural practices of mixed husbandry in the orchard proved especially difficult to change as evidenced by the pomological endeavors of William Prescott of Pepperell, Massachusetts and Thomas Rotch of Massillon Ohio. Reformers considered both men leaders in agricultural reform; however, their actions in the orchard, separated by nearly two and a half decades, reflected markedly different
worldviews. William Prescott made an initial survey of his orchards in 1835 and continued to catalog and identify other apple trees on his property though the early 1840s. Though nearly one hundred of his apple trees resided in his “young” and “old” orchards, Prescott had another eighteen trees scattered about his horse pastures, meadows, and till pastures. Most of the apple trees in his till lots and pasture were grafted, while a few in his orchards, and undoubtedly in his “old” orchard, were of natural cider or native fruit. Though his contemporaries considered Prescott a respected farmer and agricultural reformer, his apple trees were living biological referents indicative of tensions between traditional and new ways of perceiving agricultural space in nineteenth century New England.

Some thirty years later, and nearly one thousand miles west of William Prescott’s Massachusetts farm, Thomas Rotch, a Massillon, Ohio farmer, exemplified the changing perceptions of agricultural space reformers were trying to instill in smallholders. What scholars have forgotten was what gentleman farmers and the agricultural press intuitively understood, that apple growing was a truly ubiquitous part of nineteenth century agriculture. Over the course of an undetermined number of days in 1851 or 1852, Thomas Rotch carefully and methodically plotted out the spatial organization of his new apple orchard. Rotch plotted his new orchard on at least three sheets of paper which revealed the progression of thought toward the orchard as a spatial unit of his farm. The first, and most rudimentary drawing, delineated only the boundaries his orchard and kinds of summer and winter varieties he thought most prudent to set and graft. His second and third attempts illustrated how he worked around obstacles already within his orchard ground and rearranged the positions of his various summer, fall, and winter apples within
each row. After Rotch had been satisfied with the ordering of his orchard, he contacted the Elwanger Berry Nursery of Rochester, New York and placed an order for his trees for delivery the following spring.

Even Rotch, however, was not completely committed to agricultural progress in the orchard as agitated for by progressive agriculturalists, and journals like *The New England Farmer* and *The Ohio Cultivator*. Three trees, outlined differently from the rest, were interlopers in his new well ordered orchard lot, and spoke to some residual limitations on Rotch’s part to completely embrace agricultural reform as posited by pomologists like Andrew Downing. These trees, labeled simply as “cider” were not a variety but the remnants of a much older orchard neighboring his new grafted lot. Thomas Rotch may have acknowledged the value of grafted apples and new agricultural spaces; however, even his new orchard lot was inexorably connected, by a handful of native cider trees, to a less structured and more traditional heritage of northern mixed agricultural practices.

Traditionally, agricultural historians have had as much trouble finding apple trees in wills, deeds, probate records, and tax assessments, as farmers like William Prescott and Thomas Rotch had in reordering their agricultural landscapes to conform to tenets laid down in then name of agricultural reform. Many agricultural historians examining the probate records, tax valuations, and deeds, invariably the tools of agricultural scholar schooled in the tradition of the social historian, could not find orchards in tax records, land deeds, and probates, as space was not perceived in terms of orchards by many nineteenth century smallholders. Dwight Smith noted quite accurately that “apples abound” among the meadow and till lots of New England, however, they remained all but
invisible in many eighteenth and early nineteenth century tax valuations, probate records, wills, and deeds.

Another impediment toward achieving any kind of accurate count on the number of apple trees residing on farms in nineteenth century New England is that, until the third decade of the nineteenth century at least, many farmers were taxed for their apple products in terms of barrels of cider, rather than number of trees. Perhaps more vexingly for future agricultural and rural historians, when the local assessor did count apple trees among farm lots he tended only to quantify such trees in terms of orchards. That is to say much total acreage for apple trees went unrecorded or unreported across New England and upstate New York as the local assessor could not see that ten or twelve large cider trees scattered across the till lots, meadow, and pasture of a typical New England farm might produce as many barrels of cider or winter apples as one or two acres of orchard. While social historians will argue that New England farmers often lacked orchard acreage, it would not by prudent to then assume that those same farmers were found wanting for apple trees.

While orchards might well have been absent from many farms, the pastures, dooryards, and till lots of nineteenth-century New England farms, were awash in apple trees of every description. Many of these trees were seedling trees propagated only for their production of cider apples. Not a few such trees, however, produced grafted varieties of real local and vernacular heritage which betrayed the fact that agricultural progress found even subtle footing on many regional farms by the early 1840s. Scholars must rediscover what nineteenth century small holders intuitively knew: that a handful of seedling trees scattered across sixty or more acres of till and pasture accomplished the
same purpose as an orchard lot replete with neat ordered apple trees of the finest grafted sort advocated by pundits of such agrarian reform in the agricultural press of the 1830s and 1840s.

Just how common the dispersal of apple trees across farm-lots was throughout the first decades of the nineteenth century was easily discernable from a number of sources. In central New England, for example, the Massachusetts Society for Promoting Agriculture’s premium applications for best farm clearly revealed that well into the 1850s many farmers still let their apples trees ramble about their pastures and till lots with no expectation of organizing them into cohesive spatial units. Committee members found disfavor with the apple trees of James Estis of South Reading, Massachusetts, his property described as having “barely trees enough, in differing parcels, to entitle him to a premium.” Cxxiv This disfavor, however, stemmed from the very fact that the apples trees on the Estis farm were apparently spread out across most of the till and pasture lots of his farm. Billerica, Massachusetts farmer Francis Richardson had across his farm, “many old [apple] trees in most of the lots” Cxxv as well. Of the Whulen farm, committee members noted that apple trees were “growing in most of the lots” and that such trees were “well managed and productive.” Cxxvi Apple trees must have been truly ubiquitous across the acreage of the Wetherbee farm, for Mr. Wetherbee confided in his applications that he had lost count of his apples trees but that they must have numbered from 500 to 800 “over the farm.” Cxxvii Clearly, committee members for The Massachusetts Society for Promoting agriculture were dealing with competent smallholders who were maintaining and even improving their apple trees with grafted varieties, but continued to follow older
New England agricultural traditions of scattering their cider and “winter” apple trees about the tillage, meadow, and pasture lots of their farms.

Accounts of free range apple trees were not limited to farmers applying for MSPA premiums as many New England farmers made passing references to their pasture and till lot apple trees as well. Roderick Stanley of Farmington, Connecticut recounted that he went up the mountain after apples. Such trees presumably resided on some upland till or meadow lot run over with second growth cover. Stanley had a number of individual apple trees south of the canal as well. Massachusetts farmer David Greenough picked his apples in what he called the Fotman Pasture on several occasions in the mid-1820s. North of Boston, in neighboring New Hampshire, farmers seemed to have a particular proclivity for liberally adorning their pastures with apple trees of all varieties both vernacular and recognized. Thomas Coffin noted on one “fair & warm” day in 1830, that he “picked apples in the field.” Gove family members set apple trees in a field north of their barn in 1844. Even Moses Greenough probably had apple trees in his pastures when he recounted that he “pict [sic] apples” and “cleaned the field” upon his acreage at the Eaton place.

Though many farmers in New England and upstate New York made at least passing reference to scattered apple trees on their far-flung till and meadow lots, several individuals left much more specific accounts of how such trees factored into the spatial organizations of their agricultural endeavors. After the orchard, the most common place farmers might keep a couple of apple trees was in their door yards, garden, or pasture lots. Door yards and garden lots provided some measure of convenience for their proximity to the residence, and a few grafted apple trees could often be found in such locations. Apple trees might be found on the peripheral boundaries between farm lots, or
between neighbors’ properties as well. Indeed, five or seven scattered apple trees along a border wall might provide as many bushels of winter or cider apples as the orchards traditionally advocated in agricultural press.

Past the garden lot or door yard, and beyond the peripheral boundaries between other agricultural spaces, scattered apple trees were next most likely to be found in pasturage. Farmers exercised some measure of prowess for locating their apple trees on land for pasture that was not as dependent on direct sun exposure as till or mowing acreage. Apple trees located on pasture land, when fully mature, could provide some measure of shade for livestock during the summer months as well. Less often, farmers located their apple trees in meadow or till lots as well. Such locations proved less ideal as the mature trees shaded large areas that would have proved conducive to the growth of corn, English grains, garden crops, or upland English hay. New England farmers might have trees in such ostensibly inhospitable locations as woods, woodlots, or even within lots designated as swamp or lowland meadow. A number of nineteenth century farmers in New England and New York recounted just how extensively apple trees, cider and grafted market varieties alike, might be spread across farm acreage in the first five decades of nineteenth century.

The aforementioned William Prescott, of Pepperell, Massachusetts, had at least twenty apple trees scattered about his meadows, pastures, and till lots. Though many of them undoubtedly started life as hardy New England cider trees, most were grafted with one or more varieties of “winter” apples by the early 1840s. What was particularly remarkable about Prescott’s “pasture” apples was that he left such a detailed account of their locations. Prescott methodically labeled his pear and apple trees, and identified what
they had been grafted with when he could recall their origin. Placing his apple trees in pasture presented Prescott with a means to address a number of converging issues. He could place his tree upon his summer pasturage, arguably his least valuable improved lands, and, in time as his apple trees matured, offer shade to his livestock as well. Tree number 133, for example, could be found in Prescott’s “horse pasture,” while trees 121 and 122, both thought to be Prince Regent, resided near the pasture fence in his “Long Meadow.”

What was perhaps more interesting was Prescott’s acknowledgment that a number of apple trees resided in his more valuable till and meadow lots as well. In Prescott’s “old field” tree number 126, a Bowman Sweeting, resided by the road and near the boundary of the Dow farm. Tree number 127, one of the apple trees Prescott could not identify, resided in the same field east of number 126. Both tree 126 and 127 shared the “old field” with yet a third apple tree, number 128, and was of the venerable Esopus Spitzenburg variety which traced its roots to the Hudson Valley region of New York.

Although Prescott had other “field” trees, a Rhode Island Greening north of a parcel adjoining the Dow farm for example, his mowing lots were awash in apple trees as well. Prescott recounted having a Winter Sweeting “in mowing beyond Ames’s near the road.” Tree number 131, a Blue Pearmine, though Prescott reluctantly admitted it might just have well been a “Nonesuch,” was also described as being a “tree in grass just beyond Ames’s.” Trees numbered 123, 124, and 125, an unidentified variety, Ipswich Apple, and Rhode Island Greening respectively, where all likewise described as residing in mowing in a field adjacent to the Dow property. Even into the 1840s, Prescott’s apple trees resided in till, pasture, and mowing lots with equal frequency.
Carleton White, a farmer in Orange, Connecticut, just outside of New Haven, had till lots and pasture land which were covered with apple trees in the early 1850s. Ostensibly, at least, White embraced orchard reform with zeal, for he planted two new grafted orchards on his property in early 1852. Though his acreage was probably not extensive, he recorded that apple trees liberally populated the varied lots of his property. Indeed, White identified over fourteen distinct agricultural lots on his farm and at least seven were credited with having one or more apple trees residing within such spaces.

Of the seven lots White recounted as having apple trees the most unsurprising of these was his orchard lot. In 1851, White added an additional two orchards, grafted with such popular market or “winter” apples as the Baldwin, Newton Pippin, Roxbury Russet, and Northern Spy. Indeed, agricultural reformers and journals like the *New England Farmer* or the *Ohio Cultivator* would have thought White’s orchards a model example of how agricultural improvement in the apple orchard should be carried out by every smallholder. Other lots on the White grounds, however, quietly spoke to more traditional patterns of apple nomenclature in New England.

Kendall Nims, a farmer near Keene, New Hampshire, kept apple trees in his till lots, pasture, and mowing as well. Indeed, even after Nims wholeheartedly embraced orchard reform with the purchase of scions for twenty-five new market varieties in the spring of 1851, he continued to keep his apple trees dispersed. Nims himself recounted how he “worked planting scions in my mowing of Baldwin & Hubbardston pippin.” A month later, in June 1853, he confided once again that he “worked grafting apple trees in my mowing.” Nims, like many New England farmers, apparently had little reservation combining the tenets of agricultural reform by means of grafting apple trees.
and setting new orchards with traditional agrarian practices of dispersing his trees across the rural New Hampshire landscape.

The ideological struggle over redefining orchard space in nineteenth century New England was nowhere more apparent than in the proceedings and correspondence of the Massachusetts Society for Promoting Agriculture regarding the awarding of premiums for best farm and best orchard in the 1830s and 1840s. Society premiums concerning orchards and farms proved particularly insightful as they revealed both an agenda concerning the reordering of agricultural space, and the limitations under which agricultural elites thought such order might be carried out as well. Agricultural reformers undoubtedly wanted orchard space to became a ubiquitous spatial unit on the nineteenth century New England farm, however, such ancillary issues as the role of livestock in the orchard and the place of cover crops in the orchard understory still proved heated points of contention in the early 1830s. Even as elites advocated for spatial organization of orchard space as part of the gospel of agrarian reform, advocates were unsure of just how radically they ought to transform traditional perceptions of agricultural space. Perhaps the best way to elucidate such tension inherent in elites’ position toward spatial reordering is to examine more closely the process of awarding premiums in the 1830s and 1840s.

The process of putting an orchard up for premium was remarkable in its own right, and no doubt indicative of just how seriously committee members committed themselves to stratagems of agricultural reform. Committee members visited all nominated orchards and subjected trees, soil, and site, to copious examination, after which, they subjected the orchard’s owner to a rigorous questioning concerning the background of his trees. After collecting all such reports, premiums would be awarded,
although in some years, no awards would be given if the committee deemed that none of
the orchards were thought to qualify by their minimum qualifications. Clearly, committee
members dispatched their duties with an enthusiasm for detail that the average farmer
offering his orchard up for premium must have been perceived as bordering on
jealousness commensurate with the temperance crusade of the 1820s and 1830s.

The first step in getting the coveted premium for best orchard was to write a
c委员会 member and articulate such intent in a formal letter. Apparently, it was even
better form if one could cajole a friend or neighbor to enter an orchard for the orchard’s
owner. Such was the case of Marlborough, Massachusetts resident John Rendall who
wrote Timothy Prescott stating “his wish to enter William Wilkins’s orchard for a
premium” for an orchard “near the Methodist meating [sic] house.” More often,
however, the orchard owner was left to his own faculties to stump for his own orchard.
The experience of Nathan Hardy, a farmer from Waltham, Massachusetts, was typical of
orchardists who contacted the Massachusetts Society for Promoting Agriculture
concerning the annual premium for best orchard. In a letter to Joel Adams, Middlesex
Society of Husbandmen & Manufacturers, Hardy reminded Adams of “a verbal entry of
300 apple trees” the previous autumn at the society’s cattle show and went on to state
that, “If no person should have a better claim to your premiums offered on apple trees
payable in 1824 than I shall consider myself fortunate.”

After receiving all potential premium nominations, committee members assigned
one or more individuals to travel the Massachusetts countryside visiting every orchard on
the list. In October of 1828, committee members determined to personally tour the
orchard of Jeremiah Crosby, and planned to meet in Crosby’s hometown of Concord on
the twenty first. Getting committee members together for such orchard tours in townships across Massachusetts was easier said than accomplished, however. In the case of Crosby’s Concord orchard for example, only Silas Tarbell and Nathan Hardy actually made the viewing on 21 October 1828. Not surprisingly, committee members often found it easier to send one delegate to observe and take notes concerning a premium orchard. Josiah Adams, for example, on the direction of committee members, personally visited orchards in at least four Massachusetts townships, Action, Littleton, Framingham, and Concord, probably in 1830. cxxxvi

Returning from trips to potential award winning orchards, the observer or observers sent by the committee prepared a report compiling the general observations made concerning all nominated orchards for that year. Some seasons, committee members combined this list with another prepared in preparation for awarding a similar set of premiums for best farm. From this list committee members debated and ultimately made decisions on which orchards, if any, should be awarded first, second, and third prize for best orchard.

Some indication of just how few Massachusetts farmers were willing to compete for Massachusetts Society for Promoting Agriculture premiums was that Nathan Hardy, the farmer from Waltham who applied for the prize in 1824, not only won for that year but became a committee member several years later. Four seasons later in 1828 only one farmer, Jeremiah Crosby of Billerica, applied for a society premium for best orchard. Crosby indeed won a premium that year for his “skillfully managed” trees, however, the absence of competition was no guarantee that the committee would award an orchard. After a particularly bad winter in 1832, for example, and speaking of the state of
applicants’ orchards for that year, members wrote, “the committee while they feel no disposition to censure, owe it to themselves not to commend within just grounds of commendation.” Indeed, in speaking specifically of the orchards of Robert Chafin and Nehemiah Hunt, both of whom had their orchards nominated for a second & third time respectively the committee continued:

One of the orchards in particular had suffered much from the severity of the winter. The other not so much. Independent of this circumstance, however; the trees were not in (ill) healthy & flourishing state that indicated (ill) unusual care of the Cultivator, or great vigor of the tree itself. They therefore, as they believe in the discharge of their duty, award no premium.

This was not an isolated instance. The previous year in 1831, committee members elected only to award the first and second place prize for best orchard despite having a total of six applicants.

If committee members were really at a loss as to why so few Massachusetts farmers opted to compete for best orchard, one only need look at the remarks provided by observers sent to evaluate the trees of the few growers foolhardy enough to claim such awards in the 1830s and 1840s. What committee members chose to make mention of in their reports proved much more indicative of their changing perceptions of orchard space than whether or not the orchard in question was worthy of one of the society’s annual premiums. The mere fact that the society gave prizes for best orchard perhaps suggests that ideals of order, rather than agricultural prowess, provided the primary incentive for such rewards. Agricultural societies and county fairs had been awarding growers for best apples for years. It appears than that any prize for orchard had more to do with changing perceptions of agricultural order and rural beautification, rather then such issues as whether orchards produced better or more abundant apple harvests. Indeed, this makes
some measure of sense as we have already witnessed how country gentleman, book farmers, and other agricultural elites used orchard space as a means for cultivating their interests in moral reform in the early 1830s. Orchard premiums then, were ultimately more about changing ideas of spatial boundaries in nineteenth century agriculture than actual agricultural improvement. This is no more readily apparent than in committee members’ preoccupation with such issues as the age of the applicant’s trees, how they are ordered within the orchard, if they were bordered by sturdy stone walls, and most importantly, if the applicant kept his apple trees trimmed prim, and proper.

Foremost on the minds of most committee members when wandering around any potential premium orchard was to discover the age of the trees in said orchard. Josiah Adams, for example, dutifully reported to the Committee on Fruit and Forrest Trees that there resided in the orchard of Robert Chaffin, of Action, Massachusetts, 114 trees set only six to eight years prior to the nomination of his orchard. No doubt, the age of apples trees in a premium orchard gave committee members two invaluable insights into what they perceived were among the most important tenets of orchard culture. First, trees described as young, most often, less than ten years old, suggested, especially after the mid 1830s that such orchards were of grafted, rather than of “native” fruit. More importantly, trees of such youth almost always reassured committee members that they were dealing with farm spaces specifically designated for orchard culture. With the noted exception of James Estis of South Reading upon whose property evidently resided “barely trees enough, in different parcels, to entitle him to a premium,” such attention to the age of applicant’s trees allowed members to trim farmers from competing who they

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felt were too entrenched in the agricultural practices and dubious spatial organization of their fathers.

Indeed, member reports between 1824 and 1850 were replete with instances of praise or acknowledgment for young or grafted orchards. Josiah Adams made note in his report that the trees in Chaffin’s orchard dated from 1826, only six or seven years prior to Chaffin’s application for an award. According to committee reports, Nathaniel Bennett’s Framingham Massachusetts trees were only slightly older, averaging about eight years. In a similar yearly committee report probably dating from 1831, Neamiah Hunt, of Concord, Massachusetts “set out” his trees starting in 1826 and as recently as that same year. Of the other five applicants for premium that year with Hunt, in four instances the relative youth of the trees in question caught the attention of committee members. Martin Howe’s trees were only four years old while Robert Chaffin set out his trees only three to five years prior to the report. Similarly, committee members felt obligated to acknowledge that Francis Richardson’s trees, though not dated, were indeed grafted, and that the trees of Moses Sweetson were not only grafted Baldwins, but set out only four years prior in 1827ex1

There were, of course, a number of problems associated with such an agenda among committee members from the 1820s through the 1840s. Foremost among them was that not all old New England orchards were full of cider trees and many more contained such historic, stalwart, and still marketable varieties as the Baldwin, Rhode Island Greening, Roxbury Russet, and Seek-no-further. Indeed, such old trees could, and did, produce massive amounts of produce in bearing years. A more compelling issue, as experienced by John Estis, who members thought had not enough trees scattered about to
comprise and orchard, was that many good farmers grafted their old pasture and meadow apple trees in the 1830 and 1840s as well. While young trees might be indicative of a farmer invested in his orchard lot as a component of agricultural space, it was not the only route to embrace other tenets of pomological progress.

After inquiring of the youth, nomenclature, and lineage of his trees committee members queried the farmer as to the organization of his orchard. Arguably, orchards cannot exist spatially without boundaries created by the placing of apple trees in orderly rows. Unlike queries as to the age of apple trees and whether they were of grafted varieties, observations concerning the spatial order of trees had more to do with perceptions of how farmers should organize their lands rather than being indicative of more general trends toward the propagation of market or “winter” varieties exemplified in the planting of new trees and the cultivation of new varieties.

As early as 1830, Josiah Adams noted the 540 apple trees of Nathaniel Bennett’s orchard “are set a little less than two rods apart, excepting that, between every two rows, a space is left also crop wise, making the trees stand in squares of four trees each.” Though it is not entirely clear what Adams meant by “crop wise” he went on to say “the effect & object, in each case is to let in the suns rays so as to make the land productive for other purposes.” Though this might be construed at first as a tacit approval of Bennett’s commitment to cultivating the apple orchard as space for livestock and grain crops, Adams quickly chastised Bennett as the kind of farmer who would “suffer cattle to graze” in his orchard at all. Adams praised Bennett’s commitment to spatial organization in the orchard but was less sure if there was a place for livestock, traditional late summer
visitors to many New England orchards, in a rural world with ever more stringent agricultural boundaries.\textsuperscript{cxl\textdagger}

After 1830, references to the organizational qualities of a premium applicant’s orchard became even more commonplace. In Concord, Massachusetts, it did not pass unrecorded by committee members that the apple trees in Nehemiah Hunt’s orchard were “set in one and a half rods apart.” In nearby Marlborough, Massachusetts, members noted that the grafted trees of Martin Howe’s orchard “were set in 1827 in rows, thirty feet apart, all engrafted in the nursery.” The spatial organization of Robert Chaffin’s orchard in Action, Massachusetts warranted mention as well. Of Chaffin’s trees members noted, “the trees are in rows, one and a half rods apart.” In concluding the 1831 report in which the organizational prowess of Howe, Hunt, and Chaffin made special mention, committee members concluded by cautioning future premium applicants that “Trees should be set out at least two rods apart, in our opinion.” Members’ preoccupation with space and boundaries in the apple orchard manifested itself in other ways in committee reports throughout the 1830s as well.\textsuperscript{cxl\textdagger\textdagger}

Of all the committee members seeming preoccupations with landscapes rather than the actual output of the orchard, the most egregious of such observations appeared to be society members seeming fascinations with stone walls. Society members, for example, were much impressed with the orchard “well fenced with stone walls” of Jeremiah Crosby of Billerica, Massachusetts.\textsuperscript{cxl\textdagger\textdagger\textdagger} Josiah Adams noted that Nathanial Bennett’s large orchard was enclosed with well ordered stone walls as well. Issues of order, in all manifestations, seemingly permeated committee reports in the 1830s and 1840s. In fact, many members become so preoccupied with symmetry that they began to
perceive the poor condition of trees as a visible manifestation of spatial order in the orchard lot as well.

Of the many offenses which committee members charged perspective premium applicants, no arboreal impropriety was received with more distain than that of failing to properly trim apple trees. Such infractions were especially telling among many farmers in that trimming required skill sets only recently acquired by farmers whom, only a few years earlier, needed to take no such actions with their aged New England cider trees. Committee members, no doubt markedly influenced by the admonitions of the agricultural press that good pruning proved indicative of good progressive farmers, came to see the disheveled nature of untrimmed apple trees as an offense to the sense of structured order which orchard lots represented. For committee members, unkept trees spoke to the moral, or inner constitution of the farmer, and acted as disquieting visual remainders of a less spatially defined agrarian past where brambling cider trees encumbered the till lots, meadow, and pasturage of the rural New England Landscape.

The orchard of a farmer named Chaffin, whose trees straddled the Action Littleton Township line in Middlesex County, initially appeared to be a perfect candidate for a committee premium. The 114 trees were young, laid down in 1826, almost assuredly grafted, and set on “land of rather more than ordinary quality.” However, committee member Josiah Adams having visited Chaffin’s orchard declared the trees rather wanting for trimming. In fact, Adams went on to say that if Chaffin would, among other things, “take off many more limbs, which should have been removed when small, he will in a few years have a very beautiful orchard.” Adams followed up this rather backhanded compliment by commending Chaffin for his “willing [ness] to be instructed”
in such matters, and felt that “the committee are confident he will not feel injured by these suggestions.”

In a similarly blistering report, most probably written between 1828 and 1832, Francis Richardson of Billerica, Massachusetts and Horace Tuttle of Action, Massachusetts were likewise chastised by the committee for poor orchard trimming. Of Richardson’s 132 tree orchard set out in 1825, committee members complained that “they [the trees] do not however appear to have been trimmed at all; the trunks of many of them are much too short; the branches are rounded into the middle of the tree, & present an appearance which to the horticulturist need not be described; & all for want of a little trimming in season.” After spending an afternoon in Horace Tuttle’s orchard committee members similarly concluded that while “some attention has been paid to trimming, but more of it would have added greatly to the beauty of the orchard.” In keeping with committee preference toward order, manifested in rowed trees and boundaries set by sturdy stone walls, trimming was considered by members as an essential component of any orchard worthy of a committee premium.

Committee members became only more fervent in their disdain for poorly trimmed and unshapely apple trees in the 1830s. Members said of the orchard of Nehemiah Hunt of Concord Massachusetts that “a little more attention to the trimming and shaping of trees the committee think would add to their appearance and value.” On the John Estis farm in South Reading, Massachusetts, committee members similarly found that of his trees “some looked well, but others evidently want attention.” Back in Marlborough, Massachusetts the committee concluded that the trees in the orchard of Martin Howe “by a continuance of cultivation and a little more attention to pruning and
shaping the tops; Mr. Howe will make a very fine orchard of it in a few years.” In Action, Massachusetts, Robert Chafin’s orchard commanded particular reprimand from committee members. Of that Action Township farmer’s trees they rather disparagingly reported “Mr. Chafin’s trees are thrifty, but the formation of their tops very indifferent, whether owing to the species of fruit, or want of attention, the Committee are not entirely able to determine, they are inclined to however think, both these causes combined to effect the result.” They went on to say that “The Committee were sorry to find this defect, for it was apparent Mr. Chafin had spent considerable time in endeavoring to improve his orchard.”

If the committee could be, and often was, unapologetic for their disdain of poor pruning, they were equally liable to praise others for their seeming attention to that particular duty. After a pleasant few hours spent in Francis Richardson’s apple orchard, the committee concluded that “they have been very much improved by pruning the present year and the tops new present a good form.” In South Reading committee representatives gleefully reported that Moses Sweetsen’s apple trees “have been skillfully trimmed.” Such weight did a finally trimmed apple tree carry with members of the Massachusetts Society for Promoting Agriculture that the report regarding observations of the orchards of Richardson, Sweetsen, Hunt, Howe, and Chafin concluded:

The Committee remark, generally, that the vast importance of constant cultivation, and of forming the tops by pruning, do not seem to be significantly appreciated. These points require the attention of every farmer, who his growing apple trees.

The committee closed the same report by awarding the first premium of fifteen dollars to Moses Sweetsen and the second premium of twelve dollars to Frances Richardson, both
of whom members cited for the particular attention to trimming. Even more tellingly, committee members opted not to give out the third place premium to the remaining four applicants, all of who drew condemnation from committee members for poor pruning practices.cliv

If visiting committee members wanted most to see orderly rows for well groomed apple trees ensconced by formidable stone walls, what they least wanted to find was any indication such spaces were used for anything but apple culture. Josiah Adams, after viewing the sprightly orchard of Nathaniel Bennett of Framingham, Massachusetts complained bitterly that “in order to suffer cattle to graze with out injury to the trees, they are engrafted about six feet from the ground, & limbs generally take a direction upward more than usual.”clv In a less strongly worded objection, committee members took note that the “young orchard” of Captain Whulen needed extra attention “as the trees however are not yet out of reach, they are preserved by putting bows on the necks of animals and also on one of the forelegs & connecting the bows with a small iron rod.”clvi Though remaining committee reports speak nothing of till crops in the orchard it is clear that members had little affection for farmers who “suffered” their orchards grounds to be utilized in ways other than for the propagation of better market apples.

A particularly interesting theme resonating through all reports of the Committee on Fruit and Forest Trees from the late 1820s through the 1840s is that committee members consistently emphasized aesthetic appearance rather than productive qualities of the orchards put up for premium. Committee members’ preoccupations with issues of order in the orchard appear not to be correlated with any similar consideration for actual orchard production, but with perceptions of rural beautification which were directly
intertwined with orderly spatial organization on the farm. Undoubtedly such attention, to the aesthetic rather than the practical, discouraged many New England farmers from competing for society premiums.

A more compelling reason for why so few farmers competed for the society’s orchard premiums was that farmers simply did not practice apple culture in a way in which gentleman farmers and agricultural reformers could easily comprehend. This was no more powerfully evinced than in similar Massachusetts Society for Promoting Agriculture correspondence concerning the awarding of premiums for best farm. Such premiums for best farm were much more indicative of farmers’ perceptions of orchard growing regimes as apples trees were only one component of the farm and not the whole basis for awarding premiums. Though local Massachusetts farmers, in their zeal to impress committee members with their attention to the tenets of agricultural reform, often spoke of “young” orchards, they almost invariably mentioned countless apple trees dotting their pasture and mowing lots bereft of any organization representing a fruit orchard.

Levi Goodrich of Pittsfield, Massachusetts grudgingly admitted that he had “about 100 apple trees of the natural fruit most of them are old and are decaying.” In the way of an apology for the poor state of his old apple trees, Goodrich went on to say that at some point in 1832 he “fenced off two acres of land and prepared it for a fruit yard.” Another farmer, J.M. Hulberts, only cautiously admitted that while he had “90 apple trees of mostly natural fruit,” he also owned “a young orchard of [ill] grafted fruit.”

One indication of just how uncomfortably committee members—advocates for agricultural progress—and ordinary smallholders were caught amongst changing
conceptions of agricultural space can be illuminated through reports for the competition for the premium on best farms. Most applicants, as well as corresponding committee reports, spoke of the divisions of New England farms in terms of acreage, except in the case of apple trees. Reports of the Whulen farm, for example, spoke of mature woodland, young woodland, pasture, mowing, and till in terms of acres, however, apples were represented in terms of trees despite the fact that Whulen had orchard ground as well. Similarly, of the Lawrence farm of Pepperell, Massachusetts, spoke in terms of acreage concerning mowing, tillage, and pasture, but in number of trees when concerning apples. Such were not the exceptions, but the standard way in which committee members spoke of the division of agricultural space in the 1830s and 1840s.

One might expect such ambiguity in language concerning agricultural divisions on New England farms where, for so many generations, apple trees were scattered about till, mowing, and pasture. Such committee usage of numbers of trees continued to predominate even when members reported specifically on premiums for best orchard. Only in a few instances would members present the size of an applicant’s orchard in both terms of number of trees and numbers of acreage the orchard comprised. It appears committee members were thinking of agricultural space in terms of single trees, even as they advocated for the improvement of orchards, as agricultural space, defined in terms of acreage entirely devoted to the cultivation of apple trees.

Though antebellum agricultural reformers were clearly interested in reinventing local perceptions of agricultural spaces, to suggest that the apple orchard as an agricultural building block of the nineteenth century farm was wholly absent from the New England or New York landscape would, of course, be disingenuous. Just as such
northeastern farms were awash in pasture apples, so too were they peppered with prim geographically perceptible cider orchards and grafted kitchen orchards as well. Agricultural reformers were not merely interested in bringing all smallholders to construct orchard spaces replete with grafted market apples, but insisted with equal tenacity that such spaces be devoted wholly to apple growing as well. Many farmers had orchards prior to the agricultural reform movements of the third and fourth decades of the nineteenth century. However, they were multiuse spaces which farmers used as till, meadow, and pasture as they carried on their seasonal mixed agricultural regimes. Reformers increasingly saw such mixed space agricultural regimes as detrimental to the production of large volumes of new market apples. In essence, pomologists and other self styled advocates of orchard improvement wanted nineteenth century farmers to construct new agricultural spaces which little resembled traditional agricultural land use regimes on eighteenth century New England farms.

Not only was the use of the common apple orchard as mixed agricultural space almost ubiquitous prior to 1830, changes in the use of such space reflected more substantial agricultural changes in farm production in New England and New York between 1800 and 1840 as well. Farmers used their orchards for till, meadow, and pasture throughout the first half of the nineteenth century. The use of such space as till seemed to become more sporadic even as the utilization of such orchard ground as meadow appeared to gain traction among farmers, despite the best admonitions of reformers against such practices, after 1830. Similarly, the sowing of wheat, oats, and rye became less ubiquitous after 1820 even as the utilization of orchard space for corn, potatoes, or garden vegetables increased during the same period. This is not surprising, as
northeastern farmers, in general, tended to move away from wheat, rye, and barley in the first decades of the nineteenth century, and toward the cultivation of corn, potatoes, and so called “market” vegetables in the 1830s and 1840s.

It is difficult to determine whether agricultural reformers were more exasperated by the continued employment of mixed agricultural regimes in the orchard, or the penchant of their own advocates, like William Prescott or Peter Brooks for continuing to engage in such practices themselves. In the spring of 1808, Medford, Massachusetts farmer Peter Brooks “laid down” his orchard with grass seed without mixing in oats or barley. Brooks, in electing not to seed his orchard with barley or oats, reflected upon how his actions conflicted with the traditional agricultural practices of New England farmers:

Sowed grass seed in the orchard without oats or barley. Oats and barley are sown by our farmers not only to get a crop of barley or oats—but from the idea that the grass is protected from the sun. The orchard being so shaded—& oats being a great impoverisher—I chose to lay down this way.

A year later in the summer of 1809 Brooks, having taken in a respectable harvest of English grass from his orchard, reflected on the near universal propensity of New England farmers to seed their orchards with barley and oats:

Last year I laid down the orchard with grass seed alone—no oats or barley—My reason for it was that amongst so many trees no shade could be wanted for the tender grass- & that as grain impoverishes I should probably have a better crop of grass.

Satisfied with the outcome of his experiment upon the conclusion of the summer haying season, Brooks concluded simply, “I believe I judged well—I have a very fine crop.” Brook’s own words elucidate both the ubiquitous nature and reasoning behind farmers’ use of their orchards as mixed agricultural space.
As suggested by Medford farmer Peter Brooks, oats were, perhaps, the most common of English grains to repose in orchards of New Englanders and their progeny in upstate New York and Eastern Ohio. In the spring of 1840, for example, in Kennebunk Maine, the Walker family prepared their orchard for English grains much as other agrarians across New England would utilize such farm space. Work began on the 16th and 17th of April with the plowing of the sward in the orchard. On the 22nd, family members finished harrowing for oats and sowed nearly 5 ½ bushels during a warm day in the 24th of April. Though the author remained silent as to how many oats he cradled from his orchard ground that summer, such cover crops must not have been as damaging to orchard soils as agricultural reformers feared, as his thrifty cider trees produced enough apples for 13 barrels of cider in late October. Indeed, despite the admonitions of the reformers, and the objections of the agricultural press, oats could be found in orchards across New England and upstate New York well into the nineteenth century.

After oats, one could, with some regularity, find that rye, wheat, and occasionally barley were perhaps the next most common of the old English grains sown in the orchards of hardscrabble New England farmers and their progeny in New York and Ohio. The presence of barley in New England cider orchards might prove particularly ironic as cider came to be the beverage of choice for early New England agrarians because of how difficult it was to grow reliably barley on New England soils for the brewing of beer. Massachusetts farmer and amateur pomologist William Prescott confided that he sowed his “horse pasture & old orchard” with rye in the fall of 1831. Apples and rye again shared the same agricultural space on the Prescott farm in November of 1832. Albert Mason of Monroe New Hampshire noted that his hired man “Burks commenced reaping
wheat [and] drawed [sic] in my rye from [the] little orchard in the late summer of 1847 as well. Even wheat might be found in nineteenth century apple orchards. In 1841, 1847 and 1848, Monroe, New Hampshire farmer Albert Mason sowed and reaped wheat in his orchard lots. clxvii

Other cover crops residing in the apple orchards of New England, Upstate New York, and eastern Ohio took on a character that reflected changing agricultural practices in those sections of the Union during the first four decades of the nineteenth century. Nowhere was this change more noticeable or immediately perceptible than in the states of the Union comprising New England. In Maine, the Walker family of Kennebunk began planting garden crops like peas in their orchard lot at least as early as the late spring of 1841. Similarly, the Walker family complimented their rotations of more traditional English grains like oats in their orchard with the planting of peas well into the early 1850s. clxviii Concord, New Hampshire farmer Nathan Abbot must have been of like mind with Walker family of Maine, for he favored a cover crop of peas and oats in his orchard lot as well. Vermont farmer Jedediah Harris preferred a combination of peas and potatoes for his orchard lot in 1845 instead. It was not peas, but beans, which Orange, Connecticut farm Carleton White planted in his orchard lots in the early summer of 1854. Corn was not a crop well adapted for the shady confines of the nineteenth century orchard lot but does appear sparingly in such environs. Albert Mason, of Monroe, New Hampshire, recounted that he “planted corn & sowed wheate [sic] in [the] orchard in the spring of 1841. William Prescott, a farmer in Massachusetts noted that he “ploughed for corn in the young orchard and about for acres [in the] front of the house during 1839. Prescott’s description of his orchard as “young” supports the contention that corn may
have been merely a crop of expedience, which could be grown in his orchard lot until the young tree grew to shade the ground. Albert Mason also occasionally referred to his orchard, as the “little orchard” which supports the contention that his orchard was, like the orchard of William Prescott, a young orchard where corn could be cultivated while the trees were still young\textsuperscript{clxxi}

Not surprisingly, potatoes appeared to be the most important of a new generation of till crops to find a place in the nineteenth century orchards of New England farmers and upstate New Yorkers. As the agricultural region for winter and other old English grains moved west from New England and into the Genesee Country of New York (and later still, just south of the Western Reserve of Ohio) corn and potatoes came to dominate the till fields of New England which were once awash in oats, rye, and wheat. With some regularity, Albert Mason of Monroe New Hampshire supplemented the sowing of wheat and rye in his orchard with the planting, hoeing, and digging of potatoes between 1838 and 1847.\textsuperscript{clxxii} Vermont farmer Jedediah Harris and the Walker family of Kennebunk, Maine also, at least occasionally planted potatoes within their orchard lots as well.\textsuperscript{clxxiii} Similarly, Northwood, New Hampshire farmer Samuel James thought his orchard desirable for the planting of potatoes as late as the spring of 1854.\textsuperscript{clxxiv}

Perhaps one of the most misunderstood practices that a farmer might engage in within the confines of his apple orchard was of plowing the aforementioned lot in the late fall or early spring. Ostensibly, such work might be considered a necessary pretext for the harrowing and sowing of English grains, or other cover crops in the orchard. However, as with most activities carried out upon the till lots and pastures of the nineteenth-century
farmers, seasonal activities like plowing can be indicative of much more complex mixed agricultural practices.

The orchard as space for livestock was perhaps the most difficult component of the New England mixed agricultural regime carried out in New England apple orchards to elucidate. In this instance the aversion of the agricultural press and the hesitance of New England farmers to allow livestock in their orchards came from a shared appreciation for the unremitting destruction such animals might bring to the orchard. Another admonition for the separation of livestock from orchard, whether spurious or legitimate, came from the general notion that apples could be bad for livestock as well. Such general belief was hard to reconcile with the actions of agricultural and moral reformers alike who, during the temperance zeal of the 1830s and 1840s, advocated the use of old cider orchards for the fattening of hogs and just about any other creature that might saunter, graze, or abide on farmers’ pastures, till-lots, and meadows, rather than for the production of cider. Farmers who did put their old cider apples to such use, and there were many, appeared to corroborate the reluctance of agrarians to put livestock into orchards as they often collected or boiled the apples before giving them to livestock.\footnote{clxxv}

Despite such reservations, there was one time of the year where the careful management of livestock in orchard space could, and often did, reward the farmer for his endeavors. If livestock could damage trees, and apples were often believed detrimental to the animals’ well being, then “aftermath” – the second cutting – from summer mowing could only be acquired by grazing livestock just after the season’s fall windfalls were gathered or winter apples were picked. Noted Medford, Massachusetts farmer and agricultural reformer Peter Brooks instituted just such a regime in his orchards for a
number of years before the temperance movement of the 1830s radically disrupted such seasonal cycles of land use and labor.

As will be discussed later, apple trees were more likely to be found with their bovine counterparts in upland pastures than livestock found grazing through New England orchards. However, seasonal labor patterns suggest that, despite the lack of substantial corresponding evidence in farmers’ daybooks and diaries, livestock must have passed through apple orchards in the late summer months of August and September with some regularity. During the first four decades of the nineteenth century, farmers seem to have increasingly devoted the under-story of their apple orchards to the production of upland English hay. As there was little evidence that most New England and New York farmers would harvest the aftermath of “rowen” from their hay meadows rather than let in their livestock to such lots in the late August and Early September, it appears reasonable to conclude that most farmers might let their livestock into their orchards just long enough to clean up this second crop of upland English hay. That there was so little mention of such actions in farmers’ diaries is probably testament to how little time such acts consumed in the hectic late summer reaping season just prior to the corn and potato harvest. Mowing the orchard was a process that most often consumed an afternoon’s labor and, arguably, it would take the farmer’s livestock a fraction of that time to finish off the aftermath. Even lacking such direct evidence it is very difficult to imagine New England farmers who would go so far as to mow the ditches and peripheral borders of their till fields to leave such late summer rowen in their orchards untouched. If nineteenth century farmers opted to have their livestock take in rowen or aftermath, rather than to mow a second time in one season, livestock must have been frequent, if short term
visitors to the apple orchard as upland English was simply too valuable in the new agricultural economies of specialization and market agriculture in New York and New England by the 1830s.\textsuperscript{clxxvi}

Oats, wheat, Rye, Barley, and various sundry garden vegetables might populate the many orchards across New England in the first five decades of the nineteenth century; however, no other secondary agricultural activity in the apple orchard was more common in nineteenth century New England than the mowing of upland English for winter fodder. David Greenough, a Massachusetts farmer of some skill, mowed his orchard and gathered at least 110 cocks of English hay in the summer of 1822. Such utilization of orchard space was not uncommon for Greenough, for he “cocked” English Hay or “mowd [sic] clover” in his orchard in 1821, 1822, 1824, and 1825. Thomas Coffin, a farmer in neighboring New Hampshire mowed his orchard throughout the 1820s and early 1830s as well. Coffin noted that he mowed his orchard in the summer of 1829 and recorded with some apparent satisfaction for such a small harvest, that he “got in a jag of hay from the orchard mow’d [sic] last monday [sic]” in the summer of 1832 as well.\textsuperscript{clxxvii}

While the sowing of English grains in the orchard remained stagnant or even decreased in the first five decades of the nineteenth century, the role of orchard space as increased mowing acreage only seemed to gain popularity among farmers throughout the 1830s and 1840s. Northwood farmer Samuel James took in hay from his orchard in 1848, as did Ansil Adams of Vermont, who “mowed the orchard” in the summer of 1847. Massachusetts smallholder Otis Oakman gathered 23 cocks of hay in his Lot Orchard in 1851 and 1852, and took a second mowing from his orchard in 1850. The latter proved especially unusual as New England farmers preferred to have their livestock gather their
rowen on the hoof rather than waste labor hours in collecting such aftermath themselves. clxxviii

By the 1840s and early 1850s, more than a few farmers mowed their orchard lots with such seasonal regularity as to suggest that the extra tonnage of upland English hay that derived from such practices became increasingly important during this period. New Hampshire farmer Albert Mason, for example, mowed one or both of his orchards in 1844, 1846, 1849, and 1851. Other than noting the presence of “good hay weather” the only thing remarkable about Mason’s work in the orchards during these years is that orchard mowing contributed relatively little toward augmenting his hay tonnage totals for the season. In 1851, the only year Mason saw fit to record the tonnage collected in his orchard, such work only netted him another three loads of hay. Here is perhaps a fine example of just how valuable upland English had become in many parts of New England by the early 1850s, for Mason was willing to mow, rake, and cock the grasses between his apple trees for a mere three loads of hay to put up into his barns for winter. clxxix

Nathaniel Clark, a Plaistow, New Hampshire farmer, consistently mowed his Clay Swamp Orchard in the early 1850s as well. Indeed, Clark’s actions were particularly illuminating, as the disposition of his Clay Swamp lands reflected just how much fluidity there remained between designations of till, meadow, swamp, and orchard on many farms at the midpoint of the nineteenth century. Though the “Clay Swamp” was indeed low land and poorly drained, portions must, over succeeding years or even generations, have been improved for apple trees, upland English, and occasional till crops were all found within the confines of this lot. Like most farmers, Clark took in the most valuable English hay crop first, then mowed the Clay Swamp Orchard, and finally moved on to get the
natural meadow grasses during the second half of his hay season. More than likely, he would sell much of his English hay, and keep the natural meadow grasses for his livestock for the coming winter.\textsuperscript{clxxx}

Two patterns indicative of orchard mowing during this period are at least prevalent enough to warrant some consideration. First, while the sowing of English grains in the orchard appears generally to decline toward the midpoint of the nineteenth century, there is enough evidence to at least suggest that the sowing of English grass gained acceptance among farmers despite the best efforts of agricultural reformers to re-imagine orchard space as devoted only to the production of grafted apples for home and market use. Second, it appears farmers perceived the value of the hay crops culled from their orchards as something between upland English and the natural coarse meadow grasses of their father’s river meadow lots. In other words, while orchards were almost always sowed with redtop, herd’s grass, and such, the grasses were often collected separately from the rest of the upland English. In fact one consistently finds that farmers mowed their orchard lots either consecutively with or just after they brought in their upland English but always prior to bringing in their coarse or natural grasses. Perhaps the extra difficulty in mowing between the trees and a slower growing rate below the shaded branches of the orchard might account for such patterns.\textsuperscript{clxxxi}

If nineteenth-century agrarians opted not to embrace new conceptions of agricultural space in the orchard, as promulgated by the Massachusetts Society for Promoting Agricultural, and other reformers, they did so for a number of salient reasons. Foremost among them was that the gradual scattering of cider trees across farmers’ till lots, meadow, and pasture, resonated with rural smallholders on a number of sound
ecological and social grounds. In the seventeenth and eighteenth centuries, New England farmers wanted native, or “seedling” cider trees which complemented limited labor resources, as they would largely take care of themselves. Left to their own accord, cider trees would invariably migrate to the spaces in farmers’ till lots, pasture, and meadow which, by happy circumstance, were the least valuable ground for the farmers’ other agricultural endeavors and the most suitable ground for the propagation of the ubiquitous New England cider tree. This is not, of course, meant to suggest that individual apple trees would amble across the rural landscapes of New England, but that, over generations, the offspring of such cider trees would inevitably find the ground most suitable to their propagation and least suitable for the sowing of grain crops, upland English, or other till crops.

This process not only took generations, it came about only as a happy collusion between farmer and cider tree. Across New England the lines between till, pasture, and meadow were less delineated than they were in the nineteenth century and lots labeled as “till” for example, might contain unimproved and meadow acreage as well. Indeed, farmers’ diaries suggest that only a fraction of the acreage in many New England till lots was turned over and sowed with English grains or planted with corn or potatoes in any given season well into the nineteenth century. In such a world of upland meadow, till, and pasturage, cider trees quickly found a place in the marginal lands of each type of lot, or, more often, in narrow linear spaces where differing types of lot bordered one another. In this way, the patches of shallow stony soils and rock outcroppings which seemingly inhabited many New England till, pasture, and upland lots became the favorite haunts of
scattered cider trees, especially in an era when agricultural technology limited the farmer’s ability to employ such areas in other rural endeavors.

The linear interstices between agricultural lots proved even more favorable for the propagation of hardy New England cider trees as well. New England farmers discovered that such peripheral spaces, residing between till, meadow, pasture, and neighboring farm properties, were often least likely to be disturbed by the day-to-day agricultural endeavors of the smallholder. Moreover, New England farms were renowned for their seasonal crops of stone which farmers collected every spring and dragged to the borders of their till, and meadow lots. In due course, farmers transformed such “rock weed” into stonewalls delineating the boundaries of their lots. Such walls created prime ecological microclimates for the protection of young cider trees. Young seedling trees found protection along such walls from damaging winter winds and errant damage from ambling livestock. In this way, New England farmers’ cider trees gradually migrated, over generations, to the peripheral boundaries of their various farm lots. In fact, a number of prominent apple varieties, like the Middle Apple of Schoharie, New York, owe their thriftiness and discovery to the protection and shelter offered from such traditional property divisions. Though such scattering of cider trees on New England farms might be construed as a natural ecological process of dissemination over generations, farmers might have had more overt reasons for maintaining such patterns, even in the face of zealous agricultural reform.

For many farmers, there were practical socio-economic reasons for refraining from such forms of spatially regimented agricultural reform as well. New England farmers held dearly a tradition of passing agricultural lots on to sons so they could carry
on agricultural traditions with their families. Even as land pressures changed such passing of land to eldest stands in the eighteenth and early nineteenth century, scattering apples across till, meadow, and pasture lots might assure that, no matter how a farm was divided, each son might have a sufficient number of apple trees for cider and home use. Scattering apple trees maximized flexibility in parceling out farm-lots and fit in conveniently with traditional New England notions of landed inheritance. Even as such traditions eroded under land pressures in Concord, Massachusetts and other long settled townships, rural communities have long memories, and may have continued to scatter their apple trees to optimize future land divisions which might resemble those traditionally carried out in such townships.

If traditional patterns of transferring till, pasture, and meadow lots from father to son might have contributed to rural recalcitrance to more clearly defining orchard space, the township tax assessor may have shaped such ideals of agricultural space as well. It was not improbable that some astute New England smallholders may have scattered their trees across the expanse of his till lots, pasture, and meadow simply to avoid paying the townships or county assessor for another few acres of “unimproved” land in the way of a traditional orchard. Indeed, this could account for why, according to impartial travelers like Dwight Smith, and the very words of almost every farm journal examined, there was a seeming contradiction between their views that apple trees did “abound” and the equally incontrovertible fact that social historians have traditionally found only half of farmers had orchards. In such deception, apple growers were not alone, for many scholars recount that, for tax purposes, land purported to be “improved” was often in well enough shape to support summer pasturing, or even summer haying. In the same manner, the
decentralization of apple trees might ultimately prove providential for the smallholder when the tax collector came rambling around.

Nineteenth century farmers may have resisted the proper ordering of their agricultural spaces with grafted apple orchards on account of traditional limitations in seasonal labor resources as well. It would not be the first time New England farmers changed their relationship with their apple trees in order to ease pressures on valuable labor resources. Cider gained its ascendancy over beer in the second half of the seventeenth century largely because gathering cider apples in late October proved more amenable to labor resources than reaping and cradling barley and gathering hops in August and September.

Not surprisingly, labor scarcity explained, in part at least, why farmers moved away from barley and hops and toward the propagation of cider trees. Similarly, farmers faced labor issues which might compel them to continue to disperse the grafted apple trees which came into widespread popularity after the third decade of the nineteenth century as well. Gathering winter apples for regional market proved a labor intensive endeavor, and the dispersal of trees complemented other daily routines on the farm. The seasonal work journals left by many New England farmers suggest that farmers with apple trees scattered across their pasture lots and meadows might save precious labor resources by hauling manure to replenish the productivity of their lots and returning with a cartload of market apples in late fall. The dispersion of apple trees may have allowed for similar confluence of agricultural work in the spring as well. Some farmers, for example, combined the mending of fences and the running of muck and dung to their till fields and meadow with the pruning and removal of apple tree brush.
While issues of local taxation and the seasonal scarcity of labor resources may indeed have played substantive roles in farmers’ decisions to spread their apple trees about their farm lots, ecological considerations might have proven equally compelling as well. Rural smallholders who might welcome agricultural improvement were invariably faced with an unenviable decision. If New England farmers chose to abandon the cider trees of their forefathers, they also gave up several ecological advantages which came from keeping seedling apple trees. Seedling cider trees were, by their very nature, biologically different from one another, whereas the idea of grafting market apple varieties was predicated upon producing products which were biologically identical. The biological diversity of farmers’ old cider trees acted as a natural form of protection against the spread of disease among trees. In districts where farmers began collecting their trees into orchard lots, the presence of so many biologically identical trees in close proximity to one another almost guaranteed the spread of diseases like the fireblight. Similarly, any number of trees in close proximity to one another exacerbated the spread of insect infestations like the caterpillar or curculio. It is not surprising then, that in some of the oldest districts around Boston, where farmers had early embraced orchard lots, disease and insect troubles were almost as ubiquitous as the new “winter” apples they cultivated.

Indeed, elite anxiety toward the realization that the organization of grafted apples into orchard spaces brought disease and pestilence was evidenced by their queries to rural apple growers concerning the presence of such interlopers in the 1830s and 1840s. To such queries William Salisbury of Groton, Massachusetts confided that his apple trees had “been attacked by the canker worm.” In Sheffield, Massachusetts John Cooper
reported curtly that his apple trees had “never been attacked by canker worms.” Another Sheffield farmer, David Sparr, also reported that his apple trees were canker worm free, however, he must have had issue with borers as Sparr reported that “for borers [he] put ashes about the roots.” In neighboring Franklin County William Wells of Shelburne reported that his apple trees had “never been attacked by canker worms or borers.” No wonder farmers far removed from the few large urban markets for “winter” apples might be so reluctant to embrace the kind of traumatic reform in apple cultivation as advocated by elites in the agricultural presses.

Dispersal of apple trees across farm lots provided yeomen a number of ecological and economic advantages. The blooming and ripening patterns of apple trees scattered about the undulating New England landscape were affected in different ways by changes in elevation, facing, and proximity of water and woodlot lines. A number of trees scattered about farm-lots assured that most farmers never lost the entirety of their apple crops to windfall during summer storms, or to late frosts as well. As farmers (prior to 1830 anyway) were generally not interested in specializing in the “winter” apple market, having access to some apples every year proved much more beneficial than having large crops one year and losing the entire crop the following. New England farmers intuitively discovered generations prior to 1830 that the dispersal of trees mitigated the rather temperamental proclivities of the New England climate.

In this context, the conglomeration of apple tree into one orchard lot represented a dramatic change in perceptions of agricultural space. Farmers first had to pick a proper location for their orchard lot, as a poorly chosen site would not betray its weakness until the New England farmers devoted several seasons to setting, grafting, manuring, and
trimming in the orchard. Similarly, many farmers must have construed an orchard lot as an all or nothing proposition, not in keeping the their traditional values of producing small amounts of many agricultural goods. By committing to an orchard lot, farmers put all their apples in one barrel, so to speak, an action which negated the inherent value of dispersing trees across New England farm lots, and minimizing the potential of losing the entire crop to climate, infestation or disease.

Ecological considerations impacted farmers who set their trees in orchard lots in other ways as well. Though reformers, and the agricultural press, initially advocated for the cultivation of a large variety of summer, fall, and winter apples, many farmers who re-grafted their old trees or set new orchards were only willing to go so far in the name of agricultural progress. Despite such admonitions that a good farmer had thirty or more varieties, many smallholders chose to fill their orchard with but two or three varieties and perhaps reserve a small number of their trees to summer and a few other varieties for personal use. More than a few New England farmers fell into the unfortunate habit of grafting but one single variety of winter apple extensively. This, as gleefully reported in the agricultural press, plagued the farmer with a problem that was as much one of labor as it was of ecology. His trees, set as they were in one location and with one variety, would all come bearing simultaneously (and especially if they were like the Baldwin, which was notorious for dropping) most off his apple crop would end up on the orchard floor before he could possibly pick it in time. More than one smallholder must have been aware of such an unfortunate farmer, and accordingly found value in a tradition of dispersing ones trees if not diversifying the varieties he chose to cultivate.
One final indication of just how obstinately farmers held on to their traditional conceptions of agricultural space can be illuminated by the fact the many such smallholders, who indeed set new orchards in the 1830s and 1840s, not only held on to their aging pasture apples but grafted them as well. William Prescott, Peter Brooks, Kendall Nims were just a few of a countless number or progressive rural farmers who chose to graft their dispersed pasture, meadow, and till lot apple trees rather than wholly commit to placing all of their market apple trees in their orchards. Such actions were largely indicative of New England Farmers, as well as their progeny in Western New York and Eastern Ohio, who sought to keep some of the mixed agricultural spaces of their forefathers while investing in the new tenets of agricultural reform espoused by pomologists.
Josiah Adams to the Committee on Fruit & Forrest Trees, Massachusetts Society for Promoting Agriculture, (hereafter MSPA), Drawer D-2 Box 20, Folder 8, Massachusetts Historical Society, Boston, MA. Josiah Adams was fairly typical of a class of nineteenth-century agricultural elites who thought they could “improve” farmers through new methods of cultivation by educating small-holders and effacing traditional patterns of agricultural endeavor deemed, for what ever reason, as impediments toward their ideals of agricultural progress.

Ironically, farmers and a small number of elites would continue to question the gospel of intensive agriculture a century later. In 1932 H.C. Woodworth noted that “the New England fruit grower is missing an opportunity by being too intensive in his orchard management.” H.C. Woodworth, “Readjustments in Farm Organization in New England,” Journal of Farm Economics 14, no 3 (July 1932): 448.

Rotch – Wales Collection, Massillon Public Library, Massilon, OH. This correspondence includes three undated and unlabeled maps of the apple orchard including lists of varieties purchased from the Elwanger-Berry Nursery located in Rochester, New York.

There are numerous examples of scholars who had trouble quantifying apple trees from traditional sources. Daniel Vickers made general comments concerning cider and orcharding in Essex County, but was only willing to speak specifically to orchards if he could find evidence within the provincial valuation list of 1771. See Daniel Vickers, Farmers and Fishermen, 103, 201-202, 214. The tension inherent between orchard space and apple trees in eighteenth and nineteenth-century New England is inherent in Daniel Jones’s study of rural Rhode Island. Jones presents average acreage for till and meadow as well as number and types of livestock, yet intuitively suggests that every farmer had a “small orchard,” even though such trees were absent from valuations. Daniel Jones, The Economic & Social Transformation of Rural Rhode Island, 1780-1850 (Boston, MA: Northeastern University Press, 1992), 7-8. Brian Donahue has perhaps come closest to identify the patterns of colonial New England landuse that might account for the underestimation of apple trees among New England farmers.

“The Committee on Farms, Fruit and Forrest trees respectfully make the following Report.” MSPA, Drawer D-2, Folder 8.

“The premiums have been claimed only for apple orchards and farms.” MSPA, Drawer D-2 Folder 8.

“The premiums have been claimed only for apple orchards and farms.” MSPA, Drawer D-2 Folder 8.
The scattering of apple trees across till lots, meadow, and orchard might explain, in part, the perceived recalcitrance of the New England farmer toward some tenets of agricultural progress during the first four decades of the nineteenth century. In New Hampshire, resistance may have been cultural, for just as cider trees encumbered farm lots, farmers in this region had a tendency to pile their stones in their till and meadow lots rather than in wall along the peripheries of their fields. See Stewart McHenry, “Eighteenth-Century Field Patterns as Vernacular Art,” *Old-Time New England* 69 no. 1-2 (Summer/Fall 1978): 19. For stones, stumps as obstructions to mechanization, a central tenet of agricultural reform, see Clarence Danhof, “Gathering the Grass,” *Agricultural History* 3, no 4 (October 1956): 172.

The locations of William Prescott’s apple trees for this and following paragraphs are located in a text called “Farmers Notes 1828-1843,” found in the William Prescott Papers, Box 25 Folder 13, Massachusetts Historical Society, Boston, MA.

The Diary of Carleton White, 22 February, 12 March 1850, Connecticut Historical Society, Hartford, CT.

Carleton White Diary, 27, 30, November, 3 December 1850.

Nims Family Diaries & Accounts, 14 May, 4 June 1853, New Hampshire Historical Society, Concord, NH.

John Rendall to Timothy Prescott, 31 August 1839, MSPA, Drawer D-2 Box 20, Folder 8.

Nathan Hardy to Joel Adams Secretary to the Middlesex Society of Husbandmen & Manufactures, 27 January 1821. Interestingly, while this letter is indeed dated 1821, the author is interested in competing for a premium in 1824.


Josiah Adams, undated, untitled, MSPA, Drawer D-2, Box 20, Folder 8.

Josiah Adams, undated, untitled, MSPA, Drawer D-2, Box 20, Folder 8; Untitled, “The Committee on Fruit and Forrest trees respectfully make the following report,” MSPA, Drawer D-2, Box 22, Folder 13.

Josiah Adams, undated, untitled, MSPA, Drawer D-2, Box 20, Folder 8.

Josiah Adams, undated, untitled, MSPA, Drawer D-2, Box 20, Folder 8.

“The Committee on Farms, Fruit and Forrest trees respectfully make the following Report,” MSPA, Drawer D-2, Folder 13.


Josiah Adams, undated, untitled, MSPA, Drawer D-2, Box 20, Folder 8.

Josiah Adams, undated, untitled, MSPA, Drawer D-2, Box 20, Folder 8.

Josiah Adams, undated, untitled, MSPA, Drawer D-2, Box 20, Folder 8.

Unknown author and undated, “The premiums have been claimed only for apple orchards & farms,” MSPA, Drawer D-2, Folder 8.

Unknown author and undated, “The premiums have been claimed only for apple orchards & farms,” MSPA, Drawer D-2, Folder 8. The Massachusetts Society for Promoting Agriculture’s Committee on Fruit & Forrest Trees and Shrubs consisted of Josiah Adams, Benjamin Varnyouse, Rueben Brown, and Moses Whiting Esq.

Josiah Adams, undated, MSPA, D-2, Box 20, Folder 8.

“The Committee on Farms, Fruit and Forrest trees respectfully make the following Report,” MSPA, Drawer D-2, Folder 13.
“The Committee on Farms, Fruit and Forrest trees respectfully make the following Report,” MSPA, Drawer D-2, Folder 13.

Josiah Adams, undated, MSPA, D-2, Box 20, Folder 8.

Unknown, no title, MSPA, Drawer D-2 Box 20, Folder 8.

Levi Goodrich, Undated, Untitled, MSPA, Drawer D-2 Box 20, Folder 9 no. 11-12.

J.M. Hulberts,Untitled, 1838, MSPA, Drawer D-2 Box 20, Folder 9 no. 26

For the Whulen farm see “The Premiums have been claimed only for apples orchards and farms,” MSPA, Drawer D-2 Box 20 of 38 Folder 8. For the report of the Lawrence farm of Pepperell, Massachusetts see MSPA, Drawer D-2 Box 22 of 38 Folder 15: Farms 1841 – (1860s).

Peter Brooks Farm Journal, 4 May 1808, Massachusetts Historical Society, Boston, MA.

Peter Brooks Farm Journal, 3 July 1809.

MHS Peter Brooks Farm Journal, 3 July 1809.

Tobias Walker Diary, 16, 17, 22, 24 April, 24 October 1840, Maine Historical Society, Portland, ME.

For an argument that New England farmers may have sowed barley in their orchards with some regularity at the turn of the nineteenth century, despite the detrimental impact of the New England climate upon such production see the farm journal of Medford, Massachusetts farmer Peter Chardon Brooks. Peter Brooks Farm Journal, 4 May 1808, 3 July 1809.

William Prescott Diary, 31 October 1831, 7 November 1832.

Albert Mason Diary, 24 August 1847.
Albert Mason Diary, 29 May 1841, 24 August 1847, 26 May 1848. Like a number of nineteenth-century New England farmers, Albert Mason had at least two apple orchards. His were known variously as the “old orchard” and the “little orchard.”

Tobias Walker Diary, 1 May 1841, 5 May 1847. The author does not specify what varieties of beans were planted in this orchard lot. For the more traditional rotation of English crops in the Walker orchard see Tobias Walker Diary, 16, 17, 22, 24 April 1840.

Albert Mason Diary, 29 May 1841.

William Prescott Diary, 1839; the author did not specifically date his entries for this year.

Jedediah Harris Diary, 27 April 1853, Vermont Historical Society, Montpelier, VT; Carleton White Diary, 8 June 1854. Albert Mason describes his orchard as the “little orchard” on 28 October 1844, 22 May 1846, 29 September 1846, 11 May 1847, 24 August 1847. Mason also describes another orchard lot as the “old orchard” in the same entry for 11 May 1847, and again on 26 May 1848, further supporting the supposition that the “little orchard” was a young orchard of small trees where he might successfully cultivate corn until they matured.

Albert Mason Diary, 23 May 1838, 22 May 1846, 18 October 1846, 29 September 1846, 31 May 1847, 30 June 1847, 6 July 1847.

Jedediah Harris Diary, 27 April 1853; Tobias Walker Diary, 1 May 1845.

Samuel James Diary, 15 May 1854, New Hampshire Historical Society, Concord, NH.

Such tales of destruction were common in the pages of the agricultural press of the 1820s, 1830s, and 1840s. Of Nathaniel Bennett’s orchard in Framingham, Massachusetts, for example, Josiah Adams wrote that, “In order to suffer cattle to graze with out injury to trees, they are engrafted about six feet from the ground, the limbs generally take a direction upward more than usual….,” Josiah Adams, “To the Committee on Fruit & Forrest Trees,” MSPA, Drawer D-2 Box 20, Folder 8.

For early agricultural specialization, particularly in New England see Daniel Vickers, Farmers & Fisherman, 294-296. For the transitions of farmers in New York to the kinds of specialized markets which developed in New England after 1820 see Donald Parkerson, The Agricultural Transition in New York State: Markets and Migration in Mid-Nineteenth-Century America (Ames: Iowa State University Press, 1995). Parkerson purports that just as New York farmers’ production of English grains forced New England farmers to specialize after 1820, so to did the opening of lands in Ohio and

clxxvii David Greenough Diary, 20 July 1821, 29, 30 July, 24 September 1822, 24 July 1824, 2, 6, 7 July 1825, 21 July 1827; Thomas Coffin Diary, 1 July 1828, 1 July 1829, 7 July 1832.

clxxviii Samuel James Diary, 8 August 1848; Ansil Adams Diary, 12 July 1847, Vermont Historical Society, Montpelier, VT; Otis Oakman Diary, 9 July, 4 September 1850, 8, 11 July 1851, 13 July 1852, Massachusetts Historical Society, Boston, MA.

clxix Albert Mason Diary, 16 July, 5 August 1844, 1 August 1846, 30 July 1849, 18, 21 July 1851.

clxx Nathanial Clark Diary, 8, 23 July, 2 August 1851, 23 March 1852, 30 June 1853. Clark was clearly improving the grasses in his clay swamp orchard between 1851 and 1853 for he sowed clover and herds grass seed within the orchard’s boundaries. This was typical of farmers who were transitioning from natural meadows to English meadows. For the transition from “salt” or “natural” meadows to “upland English” meadows see Howard Russell, *A Long Deep Furrow*, 128-130.

clxxi Orchard mowing was a fairly ubiquitous endeavor in the first five decades of the nineteenth century. For representative examples see Ansil Adams, 12 July 1847; Harvey Basset Diary, 5 Aug., 1870, Connecticut Historical Society, Hartford, CT; Carleton White Diary, 26, 27 June 1849; Otis Oakman Diary, 9 July 1850; Albert Mason Diary, 16 July 1844; Nathanial Clark Diary, 30 June 1853; Thomas Coffin Diary, 1 July 1828; Samuel James Diary, 8 August 1848.

clxxii Regionally, the spread of seedling trees may have paralleled the spread of other flora, variously categorized as weeds, across colonial New England and upstate New York. These seeds were cast about the countryside along Native American trade corridors, as well as by French and English military exploration in the Hudson and Champlain Valleys decades prior to settlement. For examples of how weeds were dispersed in a similar fashion as posited here see Daniel Glade, “Weeds in Vermont as Tokens of Socioeconomic Change,” *Geographical Review* 81, no. 2 (April 1991): 154-155.

John Cooper, untitled, 29 October 1838, MSPA, Drawer D-2, Folder 9 No

David Sparr, untitled, 1838, MSPA, Drawer D-2, Folder 9 No 25; ashes were used as a remedy for a number of apple tree ailments.

William Wells, untitled, 1838, MSPA, Drawer D-2, Folder 9, No 22.

Interestingly, there is much scholarly work suggesting that so called recalcitrance toward agricultural reform in New England might be as much a product of ecology, climate, and geography as it was any kind of traditional rural resistance. William Parker, for example, noted that the rather reluctant adoption of horse drawn cultivating implements in New England, after their wide spread use in states of the old Northwest, was on account of the rough and hilly nature of many New England till lots. See William Parker, “A Note on Regional Culture in the Corn harvest, Agricultural History, 182-184; Similarly, Clarence Danhof pointed out that New England Farmers may have resisted the introduction of the revolving horse rake on account of the stumpy and stony nature of their upland meadows. See Clarence Danhof, “Gathering the Grass,” Agricultural History, 172.
CHAPTER V

EVIL SPIRITS IN THE ORCHARD

In the summer of 1840 an anonymous New England observer sourly remarked upon the state of New England’s ailing cider orchards:

In the commendable zeal to make our population more temperate, war has been waged against the apple trees, and some of the finest orchards have been neglected and left prey to caterpillars, canker worms and the browsing of cattle, or else from neglect of the friendly pruning knife, to divest them of suckers and diseased limbs, have gradually deteriorated both in quantity and quality of the fruit.188

Despite the persistency of such rumors of arboreal destruction, the demise of New England cider orchards as a result of the temperance crusade ultimately became little more than a passing footnote of rural fervor among scholars of antebellum agricultural history and the social movements of the Second Great Awakening. Scholars like Harold Wilson, David Ludlum, Howard Russell, and Brian Donahue elucidated such instances of cider tree destruction merely as anecdotal evidence of rustic rural participation in social reform or, at best, viewed them as a direct consequence of the temperance movement. One might argue, however, that the very real anxiety exhibited in the agricultural press, concerning rumors of orchard destruction, might speak instead to significant intersections of social and agro-ecological change in rural New England between 1824 and 1856.189
Instances of farmers cutting down their cider trees for the temperance cause began to appear in the agricultural press of New England during the early 1830s. In 1835, a correspondent for the *Maine Farmer* reported of some instances of arboreal destruction declaring, “many worthy men have resisted the march of the Temperance cause because they would have to sacrifice their orchards.” The anonymous reporter continued, “and others in their zeal to do away with the evils of excessive drinking, have actually cut down their trees.”\(^{190}\) Another such observer of the destruction purportedly visited upon New England orchards by the temperance cause chastised his fellow farmers in the summer of 1835 declaring, “the principles of temperance, rightly understood, tend toward the introduction and culture [of apples], instead of the destruction of fruit trees.”\(^{191}\) After 1837, as agriculture reformers witnessed the transformation of the temperance crusade from one of moral abstinence to one of legal suasion, references to the destruction of apple trees permeated the agricultural papers with some regularity. In 1839, for example, a farmer named Brigham was given much credit, for “he did not make cider from his apples, nor did he cut down his trees.”\(^{192}\)

Rumors of widespread destruction of New England cider orchards proved remarkably resilient, however, and intermittently appeared in the pages of regional agricultural journals throughout the following two decades. In 1844, one Maine cultivator complained acidly that “to endeavor the promotion of temperance by cutting down a valuable orchard” was indeed a reprehensible act but that “for some years past, however, this singularly absurd and monomaniacal practice has obtained in various sections of our state, and orchards without number have been destroyed, and lost to the community as a result.”\(^{193}\) During the apple picking season of that same year, another orchardist astutely
observed, “we think our friends, who for the promotion of temperance, have cut down their orchards, have shown a zeal ‘not according to knowledge.’”194 In 1847, noted agriculturist Chauncey Goodrich of Burlington, Vermont, in writing a short history of apple growing in the Green Mountain state, similarly perpetuated such rumors remarking that “during the temperance excitement some fifteen years since, many of the finest orchards were cut down.”195 Two growing seasons later in 1849, L. Durand of Derby, Connecticut lamented, “in the early stages of the temperance reform, some farmers, who had great zeal for the cause, cut down thrifty orchards.”196

By 1850, however, the ways in which New England farmers spoke of arboreal destruction changed subtly from the anxious rhetoric espoused by their fathers in the 1830s and 1840s. In 1851, a Wilmington farmer Silas Brown lamented, “but that cider drinking has been on the decline, many farmers have treated their orchards with total neglect, or made fuel of the trees, not thinking that they might have been used for better purpose than furnishing an article, to say the least, which was liable to abuse.”197 One of Brown’s New England neighbors similarly recounted “when a few years since, the distillation of cider began to be discontinued, many men were very much frightened on account of the entire loss of their orchards, and a few persons began to cut down their trees.”198 By 1850, the rhetoric of orchard destruction had changed from one where religious zealots turned on their trees in a fit of moral fervor to one couched in terms of rural economy and ideals of progress through agricultural improvement. The agro-ecological crises of the 1830s in New England had passed and agrarians could look back rationally and doubtless a bit uncomfortably, at such destruction as purportedly visited upon the cider orchards of their fathers.
Two decades earlier, however, suspicion among editors and contributors of the agricultural press that temperance crusaders might be responsible for arboreal destruction on many New England farms was not entirely unfounded. The temperance cause became once more firmly entrenched in many rural New England communities with the founding of the Hartford Society for the Suppression of Intemperance in 1823. Soon after New England clergymen Lyman Beecher and Calvin Chapman took up the reform standard for the temperance cause, and by 1830 New England’s aged cider orchards were awash in a new wave of temperance zealously which, thought many agricultural reformers, sought nothing less than the destruction of such arboreal purveyors of vicious and vapid juices cumbering the orchard, mowing, and pasturage of intemperate New England farmers. 199

Perhaps the most famous attack on New England’s venerable cider trees in the name of the temperance cause appeared in an article named, “What Shall I Do With My Apples?” that made the rounds of the various religious journals during the fall cider apple gathering season of the 1827. The author advocated for nothing less than for farmers to “consign the rest of his [cider] trees to the wood house and the land they occupy to a more profitable crop,” and that by allowing such trees to continue to encumber the ground, “he is aiding and abetting in all the mischiefs, the crimes, the family difficulties, the self-murders, which are annually produced by this execrable drink.” The same author, in a fit of evangelical fervor worthy of George Whitfield, summarily concluded that, “but for all the [apple] trees which yield liquor for the still, I say, and every friend of humanity says, and let every thrifty farmer say Burn Them.” 200

Moral suasion, however, was too often not enough to dissuade New England farmers of the cider making habits of their forefathers. As one author noted in 1835 to his
own rhetorical question, “What Shall I Do With my apples?,” he concluded, “this question has been iterated and reiterated by those who have for years been turning their apples into brandy and rolling out hogsheads of liquid death.”\textsuperscript{201} Regardless of whether one fancied such hogsheads as conveying hard cider, apple brandy, “liquid death,” or otherwise, the question posited had much import upon the more mundane seasonal cycles of labor and familial traditions of the nineteenth-century farm. A farmer’s virtuous commitment to the temperance cause was given little heed by the cider trees in his orchard, and such an inspired determination to leave the cider house unpopulated of cider apples and bereft of cider barrels only assured the farmer’s orchard, mowing, and pasture might be liberally blanketed with autumn windfalls. Many a farmer undoubtedly viewed ungathered cider apples as an annual reminder throughout the long fall season of his righteous morality in the face of a providential gift of pomological abundance.\textsuperscript{202}

If moral inducements failed to sway the Connecticut Yankee or Upstate Yorker from gathering his autumn windfalls or hooping his cider barrels, religious advocates and agricultural pundits alike were more than willing to speak to a farmer’s ledger rather than his spiritual conviction. With no little irony, however, religious reformers in particular first felt they must divest farmers of their perceived spiritual obligation to make use of the countless cider apples Providence so kindly scattered about their orchards. Of Connecticut farmers one author reported, “they were too conscientious to suffer the fair fruit with which a kind Providence had blessed them to be wholly lost.”\textsuperscript{203} Another, in answering a rhetorical question posited by lamenting farmers that “it seems so wasteful to let them rot on the ground” and that “if Providence has sent us such abundance, ought we not to take care of it?” retorted that the “deception” in such mindset “arises from the
simple fact, that a quantity of apples rotting on the ground makes show and appears to cry louder for attention, than other more profitable business.”

Relieved as he was by his moral obligation to use his apples, agricultural and reformers could then enlighten the farmers as to the dire fiscal repercussions of maintaining his cider orchard in the fast approaching era of the table apple. One such anonymous advocate concluded in the *Boston Masonic Mirror* “they [Connecticut farmers] could not make cider and afford to cart it 20 or 25 miles to market, at $1 to $1.25 per barrel.” Another purported in the *Western Luminary* that, “the interest of the land now covered by useless orcharding, would be a great addition to the yearly income of the farmer.” He went on to conclude, “but a crop that will not pay for gathering of course cannot pay any interest on the land.” Rhetoric like this provided economic incentive for farmers to abandon the cider mill when moral suasion went unheeded; however, it failed to take into account traditional nineteenth-century labor practices.

The early leadership of the temperance crusade originated in urban towns and cities like Hartford, Connecticut, Rutland, Vermont, and Boston, Massachusetts. Leaders like Lyman Beecher and Orson Murray seemed either to disregard traditional agricultural relationships with cider or simply did not understand them. They saw no difference between distilled drinks and fermented beverages. For such men and women, temperance was only understood through the context of growing urban textile cities and a burgeoning wage earning and mechanic class. In their plans for the eradication of intemperance, the slower rhythms of agricultural life in New England were never fully taken into account and recalcitrance toward the inclusion of cider in the temperance cause among farmers often mystified temperance advocates.
Many farmers were willing to embrace the ideology of moral suasion advocated by the various temperance societies; however, they were unwilling to place apple cider in the same category as rum, whiskey, and other distilled spirits. In many parts of New England the categorization of cider as an intemperate beverage by local societies only served to radicalize the movement and damper support for the temperance crusade among farmers. In Vermont, the capricious Baptist minister, Orson Murray succeeded only in splitting the Vermont Society for the Promotion of Temperance while attempting to have cider incorporated into the society’s pledge in the late 1820s.207

Among farmers, however, cider held an important place in seasonal cycles of agricultural work in New England for generations. Across New England ardent cider went hand and hand with haying and harvesting. Indeed, a Vermont law passed in 1820 exempted laborers from statutes designed to stymie public drunkenness. The collusion of cider with mowing, reaping, and cradling worked well in the rural economy for a number of salient economic, agro-ecological, and climatological reasons. Mowing season brought a particular need for the dispersion of cider among farm hands for mowing was always undertaken during the hottest, driest weeks of the summer when labor was most scarce in local neighborhoods. Many farmers remained convinced well into the 1840s that they could not get the labor they required for their mowing if they did not offer their hired hands cider or some comparable spirit. Cider of good, bad, or indifferent quality was always on hand and mowing or harvesting seasons seemed a particularly good time to clear out the cellar of last season’s barrels and satiated the thirst of mowing or reaping laborers as well.
Reformers challenged traditional rural values associated with cider and labor almost from the onset of the temperance movement in the early 1820s. By 1825, temperance zeal reached such a general level of agitation that one farmer, speaking of a hay maker who discharged his duties absent of ardent spirits, declared, “this, with many other instances (for the honor of humanity, I trust there are many) will put to rest the belief among the laboring farmers that ardent spirits are necessary—even in the hot season of haying.”\textsuperscript{208} Despite the agricultural press’ stance against intemperance through distilled beverages, cider remained a central issue among religious zealots of the temperance movement into the 1840s. Not satisfied with the destruction of cider orchards, the \textit{Temperance Almanac} again targeted farmers and cider just prior to the cider making season of 1840:

\begin{quote}
Cider is intoxicating, is an allurer to stronger drinks, and is rightfully charged with the intemperance of much of the land. It takes a long time to make a man a drunkard on cider, but when made, he is thoroughly made, is lazy, bloated, stupid, cross and ugly, wastes his estate, his character, and the happiness of his family.\textsuperscript{209}
\end{quote}

Much evidence suggests that temperance reformers’ campaign to efface the connection between cider and farm labor gained momentum throughout the 1830s and 1840s.

Northfield, Massachusetts farmer William Pomroy noted obstinately “I have used no spirituous liquor nor wine on my farm nor in my house, for 13 years last past,” While Great Barrington, Massachusetts, Joshua Lawton adamantly declared “I suffer no ardent spirits to be used my premises nor furnish any to my laborers.”\textsuperscript{210} Conversely, in what was perhaps the most eloquent answer ever offered to members of the Massachusetts Society for Promoting Agriculture in the cause of temperance, Levi Goodrich of Pittsfield, Massachusetts confided:
I have used no ardent spirits for the last six years and there has been none on my farm and I hope never will again. I had some difficulty in getting help in haying and harvesting the first year that I commenced without it I have no trouble about it now for no man that I hire expects [it.] I am satisfied from experience that I am better without it and my hired men are more contented and will do more work and, do it better without the use of ardent spirits than with it.\textsuperscript{211}

Men like William Pomory and Levi Goodrich must have been in the minority, for the interactions of temperance and farm day labor continued to abide in the undivided attention of various agricultural societies and reform minded organizations.

For other Middlesex County farmers applying for “premiums” (prizes awarded by the Massachusetts Society for Promoting Agriculture) issues of cider, labor and temperance continued to challenge committee members. MSPA committee members, after concluding their evaluation of the farm of Deacon Hubbard reported, “they will only add that no spirit of any kind is used on the farm, except a pint of Rum when the black men come to kill the hogs.”\textsuperscript{212} Francis Richardson of Billerica, Massachusetts, admitted “Ardent spirits are not used on this farm, except sometimes by laborers hired by the day.”\textsuperscript{213} In 1838, J.M. Hulbert’s 133-acre farm in Great Barrington, Berkshire County, Massachusetts, must have required much seasonal labor for he cautiously reported, “I occasionally furnish some spirits to my hands during Haying & Harvesting in very small quantities.”\textsuperscript{214} For a number of yeoman farmers in Middlesex Massachusetts, temperance zeal must have been tempered by traditional obligations to provide such “intemperate” beverages during the summer mowing and fall harvesting seasons. Still, the power of moral suasion of the temperance societies was such that premium applicants would have their neighbors believe that any use of spirits on their farms was limited only to hired laborers and mechanics.
Not surprisingly, ordinary farmers in New England and Upstate New York reacted in differing ways to the reform agenda of the temperance cause. After cider sales from his Medford estate fell consistently on the Boston market through the 1830s, Peter Brooks eventually bowed to the inexorable pressures of the temperance movement in 1840 observing that his men were “taking down [the] cider mill which I have found so out of repair that I shall have nothing done to it this year.”\textsuperscript{215} A Pepperell, Massachusetts farmer, William Prescott, made last mention of the sale of 18 barrels of “cyder” to a Mr. Dow for a mere 0.80 cents a barrel in 1833.\textsuperscript{216} Apples indeed resided on the lands of Connecticut farmer George Noyes, who attended both temperance and abolition meetings in 1841. Noyes, at least ostensibly, embraced the temperance cause, and if any of his apples ever found their way to the cider press, he never revealed such duplicity.\textsuperscript{217} Farmington, Connecticut apple grower Roderick Stanley attended no less than three meetings of the Hartford County Temperance Society in 1841. Stanley turned out small quantities of cider as late as 1839 and how committed to his new proclivity for the temperance cause remained a mystery, though he did not make any cider in the two remaining years of his diary.\textsuperscript{218}

Horatio Chandler, a New Hampshire farmer from the Mondanock near Keene felt sufficiently proud of his 1840 temperance pledge that he recorded it in his account book and diary in its entirety:

Believing that the evils resulting to our community from the use of intoxicating drinks, are more pervading & intense than those flowing from any other of the dark sources of misery which vice opens upon us – believing it to be our duty, by the obligations which cast upon us in our different capacities as patriots, philanthropists, & christians, to use our own best endeavours [sic] to eradicate those evils - & believing also, that the best mode of effecting this great object is the exercise of a moral influence in an organized form. – therefore, we the
undersigned, do agree that we will not use any intoxicating liquors as a beverage, nor traffic in them; that we will not provide them as an article of entertainment or for persons in our employment; & that in all suitable ways, we will discontinuance [sic] their use throughout the community.219

Horatio Chandler’s temperance pledge proved indicative of many taken by yeomen throughout New England and New York in the 1830s and early 1840s. The first stipulation in Chandler’s pledge, “the exercise of a moral influence in an organized form” spoke tellingly to the dual agendas of religious reformers and the agricultural press. The idea that moral influence could only be exerted through “organized form” encouraged farmers not only to join temperance societies, but was also meant to educate them that others forms of reform, such as that advocated by “book farmers” was best accomplished through organizations such as agricultural and horticultural societies, as well as through the circulation of agricultural journals. Similarly, such organizations placed the very terse clause that farmers should not “traffic” in intoxicating beverages as well, in the hopes of dissuading agrarians from the notion that they could fulfill the obligations of their temperance pledges by removing the beverage from their tables, yet churn out barrels of cider for their rural neighbors and urban brethren.

If farmers were obligated not to sell cider to their neighbors, temperance societies made it equally clear they were not to use such beverages to encourage the amiable work spirit of their hired hands. A sense that farmers became increasingly aware of the impropriety of offering cider to their hired hands was acutely evident in the trepidatious answers they often provided to the Massachusetts Society for Promoting Agriculture when asked if cider was offered to hired farm laborers. The final stipulation that farmers work for the “discontinuance” of the use of such beverages “throughout the community”
foreshadowed another happy convergence of the agendas of religious reformers and the agricultural press. Simply ceasing to produce or imbibe such beverages or to sell such spirits to one’s neighbors was no longer temperate enough. Temperance societies also held farmers accountable for spreading such zeal to their intemperate rural counterparts as well.

In 1836, a writer for the *New York Evangelist* complained bitterly of New England and New York farmers “forgetting or disregarding their pledge” that “there is nothing wrong with these men, only they have lost the handle to their conscience.” Temperance reformers and their allies in the agriculture press were not unwarranted in their accusations concerning the duplicity of many New England farmers in embracing the cause. Thomas Coffin, a New Hampshire farmer, attended at least two temperance meetings and even “went on to the plain” and “met with [the] executive committee to devise means to suppress intemperance” on at least one other occasion. Despite such “commitment” to the Temperance movement, Coffin squeezed 95 barrels of cider in 1828, and continued to regularly churn out cider through 1835, even having a neighbor Amos Couch “shingle [the] cider house” in 1832.

Another New Hampshire apple grower, Kendall Nims, who resided near the southwestern mill town of Keene, similarly had no compunction about embracing the temperance cause and continuing to make and sell cider to his neighbors. In January of 1844 Nims set out for the first of several temperance meetings he felt moved to attend that year. As summer turned to fall, however, Nims felt equally inspired to pick the apples in his Batcheller lot, take them to the mill, and squeeze said apples into barrels of cider. This temperance cider baron only compounded such indiscretions against any
temperance pledge he may have taken that spring by hauling two barrels of “liquid death” to nearby Keene to vex the good moral fiber of that New England community.223

Perhaps more surprising, despite the best if misguided efforts of the agricultural and religious press, was just how few farmers really gave up cider for the betterment of moral vitality of their families and communities in the 1830s, 1840s, and even 1850s. Ebenezer Paul, a farmer in the neighborhoods of Dorchester and Dedham, Massachusetts for example, “carried apples [to the] cider mill” as late as 1854.224 South of Dorchester, and in neighboring Connecticut, farmers were even more apt to visit the cider mill well after the religious and agricultural press purported the demise of that apple pressed beverage. Harvey Basset made cider at a local mill as late as 1854, and proved so attached to the tradition of New England cider making that he bought his own cider press in 1870.225

In neighboring New Hampshire, Monroe farmer Albert Mason occasionally made cider well into the 1840s. In fact, as late as the fall of 1851, Mason acknowledged that he “made cider today about two barrels.”226 Nathanial Clark, probably made the last barrel of cider on his Plaistow, New Hampshire farm in the fall of 1849, however, he continued to buy cider from neighbors like John Greenough well into the 1850s.227 Nathan Abbot, a farmer in both Bow and Concord, New Hampshire, made 6 ½ barrels of cider as late as 1849, and only exacerbated his “intemperate” nature by selling 5 of the aforementioned barrels to Joseph Eastman and G.W. Brown.228 John Ordway, an Epping, New Hampshire cultivator ground out “two cart full[s] of apple[s] with Mr. Norris Horn” and made 18 barrels of cider in the fall of 1855.229 Kendall Nims made small quantities of cider on his New Hampshire farm though at least the fall of 1858.230 Likewise, Samuel James, a
Northwood, New Hampshire farmer, continued hauling apples to J.E. Brown’s mill for the purpose of making “good cider” in the fall of 1853 and 1854.\(^{231}\)

In Vermont rural affinity for cider persisted well into the 1850s. Dennis Allen, a farmer and carpenter from Springfield, Vermont, “raised Orin Chittenden Cider Mill” in 1846, and “Finished Leeland’s Cider Mill . . .” in the fall of 1853.\(^{232}\) West of Lake Champlain, Empire State farmers were often just as unwilling to abandon the seedling tree and cider press. On the eve of the outbreak of the War for the Union in December 1860, Ulster County, New York farmer Oliver Tils\(^{on}\) sold 30 barrels of cider to John D. Dietz for the paltry sum of $7.50.\(^{233}\) Frances Squires, despite grafting the newest varieties, planting new apple trees and selling table apples in the Oswego, New York market, still managed to take his apples to the mill and turn them into cider as late as the fall of 1854.\(^{234}\) If farmers from Maine to New York were seemingly divided by the temperance issue, so too was the agricultural press of New England.

Most intriguing of the varied roads to orchard improvement was the almost fanatical preoccupation of both author and subscriber of agricultural journals such as the *New England Farmer* with all aspects of cider instruction and manufacture throughout the 1820s. Fully four-fifths of all articles pertaining in any way to apple culture dealt in some way with the propagation and refinement of that aforementioned spirit. Legions of rural cider connoisseurs wrote into the *New England Farmer* at surprisingly regular intervals with ever more-complicated means of procuring that salutary beverage. Others with more spiritual dispositions vigorously debated the necessity of flogging offending cider barrels for the unchristian act of fermentation on the Sabbath. The purity of cider elicited endless conjecture and one anonymous subscriber, speaking of poor cider, suggested that “our
autumnal complaints derive in great measure their existence and aliment from the use of vicious and vapid juices.”

The rhetoric of quality cider making, in many ways, presaged the rhetoric for the control of apple nomenclature spilling out of agricultural journals like the *Ohio Cultivator* in the 1840s. Self-professed cider experts filled the columns of the *New England Farmer* with such articles as “Cider,” “Good Cider,” and “On Making and Preserving Cider.” These men excelled at explaining to rural agrarians their shortcomings and offered such sage advice as “cider depends on the apple,” and that “we have a great deal of bad cider because sound and unsound apples are ground together, and no regard is paid to fermentation.”

One cider maker of the educated sort complained bitterly that “others, perhaps, tenacious of the customs of their forefathers, shut their eyes and ears to improvement, however propitious to their interest and comfort, such will probably be content to smack over their ill-favored and unwholesome beverage through life.”

Examples of the New England farmer’s insatiable appetite for making better cider were not, however, limited to the pages of the agricultural press. Peter Chardon Brooks, a wealthy retired businessmen summering annually on a substantial Medford estate, only stopped making cider when the neighboring Boston market for the beverage collapsed in the 1830s. Nearly three decades earlier, in the late fall of 1808, Brooks recounted his own adventures in making a finer cider in the pages of his farm journal:

Made an experiment as to cider. I took a barrel with one [ill] & set it on end and had it filled from the press on Monday morning. On Friday morning a perceived for the first time that the pumica & impurities had risen & formed a kind of cake on the top. In the evening it began to crack, which indicated that it would soon sink, and I then drew it off into a clean barrel by tapping it at the bottom. I found it perfectly clear & believe it will be found a great improvement.
Brook’s efforts were typical of those who sought improvement in cider quality in the early decades of the nineteenth century. Before New Englanders advocated temperance, or agitated for abolition, they participated in an ongoing and spirited debate over cider instruction allowing them to forge the communication skills needed to eventually participate in more substantive social reform. The very language of New England cider improvement was eerily similar to the rhetoric adopted by those advocating pomological oversight in Ohio two decades later. Indeed, the first years of the *New England Farmer* contain marked evidence that New England’s own rambunctious cider evangelists were ultimately the forefathers of their own unique brand of moral suasion personified not through religious fervor or temperance zealousness, but through righteous agricultural prowess as might be manifested by New Englander, New Yorker, and Ohioan alike, in the culture of the common apple orchard.

Resistance to the purported excesses of the temperance crusade against the ubiquitous New England cider tree began to pepper the pages of agricultural journals like the *Albany Cultivator and Fessenden’s Silk Manual* as early as 1835. In a pointed editorial in the summer of 1835 the author more or less effaced any pretext of a united front with his religious counterparts on the temperance issue:

> If a Farmer should set fire to his ripe crop of rye, for fear it should be made into whisky, he would not be more foolish than those who destroy their orchards lest apples should be made into cider; which is almost the only bad use of which apples are susceptible. If a fruit tree does not produce good fruit, let it be grafted from some other which does; but unless rotten or worn by age, let it not be destroyed as worthless.239

Another such writer in a growing chorus of dissenters caustically wondered how produce “evidently destined for the comfort of man” could be unworthy of cultivation simply
because such grains or fruits could be converted to alcohol? The same author concluded, “those alone who abuse the gifts of Providence, are obnoxious to public morals.”

Cider making was such a staple of the seasonal traditions of the New England farm that agricultural reformers and farmer alike could not, or simply would not, turn against that salutary beverage of their fathers without some little trepidation and no little reservation. The temperance agenda, however, began seeping into the agricultural press at about the same time as the resurgence of the second wave of temperance enthusiasm in 1824-1825. In the fall of 1824, for example, the *New England Farmer* published a letter to the editor decrying that the “direful malady [of] intemperance has become a great and prevailing evil in our country, insomuch as its dismal effects are very seemingly felt, not only by individuals and families, but by the community at large.” Interestingly, the agricultural press initially saw cider as a wholesome and beneficial alternative to distilled beverages and as such, a beneficial and providential tool to be wielded by reformers of the second temperance movement of the 1820s. Contributors and editors of the agricultural press were seemingly complacent to the real danger a more militant temperance movement posed to the making of good cider. This was amply evidenced by an article titled “Improvement In Making Cider” that shared the same page with the aforementioned editorial riling against all form of “direful malady” associated with the use of intoxicating beverages. During the 1820s and early 1830s, the more radical elements of the temperance crusade adopted an ideology where fermented beverages like cider were just as noxious to the public good as distilled drinks like brandy or whiskey.

As temperance reformers became increasingly more radical throughout the 1830s they turned from rhetoric of moral suasion to more overt acts of legal suasion.
Increasingly calls for the “long” pledge, demanding abstinence from fermented drinks like beer, wine, and cider, as well as distilled drinks, pervaded temperance societies throughout New England. Such action split the temperance society in Rutland, Vermont in the 1820s and, doubtless, alienated many farmers for which cider was an institution of rural life. Radical temperance augmented calls for legal suasion with municipal and state legislation beginning with the “Fifteen Gallon Law” in Massachusetts in 1838 and culminating with the Maine Law of 1851. By 1852, legal suasion became the preferred recourse of the temperance reform and within three years similar laws were enacted in Vermont, Massachusetts, New York, and only narrowly defeated in Ohio. In such an atmosphere of radical moral reform, agricultural journals like the New England Farmer had ample reason to suspect there was a temperate zealot behind every act of vandalism visited upon the cider orchards of New England, however, other social and agro-ecological changes proved equally complicit in such destruction.

Climate change played as much a role as social ferment in shaping farmers’ perceptions of the New England cider tree during the 1830s and 1840s. Such change began inauspiciously enough with a culmination of a balmy Indian summer that went largely unnoticed in early November of 1831, but damaged thousands of apple and peach trees only weeks before the onset of one of the coldest winters in living memory. As farmers and horticulturists later discovered in April and May of the following year, it was not the extreme cold of the preceding winter that caused such arboreal mischief. Instead, it resulted from the unseasonable warmth of November that kept sap running in fruit trees and resulted in the expansion and destruction of their vascular systems as the temperature
dropped precipitously in a matter of hours as a cold front moved through much of New England.\textsuperscript{244}

Of the destruction visited upon New England orchards during the winter of 1831-1832 one cultivator wrote, “The mischief, in the last winter, has been extended to trees and plants which have for two hundred years, uniformly endured the severity of the climate of Massachusetts.”\textsuperscript{245} In Framingham, Massachusetts, a farmer named Wheeler described similar damage in his orchard declaring that “if the winter has been as fatal to fruit trees in all parts of the country as it has been in this vicinity, the injury is incalculable.”\textsuperscript{246} One particularly poignant indication of just how destructive the winter of 1831-1832 was in Middlesex County, Massachusetts was that the Massachusetts Society for Promoting Agriculture elected not to award a premium for best orchard in 1832 as, of the only two entries they received, “one of the orchards in particular had suffered much from the severity of the winter.”\textsuperscript{247} While it is difficult to quantify just how many of New England’s venerable cider trees perished during the winter of 1831-1832, census figures reveal that, nearly a century later, a very similar winter in 1934 proved capable of destroying a substantial percentage of New England’s orchard acreage.\textsuperscript{248}

The suffering visited upon apple orchards by the cold winter of 1831-1832 was not limited to the farmers of New England alone. In New York, the swath of greatest arboreal destruction visited upon apple orchards by the frost of 1831 extended in a belt easterly from the Hudson Highlands in the neighborhood of Albany through Massachusetts to the neighborhood of Boston. Farmers, however, as far west as Erie County, New York suffered some loss or inconvenience from the frost. One Buffalo
resident, acknowledging the “extreme changeableness of the weather late winter” concluded, “at Buffalo, and in our vicinity as far as I can ascertain, no injury of the kind has accrued.” The author attributed good fortune of the Buffalo region in avoiding such mischief as visited upon the orchards of New England from the almost chronic overcast qualities of the sky brought upon by the proximity of Lake Erie.

On the far northeastern shore of Lake Ontario, Farmers in Rutland, Jefferson County, New York were less fortunate. One farmer recounted the destruction wrought upon the orchards of his neighborhood:

I noticed in your paper of 31st March, the damage the fruit trees have sustained in the eastern states; the damage is as great in quarter, or at least on my farm. My cions [sic] that were put in last spring are all black and dead to the stock. Cions [sic] from growing trees are the same, and all kinds of trees that grow in our climate are injured.

Even the Genesee country in the neighborhood of Rochester, New York, often protected from such events by the moderating influence of Lake Ontario, was not immune to the desultory effects of the frost of 1831. By August of 1832, fruit of all kinds, especially pears, peaches, and plums, proved almost impossible to come by in Rochester and neighboring towns. Dan Bradley noted with no little consternation the state of apple orchards in the Genesee Valley:

Some apple trees in young orchards, appear to have contracted a mortal disease, which has been subsequently indicated by the bark cracking open, and the tree assuming a sickly aspect.

The unprecedented severity of the winter of 1832 exacerbated the collapse of many New England bird populations as well. Such damage was not so much wrought by birds dying directly from cold, many having left the region during the winter, but “by the great scarcity of insects on which they feed.” The anonymous contributor to the New
York Farmer seemingly backed up such general feeling, observing, “the greatest mortality has been observed to prevail among that species which lives principally upon insects as swallows, martins, & c.” In New Hampshire, the Concord Gazette sourly noted “that in addition to the destruction of fruit trees by the severe winter and mice, most of the bees in that vicinity have perished, in consequence of which the market was flooded with honey.” An almost identical article, attributed to the Concord Yeoman latter appeared for the “purpose of obtaining further information” in the destruction of honeybees in the Merrimack Valley. Clearly the cold of the winter of 1831-1832 was an event without precedent throughout much of New England and New York.

The hard winter of 1831-1832 that caused so much arboreal destruction across New York and New England only presaged a number of similarly cold and droughty summers during the remainder of most of the growing seasons of the 1830s. “It truly looks melancholy,” wrote Nathan Abbot of his mowing and till lots in May of 1837, though he might just as easily been lamenting of the past five growing seasons. Farmers were provided little respite from the cold winter of 1831-1832, for it seemed much of New England and New York were blanketed in perpetual winter for much of the 1830s. Early frosts and cold summers were the new vexation of the yeoman cultivator. A “death killing frost…” recalled Connecticut farmer Samuel Pease of the evening of 14 September 1833, While Amos Ransom confided the following summer in 1834 that there were “not more than half of potatoes on [the] common,” and “no fruit of any kind.” Both Samuel Pease and Albert Mason described the growing season of 1835 as “backward,” Of the corn crop, Mason had to replant on the first of June, while, the following season in 1836, Medford, Massachusetts farmer Peter Brooks sourly noted,
“Corn miserable. – I almost doubt it coming to anything. – It is not more than 3 inches high.” Connecticut farmer William Williams anxiously noted of the spring of 1837 the many of his fruit trees were in bloom nearly a month later than average. Not even Southern New England was immune from these shorter growing seasons.

Throughout the 1820s a decade of unseasonably fine weather convinced many northern New England farmers that clearing the land actually warmed the hill country making the mixed agricultural regimes of southern New England appear ecologically viable. As the climate turned cooler during the 1830s, farmers in Vermont and Maine increasingly found that the cultivation of corn and English grains, which thrived during the relative warmth of the 1820s, became disquietingly unreliable, and transitioned to the production of livestock and upland English hay accordingly. In their orchards, an unprecedented early snowstorm in October of 1836 as well as a number of more mundane frosts and freezes in June and September throughout the 1830s contributed to many widespread regional failures of the apple crop. Within the more general context of agro-ecological transitions during the 1830s, many farmers, up against the economic and environmental margins of agricultural sustainability, were doubtless reluctant to replace dead cider trees or devote precious labor resources to those requiring urgent attention. Against the backdrop of the extraordinary climate shifts of the 1830s, it must have mistakenly appeared to many that there might well be a concerted agenda of cider tree destruction perpetuated by the pundits of the temperance cause throughout much of rural New England as thousands of dead and crippled fruit trees cumbered the landscape of New England.
After 1830, emigration from some New England states became cause for regional concern while competition from western states in agricultural goods increased exponentially as the cold summers of the 1830s pushed back the marginal limits for grain production for many farmers in Maine and Vermont. In northern New England, rural emigration from Champlain and Connecticut Valley townships, as well as from the Mondanock region of southern New Hampshire, began as early as the turn of the nineteenth century and accelerated dramatically after 1820.262 In Vermont the Merino sheep craze, in part an agro-ecological response to the climate changes of the 1830s, exacerbated anxiety over rural emigration from the Green Mountain state while wealthy landowners began appropriating the upland pastures of their less fortunate neighbors.263 This volatile combination of agricultural specialization and rural emigration might well have resulted in the abandonment of an untold number of thrifty orchards in the hill country of northern New England as farmers abandoned marginal farmlands and wealthy sheep men bought out neighboring farms for mowing and pasturage. Under such circumstances, ailing, sickly and abandoned cider trees might well have acted as biological referents on the nineteenth-century New England landscape exuding, by their very presence, a melancholy sense of regional rural decay.264

While temperate zeal, climate change, and rural emigration might all have been complicit in the seeming demise of the cider tree, moral reformers and the agricultural press sought new roles for the ailing apple trees of their fathers in the new social, economic, and agro-ecological realities of mid-nineteenth century New England. “How much better to ‘turn apples into pork, than to turn men into swine’” declared a writer for the Western Christian Advocate in 1835. In 1840 a farmer named Hunt echoed such
sentiment declaring, “hogs care nothing for corn if they can get apples.” The same season, a correspondent for the *Albany Cultivator* confided:

> By a strange oversight in rural economy, many farmers during the earlier progress of the temperance movement, not aware that apples were of so great value for animals, making pork, &c. were guilty of the folly of cutting down their orchards, an act which most of them have since had leisure to abundantly regret; and which will not probably soon be repeated, as experience shows that few parts of the farm yield a better revenue than the orchard.265

As cider fell out of favor in the 1830s, farmers increasingly became cognizant that apples might just as well be turned into pork as squeezed at the cider press.

> In the seemingly unlikely union of cider apple and swine, reformers discovered a perfect solution for the social and agro-ecological tensions of the 1830s and 1840s. Nearly two centuries earlier, cider replaced beer as the beverage of choice in colonial New England precisely because it freed up labor from barley and hops production when such labor was needed most for the reaping of English grains. Similarly, cider production required equally little care and attention in gathering cider apples from the ground in early fall, and letting hogs among the cider trees to feast on sweet apples required even less labor than gathering them for the cider press. Despite the reservations of many farmers who feared cider apples might choke livestock or result in decreasing milk yields among “milch” cows, the agricultural press encouraged such interactions of livestock and cider tree throughout the 1830s and 1840s. As farmers in northern New England transitioned toward sheep and livestock while cool summers foretold the receding of the northern limits of reliable corn and grain cultivation, cider apples may have looked increasingly promising for fattening cattle. Indeed, a number of diaries and journal articles hint that some farmers in northern New England were so close to the margins of
sustainability during the cold summers of the 1830s that fattening hogs on cider apples freed up precious English grains for consumption by family members instead.\textsuperscript{266}

Swine proved a doubly fortuitous addition to the orchard in the 1830s, for the seeming explosion of noxious orchard pests among the gangly apple orchards of New England farmers proved one of enduring ironies of the transformative changes wrought by the temperance crusade. For generations, farmers swept the under-stories of their apple orchards for windfall apples to transform into the “vapid juices” of second-rate cider. The temperance cause ended the utility of these windfalls. Almost immediately, these orphan windfalls became breeding grounds for new generations of orchard pests, most notably the apple tree worm. To vanquish the apple worm, “let hogs and sheep run into the orchard,” wrote one Maine farmer.\textsuperscript{267} “The surest mode to destroy the apple worm is to allow swine to run in the orchard,” wrote another anonymous cultivator.\textsuperscript{268} Thrifty farmers must have found fattening swine while gleaning their windfalls from their orchard a most satisfying means of preventing disease and avoiding the allure of turning their cider apples into cider during such lean times.

Turning cider apples into swine proved a convenient expedient during the social and agro-ecological transitions of the 1830s and 1840s, however, by 1850 progressive agriculturalists and book farmers began looking toward scientific agriculture and specialization to make New England farms competitive and stymie rural emigration. Youth were not just abandoning the stony soils of upland New England for the agricultural lands of the West; they also emigrated south to the mill and manufacturing towns of Connecticut, Rhode Island, Massachusetts, and southern New Hampshire. The agricultural press responded by agitating for agricultural improvement and specialization.
but wanted especially to keep young farmers pursuing agricultural endeavors in New England. Some of these reformers felt they might accomplish this in some measure by strengthening the bonds of a new generation of farmers to the land through the restoration and improvement of the aged cider trees of their fathers.

Top-grafting old cider trees seemed particularly attractive to agricultural reformers as such work required mastery of a number of new skill sets including cleaning, scraping, pruning, trimming, grafting, as well as knowledge and foresight in picking varieties that would sell well in regional markets. Indeed, New England intellectuals long valued the moral constitution and civic values of working with fruit trees. By top-grafting the ailing cider trees of their forefathers every farmer might be a horticulturist and partake in the civic and moral improvement such endeavors invariably nourished. By 1850, New England agriculture was predicated upon increasingly intensive regimes of specialization for cash exchange and few agricultural specializations available to New England farmers required more mastery of such intersections of technology and improvement than the turning of aged cider trees into producers of winter apples for cash exchange in New England’s burgeoning urban markets.269

Such agricultural regimes were representative of a new kind of New England farmer. New England yeomen could look back at transformations of their rural landscape as rational and predicated by transformations in rural commerce rather than as a result of radical ideological ferment personified by the temperance crusade.270 In 1851, a farmer named Jesse Smart nostalgically confided, “I will not, cut down the old venerable trees planted by my fathers till I first try to renovate them.”271 No longer was the demise of the cider orchard a product of overzealous farmers but the random act of few rustics who
little understood that specialization and agricultural science could place New England agriculture on par with the western states. In 1852, W.P. Coppock exuded just such renewed optimism and entrepreneurial spirit for the future of New England’s neglected cider orchards in the pages of the New England Farmer:

Thus while we hear of various persons cutting down old apple orchards and delighting in the blazing fire that does not “snap,” I feel amply repaid for the expense and labor in the successful experiments I have thus made in the saving of what was deemed useless cumbrances, and producing there from a balance fully equal to twenty dollars each.272

A newfound sense of optimism pervaded many New England farmers in the 1850s and they approached the old cider orchards of their fathers with an earnestness to improve them with the Baldwins, Seek-no-Furthers, Hubbardston Nonesuch, and Rhode Island Greenings which could be traded for cash in growing mill towns and urban markets like Boston, Lowell, Providence, Worcester, Manchester, Nashua, and New Haven.

In the three decades prior to the outbreak of the War for the Union New England farmers, country gentlemen, religious reformers and progressive agriculturists might come to regard the cider tree as an enduring biological referent for the radical transformations of the social and agro-ecological landscapes of rural New England between 1824 and 1856. The cider orchard reposed at the intersections of social ferment born of the Second Great Awakening, and rural anxiety emanating from the disquieting agro-ecological transitions exacerbated by cold summers and rampant emigration during the 1830s. The purported cider tree massacres of the 1830s were ultimately little more than a melancholy figment of an anxious agricultural press, and a century later these stories were appropriated as anecdotal evidence of social ferment by agricultural historians. However, the once ubiquitous New England cider tree might instead be
remembered as a biological bellwether of unprecedented social, economic, and agro-ecological change in mid-nineteenth-century New England. For farmers and progressive agriculturists alike, the apple tree would remain rooted at the intersections of agricultural reform, communal memory, regional identity, and moral and legal suasion throughout the northeastern states of the antebellum Union.
NOTES


190 Anonymous, “Fattening Hogs On Apples,” Maine Farmer and Journal of Useful Arts, (10 July 1835); New Englanders were not alone in reporting instances of arboreal destruction in the apple orchard. In New York, the Genesee Farmer wearily reported of New York orchards that, “a fanatic zeal has in more instances than one, led to their destruction, under the plea that they foster intemperance!” See “Fattening Hogs on Apple Pie,” The Genesee Farmer, (30 November 1833): 337. Three years later the Albany Cultivator noted “we are afraid that some, by destroying their apple-orchards, or not only diminishing their innocent family comforts, but are seriously impairing their means of honest profits.” In “The Apple Orchard,” The Family Magazine; or, Monthly Abstract of Useful Knowledge, (1836): 467.

191 “Notes by the Editor,” Fessenden’s Silk Manual and Practical Farmer 1, no. 4 (August 1835): 61.


“Apples As Food For Animals,” *The Cultivator* 1, no. 10 (October 1844): 308.


L. Durand, “Cultivation of Orchards – Temperance,” *The Cultivator* 6, no. 10 (October 1849): 317. Interestingly, there is much anecdotal evidence in farmers’ diaries, farm journals, and daybooks across New England that apple trees were cut down throughout the 1830s. However, similar instances can be found in dairy entries from the 1840s and 1850s as well suggesting that the removal of older apple trees was a fairly common practice on nineteenth-century farms. See for example, the Diary of Erastus Williams, 30 March 1832, Vermont Historical Society, Montpelier, VT; the Diary of William Prescott, n.d. 1834, Massachusetts Historical Society, Boston, MA; the Diary of Thomas Coffin, 24 April 1834 and 25 February 1835, New Hampshire Historical Society, Concord, NH; the Diary of Roderick Stanley, 16 January 1839, Connecticut Historical Society, Hartford, CT.


Burn Them, “What Shall I Do With My Apples?,” *Western Luminary* 4, no. 21 (21 November 1827): 161; both quotes are taken from this article. This article originally appeared in *The Religious Intelligencer* 12, no. 19 (6 October 1827): 299.
The agricultural and religious press thought that many farmers felt compelled to use the cider apples given them rather than let them go to waste. See “A Good One,” *Boston Masonic Mirror* 5, no. 11 (7 September 1833): 4; “What Shall I Do With My Apples?” *Western Luminary* 4, no. 21 (21 November 1827): 161.


“What Shall I Do With My Apples?” *Western Luminary* 4, no. 21 (27 November 1827): 161.


“What Shall I Do With MY Apples?” *Western Luminary*, 4, no. 21 (27 November 1827): 161; This article appeared first during the start of the apple harvest in the *Religious Intelligencer*, 6 October 1827, and again at the start of cider making season in the *Christian Advocate and Journal* on 2 November 1827.


William Pomroy, Untitled, October 1838, Records of the Massachusetts Society for Promoting Agriculture, (hereafter *MSPA*), D2 BXX FIX; Joshua Lawton, Untitled, 24 October 1838, MSPA D2 BXX FIX, Massachusetts Historical Society, Boston, MA.

Levi Goodrich, Untitled, October 1838, MSPA, D2 BXX FIX.

Committee on Fruit & Forrest Trees & Shrubs, “The premiums have been claimed only for apple orchards & farms,” Undated, MSPA D2 BXX FVIII.

Committee on Fruit & Forrest Trees & Shrubs, “The premiums have been claimed only for apple orchards & farms,” Undated, MSPA D2 BXX FVIII. A farmer named Whulen had cider trees that yearly provided 40 to 50 barrels of cider reported to the committee that “the farm is carried on with very little spirit of any kind. None but temperate men are employed unless occasionally by the day.” Committee on Fruit &
Forrest Trees & Shrubs, “The premiums have been claimed only for apple orchards & farms,” Undated, MSPA D2 BXX FVIII.

214 J.M. Hulberts, Untitled, 1838, MSPA D2 BXX FIX

215 Peter Chardon Brooks Farm Journal, 5 September 1840, Ms. N-2049 (Tall), Massachusetts Historical Society, Boston, MA. Multiple and frequent examples of the failing nature of Brook’s cider business can be found in entries for October-November of 1836-1839.

216 William Prescott Diary, 10 May 1833, Ms. N-2180 Box 25 Folder 12, Massachusetts Historical Society, Boston, MA.

217 George Noyes Diary, 1841, Diary, Noyes, George W., Connecticut Historical Society, Hartford, CT.

218 Roderick Stanley Diary, 26 January, 24 August, 26 September 1841, Ms. 74260, Connecticut Historical Society, Hartford, CT.

219 Horatio Chandler Account Book & Diary, 5 December 1840, ACC# 1957-15, New Hampshire Historical Society, Concord, NH.

220 Anonymous, “He Has Lost The Handle To His Conscience,” The New York Evangelist,” 5 March 1836) 40; this article probably originally appeared in the Temperance Star.

221 Thomas Coffin Diary, 22 March 1831, ACC# 1967-44 (M), New Hampshire Historical Society, Concord, NH; Thomas Coffin attended two other Temperance meetings presented by Dr. Wood and Dr. Long respectively on 25 February 1830 and 26 February 1832.

222 Thomas Coffin Diary, 5 November 1828, 20 October 1829, 9 October 1830, 14 October 1831, 14 November 1833, 24 October 1834, 1-2 April 1832.

223 Nims Family Diaries & Accounts, 16-18 October, 6-8 November 1844, ACC# 1969-23, New Hampshire Historical Society, Concord, NH.

224 Ebenezer Paul Diary, 27 October 1854, Ms. N-1442 Box 1, Massachusetts Historical Society, Boston, MA.

225 Harvey Basset Diary, 5-6, 9 October 1854, 27 August – 6 September 1870, Ms. 97908 Box 3, Connecticut Historical Society, Hartford, CT.
Albert Mason Diary, 24 October 1851. For examples from the 1840s see Albert Mason Diary, 5-6 November 1846, ACC# 1966-22, New Hampshire Historical Society, Concord, NH.

Nathanial Clark Diary, Clark Family Papers, 5 October 1849, and 8 November 1852.

Nathan Abbot Diaries, 9 November 1849, ACC# 1986-12, New Hampshire Historical Society, Concord, NH.

John Ordway Diary, 19-20, 22-23 October 1855, ACC# 1983-25, New Hampshire Historical Society, Concord, NH.

Kendall Nims Diary, 29 October 1858.

Samuel James Diary, 21 October 1853, 29 September 1854, ACC# 1985-031, New Hampshire Historical Society, Concord, NH.

Allen Dennis Journal & Account Book, 29 September 1846 and 19-20 October 1853, Bailey/Howe Library, University of Vermont Special Collections, Burlington, VT.

Receipt, Oliver Tilson to John Dietz, 4 December 1860, Archives, 1548, Oliver Tilson Papers, Krock Library Rare Manuscript Collections, Cornell University, Ithaca, NY.

Francis Squires Diary, 30 October 1854, Archives 1638, Krock Library Rare Manuscript Collections, Cornell University, Krock Library Rare Manuscript Collections, Ithaca, NY.


Peter Brooks Farm Journal, 12 November 1808.

“Notes By the Way No.-3,” Fessenden’s Silk Manual and Practical Farmer 1, no. 4 (August 1835): 60.


The “Fifteen Gallon Law, introduced in Massachusetts in 1838 (and repealed a few years later) was a partial form of legal suasion designed to discourage drinking by forcing taverns to sell spirits fifteen gallons at a time. The Maine Law of 1851 was a much more comprehensive form of legal suasion that banned spirits and became the bases for similar laws in half a dozen other northeastern states in the early 1850s.


It was during the winter of 1831-1832 that the agricultural press came to some kind of consensus that it was often not extreme cold that killed fruit trees but dramatic transitions of temperature culminating from a warm fall and a particularly frigid cold front. See for example “Fruit Trees,” *Christian Secretary* 27, no. 49 (9 February 1849): 4; reprinted from the *Massachusetts Ploughman*; Henry French, “What Kills the Apple Trees?,” *The New England Farmer* 4, no. 7 (July 1852): 325.

Agricola, “Destruction of Fruit Trees,” *New York Farmer* 5, no. 18 (3 May 1832): 166; the original letter appeared in the *New England Farmer*.

Anonymous, “Injury to Fruit Trees,” *Christian Register* 11, no. 15 (14 April 1832): 60; this article first appeared in *The Boston Daily Advertiser & Patriot*.

Untitled, Several Committee Reports on Farms, Mulberry Trees, Orchards, etc, 3 October 1832, MSPA D2 XIII.

John Black, for example, used census data to show that farms reporting apple trees in New England fell 54 percent between 1925 and 1945 and that the number of apple trees declined by 51 percent in the same period. Black attributed much of this decline to a hard freeze in 1934 and a hurricane in 1938, demonstrating that such climate change could have taken out a substantial percentage of New England apple trees during the winter of 1831-1832. See John Black, *The Rural Economy of New England: A Regional Study* (Cambridge, MA: Harvard University Press, 1950), 484-486. Unfortunately for the purposes of this study apple trees were only counted in terms of “orchard products” by county in the 1850, 1860, 1870, and 1880 census. Apple trees were
not counted in terms of individual “bearing” trees by counties until the U.S. census of 1890.


255 Nathan Abbot Diary, 2 May 1837.

256 Samuel Pease Diary, 14 September 1833.

257 Diary of Amos Ransom, following August entries for 1834.

258 Samuel Peace Diary, following April entries 1835; Albert Mason Diary, 23 May 1835.

259 Peter Brooks Farm Journal 27 June 1835; for Brooks replanting his corn on account of a cool wet spring and summer Peter Brooks Farm Journal, 10 June 1836; for Albert Mason and his troubles with corn on account of cool weather see Albert Mason Diary, 23, 26 May, 1 June 1835.

260 William Williams Diary, 2, 6, 9 May 1837, Connecticut Historical Society, Hartford, CT.


263 The transition to livestock and sheep in particular addressed such varied issues facing New Englanders as cooling temperatures, emigration, and high labor costs. See David Demeritt, “Climate, Cropping, and Society in Vermont, 1820-1850:” 142, 145-147, 153-156. Scholars such as Harold Wilson, Lewis Stilwell, P. Jeffreyp Potash, and David Demeritt have long recognized the link between sheep grazing, emigration, and land consolidation in northern New England. See Harold Wilson, “The Rise and decline of the Sheep Industry in Northern New England,” Agricultural History 9, no. 1 (January 1835): 16-17; Lewis Stilwell, Migration from Vermont, 159, 173; David Demeritt, “Climate, Cropping, and Society in Vermont, 1820-1850:” 151-153; P. Jeffreyp Potash acknowledges this link but suggests it is less pervasive in eastern townships bordering the Green Mountains. See P. Jeffreyp Potash, Vermont’s Burned-Over, District, 104-105. Hal Barron argues that Vermont farmers resisted the transition from dairy production after the wool market collapsed with the removal of protective tariffs in the 1840s as dairy production asked so much more of scarce labor resources than the pasturing of sheep. See Hal Barron, Those Who Stayed Behind, 59-68.

264 This methodology is rooted in such formative works as Yi-Fu Tuan, Landscapes of Fear (Minneapolis, MN: University of Minnesota Press, 1979; William Wyckoff, The Developer’s Frontier: The Making of the Western New York Landscape (New Haven, CT: Yale University Press, 1988); Kent Ryden, Mapping the Invisible Landscape: Folklore, Writing, and the Sense of Place (Iowa City: University of Iowa Press, 1993); Simon Schama, Landscape and Memory (New York: A.A. Knopf, 1995). Over the past two decades a number of scholars in the fields of agricultural history and cultural geography have elucidated the value of trees in understanding larger social and cultural changes. See, for example, Tamara Thornton, Cultivating Gentlemen: The


266 Brian Donahue in particular has examined the intersections of ecology and labor that compelled colonial Massachusetts farmers to transition from beer to cider so as to free up labor from producing barley and hops in the summer months. See Donahue, *The Great Meadow*, 166. Despite the purported value of cider apples for livestock, the concern of farmers over feeding apples to livestock is evident in the following articles, “To Prevent Cattle from Choking,” *New Haven Gazette* 1, no. 46 (9 August 1825): 367. As for the argument that the crisis of the 1830s was real enough that some authors thought hogs should be fed with cider apples to free English grains for human consumption see “General Intelligence: Apple Pork,” *Zion’s Harold* 8, no. 19 (10 May 1837): 75; “Sweet Apples,” *Fessenden’s Silk Manual and Practical Farmer* 2, no. 8 (December 1836): 114.


268 “The Apple Tree Worm,” *Trumpet and Universalist Magazine* 20, no. 23 (20 November 1847): 92. For other examples see “A Chapter on Apples,” *Southern Cultivator* 4, no. 7 (July 1846): 103.


CHAPTER VI

WHAT SPEAK THE ORCHARDS OF OUR FATHERS?

In rural New England farmers were long rooted to the stony fields of their fathers and the ubiquitous cider tree offered compelling, if sometimes contradictory, connections to the past. Speaking of the reluctance of many farmers to remove old, decaying, or dead apple trees reposing upon the grounds of their fathers the *Maine Farmer* offered one explanation:

In most old gardens there are to be found aged remains of some favorite fruit tree, which the proprietor is unwilling to have removed, either from is having produced excellent fruit, or from early associations connected with it. Hence it still remains its place, though age, the chisel, and the pruning-knife have been hard upon it, and it remains a heartless, and almost leafless skeleton of a tree.\(^{273}\)

As to whether book farmers or religious zealots alike should smite their ailing cider trees in the name of righteous moral reform or agricultural progress, the editor of the *New England Farmer* exclaimed “why, we would not cut one of them down sooner than we would any other old friend, so long as life was evident in its familiar old trunk and limbs.”\(^{274}\)

As the religious fervor of the Second Great Awakening burned over upstate New York and eastern Ohio, New Englanders began looking to their dooryards, pastures, and country lanes for arboreal monuments, verdant symbols of a burgeoning sense of national identity. In New England, the last bastion of Federalist political ideology, the search for a
national past was only exacerbated by the long shadow of the Hartford Convention of 1815 and the continued economic hardships brought on by the depression of 1820. The enthusiastic crowds which accompanied the travels of the venerable Marquis de Lafayette and the simultaneous passing of two preeminent architects of the revolution, John Adams and Thomas Jefferson on 4 July 1826, only heightened anxiety over the widening social schism and ever-tenuous living connections between the founding generation and the present one. New Englanders came into the 1830s not only with a sense of agricultural crises stemming from cold summers, exhausted farms, and emigration to the Ohio country, but a crisis of identity as the last of a founding generation began to pass away. The apple orchard might well have been as powerful a symbol of the age as the American elm had not the native seedling trees of New England yeomanry spoke to the disquieting intersections of class, identity, and agricultural reform.  

Scholars like Thomas Campanella have argued that among New England intellectuals, it was the American elm, rather than the native cider tree, by which Yankee communities kindled some sense of national identity. Ironically, such newfound nationalism in the 1820s and 1830s initially found expression in another form of arboreal destruction as local communities cut down their Lombardy Poplars, and other foreign shade trees, and replaced them with the American elm. In an atmosphere of such national self-exploration, these arboreal offenses perpetuated against foreign “cumberers” of the ground went unrequited even as agricultural reformers decried the alleged destruction of Yankee cider trees at the hands of religious zealots. Among apple growers, whether farmers should continue to cultivate foreign varieties rather than American ones warranted serious discussion. Many writers extolled the virtues of grafting American
varieties uniquely suited to the particularities of the climates of New York and New England, thus merging the growing rhetoric of American exceptionallism with growing agitation for agricultural reform. By 1850, however, it was the American elm rather than the equally ubiquitous seedling apple tree that became infused with the symbolism of burgeoning national identity in the northeastern states of the antebellum Union.277

Why not venerate the ubiquitous seedling apple rather than the grandiose American elm, might the New England yeoman farmer have inquired of his elite neighbors. Across New England, citizen and intellectual alike were ever more aware of an absence of national antiquity as first the founding fathers and then even the common soldier were laid down in the rural cemeteries of the Union. Nature might substitute for the constructed monuments of antiquity of Europe and leave room for reflection upon the quickening cadence of life in mid-nineteenth century New England. One disquieted individual wrote of old fruit trees “as a bit of antiquity not to be slighted in these days of mushroom things”278 and in an atmosphere of change unrequited Americans looked to their dooryards, commons, kitchen gardens, and borderlands for venerable arboreal symbols of a tangible rooted past. It was not, however, the hill country farmer but the country gentleman, city merchant, and intellectual elite of Boston with which the responsibility of forging national identity through verdant living arboreal symbols resided.279

Boston’s country gentlemen and progressive agriculturists dominated agricultural reform in New England from the 1790s through the early 1840s, and were less interested in a common symbol of regional identity, like the lowly seedling apple tree, than in pursuing endeavors exacerbating class difference or venerating great men, ideals, or
events. Organized in 1792, the Massachusetts Society for Promoting Agriculture began distributing the first formative journal *The Massachusetts Agricultural Repository and Journal* in 1798 and the publication of the even more influential *New England Farmer* began in 1822. It was the book-farmers, country gentlemen and pomologists of Boston alone who might have offered the New England cider tree to the nation as an enduring American symbol of Puritan yeoman thriftiness and frugality. Early agricultural reform in Boston, however, extolled prowess, thrift, and most importantly deference to those of superior social standing. Boston after all was the birthplace of the American Revolution and the minutemen were yeomen farmers who congregated to drive the English out of the city following Lexington and Concord. Their deeds might have fostered a sense of commonality among the social classes. For a city as shrouded in the values of the Republic as Boston, however, the Bostonian elite put much their energy into maintaining stratified class divisions. Agricultural improvement was another means of separating the yeoman from the gentleman. They found the majesty of the New England elm a much more resonant symbol of New England than the “cumbering” cider tree, and if any one kind of fruit brought similar admiration from Boston’s elite it was the finicky pear rather than the ubiquitous apple.

Boston’s agricultural elite implored New England yeomanry to improve their lands and embrace scientific agriculture, regardless of the cost, even as they poured time and substantial fiscal resources into pear cultivation rather than the propagation of apple trees. In New England, pear culture proved an effective means of separating gentleman from farmer as the fruit required much greater care and were much more susceptible than apple trees to the harsh cold winters of the region. “The ‘hobby’ of Boston people,
however, is pears, and I saw more of this variety of fruit than any other,” wrote one visitor of Boston’s Horticultural Hall in 1845. The apple tree had a place on the vast country estates of the Boston elite; however, they were far too common to convey the sense of social standing that pear trees, finely bred livestock, and exotic flora conveyed. Pear culture became a kind a mania engaging the attention of most Boston horticulturists during the middle decades of the nineteenth century and was only gradually replaced by the cultivation of flowering plants and shrubs in the 1880s and 1890s.

When New England’s agricultural elite were not engaged in propagating the American elm as an arboreal connection to the events of the nation’s revolutionary past or cultivating the pear tree as means of distancing themselves from yeomen farmers, rural beautification influenced their endeavors in ways not conducive to forging the ubiquitous cider tree as regional or national monuments. Dooryards and country lanes would be the abode of shade trees like the elm, while the rural cemetery required an even more varied collection of shade trees and ornamentals. Furthermore, agricultural reformers affiliated with the Massachusetts Horticultural Society were influential in the organization of the nation’s first rural cemetery, Boston’s Mount Auburn, in 1831. The connections between agriculture, horticulture, veneration, and memory were so intertwined that even the pathways of storied Mount Auburn were given horticultural names. Clearly, Boston’s elite sought connections between trees, landscapes, moral suasion, history, and memory during the 1830s and 1840s. The very thought of the gangly un-pruned seedling cider trees of the New England yeoman shading the verdant pathways of Mount Auburn or Concord’s Sleepy Hollow burying ground would have irritated Boston’s agricultural elite. Boston’s cultivating gentlemen assured that such elite symbols as the American
elm, pear tree, and ornamentals provided the verdant living connections for these new landscapes of memory, national identity, and rural beautification.\textsuperscript{284}

The ubiquitous apple tree caused reservation among Boston’s agricultural elite for other, more disquieting, reasons. For yeomen farmers, the cider tree might create vernacular landscapes of personal or local meaning, however, for the agricultural reformer the cider tree was the ubiquitous symbol of a past age bereft of the kinds of intensive agricultural improvement which might keep New England farming competitive with the endless bounty of the western states. The gospel of agricultural improvement dictated the effacing of the aged cider orchards that held the most cultural resonance for farmers. True enough, agricultural reformers might encourage yeomen to re-graft the tops of the aged orchards of their fathers. Less clear, however, was whether such trees half in the present but rooted in the past would continue to act as living memorials for their proprietors. Regardless, the aged New England cider tree commanded enough of a presence upon the rural landscapes of a region transformed by mill and mechanic that, in spite the endeavors of Boston’s elite and with the assistance of like-minded agricultural reformers and country gentlemen, the venerable orchards of their fathers resonated with multiple meanings.

Like the American elm, the cider tree appeared to New England orchardists as ageless, though in reality most were no more than sixty to eighty years old, and many farmers might embrace such monuments as living biological connections to the founding generation of the nation. The cider tree came to be seen as uniquely American despite its European heritage. Most nineteenth-century writers spoke of the New England cider tree as “native” fully cognizant that all such trees were descendents of European stock. Such
lineage should have been a mark in favor of the cider tree as representative of New England as its transformation and thriftiness in shallow New England soils altered it just as the same influences fashioned the English Puritan into the New England Yankee. Old apple trees might be monuments as venerable as the American elm, however, they carried a cultural resonance conflicting and contradicting with the perceived values of the young Republic.

As much as Americans sought connections to their founding fathers they were equally inspired with a usable past that might predate colonization and offer a sense of antiquity as powerful as that of European nations. Though “native” almost always appeared as a synonym for “cider” or “seedling” apple trees of some distant European origin, others sought “native” apple trees of another kind to extend American identity past the youthful boundaries of European settlement. Apple and peach trees found beyond the peripheries of European settlement intrigued and perplexed pioneer and farmer alike. Many yeoman and agricultural reformers thought America’s first nations incapable of cultivating the fruit trees they found in the interior and continued to suspect Native Americans bereft of such pomological skills even after General Sullivan destroyed thousands of orchards in the lands of the Iroquois Nation during his punitive expedition of 1778.\textsuperscript{285} In 1850 farmers and agricultural reformers were not yet fully cognizant that the peach and apple had been introduced into North America centuries prior by Spanish shipwrecks along the gulf coast and inland expeditions in the southwest.\textsuperscript{286}

Samuel Preston wrote in 1828, “I wish to hear through the medium of your Farmer, the opinion of your antiquarians—were apples natives of New England?” J.M. Waters of Pennsylvania was recalcitrant in his belief that the ubiquitous apple tree was
native to the New World. Waters recounted, “In Stockbridge, Mass., I was shown an old Indian orchard; the scattered and decaying trunks, like those who planted them, soon to perish from off the earth.” Speculating as to the age of the Indian orchard at Stockbridge, Massachusetts, Waters pronounced “from the appearance of the few trees that remain, scores of years must have come and gone since they first blossomed out beside the fresh clear waters of the Housatonic.”

Waters was one of a chorus of farmers, reformers, and antiquarians who reveled in the idea that some venerable “native” apple tree might predate European colonization.

Samuel Preston, a Pennsylvania farmer, lamented, “should life and health permit me to write again, perhaps I may show a strong hypothesis, that the apple trees abounded amongst the native Indians in one part of Pennsylvania, for perhaps centuries before the continent was discovered by Europeans.” Of the fleeting remains of the Native American presence in Duchess County in the Hudson Valley of New York, one author wrote, “the sights of their corn-fields, burial-grounds, together with the old apple trees, many of them still standing, invest the place with a peculiar interest.”

J.M. Waters of Pennsylvania wrote as fervently of the apple tree being native to his own state as to the states of New England:

In Pennsylvania I have eaten the fruit from the apple trees on the river bottoms, planted by those strange people, long before the smoke of the white man’s cabin ever ascended up among the blue hills.

Samuel Preston spoke of the “native” roots of the Townsend Apple of the famed Quaker preacher Richard Townsend of Pennsylvania. “There was a spring of good water near by, and an apple tree in an Indian clearing, vastly larger than any he had ever seen in England.” Preston thought of the original Townsend “according to the growth of trees,
that tree must be older than Columbus” and “from whence the seed of that apple tree came, or when the Indians cleared a field around it, is in the dark unknown.” He concluded, “Thirty-six or eight years ago I heard the venerable tree was fast declining.”

West of the Appalachians, so long a natural barrier to agro-European endeavors in the Ohio country, near the sight of Fort Defiance, there was an aged tree known as the “Old Indian Apple Tree” and as General Wayne encamped there in 1794 was “apparently old enough to have borne the ‘forbidden fruit’” A writer for the Ohio Cultivator recounted that “Mr. Southworth, the present owner, has carefully protected the aboriginal from vandalism, by surrounding it with a high board fence, kept under lock and key.”

South of the agrarian outposts of New England in the Western Reserve and Ohio Company lands of Ohio, “native” apple trees carried similar, often disquieting, cultural resonance.

The allure of the “native” apple tree, one predating European settlement and uniquely of the New World, proved tantalizing and the agricultural press intermittently served to perpetuate rumors of such trees throughout the first half of the nineteenth century. Southerners attributed some of their best seedling apples to Native American cultivation. Foremost among these were the Wall Apple and the Nantehalle, both reputedly of Cherokee origin. Similarly, the agricultural press attributed the Junaluskee to a Cherokee chief of the same name residing in some forgotten location in western North Carolina. Of the origin of many “native” Southern apples, J. Van Buren recounted:
As a large portion of our seedling fruits have been derived from the various tribes of Indians who in times past inhabited the country, we have thought it but right to attach either names of places where they originated, the names of the originators when known, or such words or terms used by them as appeared appropriate…

Venerating Native Americans by naming the trees they left behind, however, might not have comforted every Western or Southern yeoman farmer.

Native orchards highlighted another more troubling issue for many yeomen landowners. For the small landholder, improvement was often the currency of land ownership on the periphery of Anglo European settlement. Orchards were one of the formative marks of improvement and very often a requirement for legal title by land companies in such divergent states as New York, Vermont, and Ohio. If Native Americans improved their lands in such ways, what might that say about the Anglo farmer’s right to usurp such lands? Doubtless yeomen cultivators pushed out such disquieting resonance of the “native” question of old apple tree, however, such resonance provided one more reason why the elm tree might prove a more comforting arboreal symbol of the young Republic.

The veneration of “native” apple trees had, among some farmers, one final disquieting application in the tumultuous decades of change prior to the War for the Union. The surge of manufacturing, day laborers and mechanics came not just from New England youth abandoning the farms of their fathers. Much of the change many New England and New York farmers found so unnerving was built upon an influx of new immigration from Scotland, Ireland, and the German states in the 1840s and 1850s. In the context of such regional transformations the imagery of the apple tree and the political resonance of the idea of “native” were fused together by the Know Nothing Party.
In one thinly veiled slight at the Know Nothing Party in the summer of 1855 one New York farmer speaking the true “natives” of the Mohawk Valley acidly quipped, “I can myself recollect [apple] trees, and even orchards, that were conceded to have been planted by the Natives before the ‘Know Nothings’ made an eruption into this beautiful valley.”

A Long Island farmer, Joshua Downing, compared the reverberations of the purported floodtide of European immigrants into his neighborhood as a bunch of rough boys who would destroy the branches of the apple tree of the republic with their disregard for those who had worked the land for generations:

Now my advice to Native Americans is, that they shouldn’t let any more Johnsons and Riders come over here and get up into our tree of liberty, and go to kicking among the branches. If they are a mind to eat the apples quietly and let the tree alone, it aint [sic] so much a matter. But if we keep letting so many of them, as fast as they come over into our orchard, get up into the tree and pull and haul and kick the limbs about, it’s my opinion they’ll not only carry of the best part of the fruit, but spoil the tree into the bargain.

For Joshua Downing, the first Indians left nothing of themselves upon the rural landscapes of New York and true “Native Americans” or “Native Apple Orchards” were, instead, the apple trees and forefathers of the current generation of the yeoman farmer.

Opposing the nativist agenda of the Know Nothings, one farmer railed against the corruption of the name of the venerable “Mittel” apple, to the less German synonym of “Middle” apple. Speaking of the corruption of the heritage “Mittel” apple he said, “I have little fear that the Native or Know Nothing party will vote it out of Herkimer County, even if proof could be found that it was brought from abroad by a Roman Catholic.”

Contested as the imagery of the “native” apple tree was in the first decades of the nineteenth century, it is little wonder farmers, agricultural reformers, country gentleman,
mechanics, and laborers could never arrive at any consensus as to what such trees said of their changing agrarian society.\textsuperscript{301}

If such men found it difficult to venerate native apples trees they took solace in the imagery of the aged colonial apple tree acting as a biological memorial to the more cohesive national past of their Puritan forefathers and the revolutionary founders of the Republic. Tales of old apple and pear trees originating with the founders of the various New England and Middle colonies gained increasing attention in the press after 1830. The Wyllis Apple tree at the Charter Oak Place in Hartford, Connecticut was regarded as one of the oldest apple trees in America having been “brought from England by George Wyllis, the elder, about the year 1637.” Being described as “a mere wreck,” it was still noted for bearing “a few fair apples,” as late as 1847. Mr. R.L. Colt, Esq. of Paterson, N.J. took scions from the venerable tree to graft in his orchard “having no faith in the idle theory that of varieties running out.”\textsuperscript{302} Aged apple or pear trees of colonial heritage still bearing fruit drew particular admiration from farmers, reformers, and country gentleman as they combined veneration with emerging discourses of thrift and the value of producing even in old age or under circumstances of duress. This was a welcome lesson among the exhausted rural communities of an ailing New England.

In 1834 a Hingman, Massachusetts farmer spoke of a Seek-no-further apple tree on his farm that “One hundred years ago, this tree was called ‘old’ and was probably planted by one of the Pilgrim fathers.”\textsuperscript{303} A writer for the \textit{Saturday Evening Post} purported that the largest of the old apple trees of the Americas was one known as “The President” on the William B. Schoener farm of Reading, Pennsylvania and was thought to be well over one hundred years old in 1857.\textsuperscript{304} A writer for the \textit{Maine Farmer} in 1847
thought one of the apple trees in what was reputedly the first orchard set out in New
England at the Peregrine White farm in Plymouth Colony still alive, only a few years
prior. Speaking of the venerable apple tree of Peregrine White in the town of
Marshfield, the New England Farmer reported in 1852 that White (the first male child
born in New England) died in 1704 at age 83. The anonymous author concluded:

The tree was planted probably about the year 1648, consequently is now two
hundred and four years old, but still vigorous, and has produced ‘fruit every year
without interruption’ as far as the memory of the present owner—one of Mr. W’s
descendents of the fifth generation extends. Here again the author’s article entitled “Old Apple Trees” in the New England Farmer
spoke not only to the veneration of the apple tree as living memorial to the Puritan
forefathers, past and present, thrift and industry, but also to the idea that value of place
and rootedness were inexorably intertwined. The aged “vigorous” tree still bore yearly
and a descendent of the White family still harrowed the same land and gathered from the
same tree five generations later. Imagery as described here must have warmed the heart
of yeoman farmer wrought anxious by perceptions of worn out land and emigrating
youth.

“There is an tree on Peak’s island in Portland Harbor, that has been known to bear
fruit every season for more than a hundred years,” one Long Island farmer recounted in
1844, “I can well remember, when it was a common thing to see apple trees, not only of
vast age, but of immense stature.” He continued:

When I was but a child, I distinctly recollect the remains of an old orchard, on my
father’s farm, the principle part of which the British had cut down for fuel. Eight
or ten trees only remained, a venerable cluster in one corner of the field.
In this one article, the anonymous Long Island farmer acknowledged all the varied imagery of the venerable apple tree. The Portland tree predated the Union, yet continued to bear fruit, while the orchard of his father was witness to the founding of the nation and, indeed, suffered under the British only to remain a tangible living link to the creation of the Union. His trees probably lived still longer to witness that Union torn apart in 1861.

As much as the veneration of the American elm spoke to individuals of the founding fathers, the common winter apple or seedling orchard spoke to the personal past of the common yeoman, his land, and his immediate forefathers.

If the apple tree and cider orchard connected the New England yeomen with his forefathers, such resonance was not always so comforting an image as the American elm’s noble veneration of the founding fathers of the Republic. The cider tree stood at the intersections of the cultural landscapes of memory, identity, moral fervor, local knowledge, and agricultural improvement in mid-nineteenth century New England. The cumbering apple trees of one’s father might mark him intemperate or a poor farmer just as easily as it might cultivate rootedness to his lands and a veneration of his forefathers. In just such an instance the New England Farmer implored it readership not to worry of overproducing apples, “except such as your fathers used to grow, and some you still perpetuate.” Against such impingement of the character of their fathers, yeomen were often just as quick to implore the tacit knowledge imbued in their fathers by generations of working the same till-lot, mowing, and orchard. In another such confrontation between the editor of the New England Farmer and an unnamed yeoman, and speaking of apple trees, cider, and his forefathers, the anonymous farmer acidly remarked:
What think you Mr. Editor, of these notions of our fathers of the last age? Were they entirely in the wrong? ... Have we all at once become so much wiser and better than our fathers were? Or is it true in this, as in many other things, ‘Young folks think old folks fools, but old folks know young folks to be so.’”

Unlike the American elm, the cider tree was a living symbol of an agrarian past rendered obsolete by a new generation of intellectual reformers and the ailing seedling trees of New England could only exacerbate larger ideological differences between “book farmers,” reformers, and yeomen cultivators.

As much as agricultural reformers reviled the cultivating prowess of the preceding generation, they invoked the memory of such men to compel the current generation of farmers to embrace ever more intensive agricultural regimes. Yeomen farmers felt the weight of the passing generations of their fathers upon them as the agricultural press implored them to act as their fathers had in replanting orchards of winter apples for growing urban markets. Cognizant of the possibility that growing urban markets might not be enough to tempt the yeoman into the intensive practices of re-grafting or setting out new orchards for market fruit, the agricultural press invoked the memory of their fathers to urge them to such improvements. Of old farmers who refused to spend their few remaining years setting out new costly, labor intensive orchards “supposing our fathers had been of the same opinion, what would have been the state of our farms, when left to us?” wrote Albert Todd of Smithfield, Rhode Island. Another anonymous farmer, speaking of a general neglect of orchard culture, chastised his fellow yeoman, “Now this is all wrong; supposing our fathers had acted on this selfish principle?” Ironically, imagery of the “sour grapes” and “cumbering” trees of New England’s forefathers the
agricultural press and country gentlemen invoked were not concurrent with their expectations of yeoman farmers.

Reformers implored a current generation to act as their fathers had, however, their fathers set seedling trees which required little attention in cultivation, pruning, or grafting. They encouraged yeomen through moral suasion to plant orchards like their fathers, however, these new orchards required uncounted hours of labor in pruning, grafting, handpicking, and sorting, such as the orchards of their fathers never witnessed. Here among the disparate calls for destruction, re-grafting, setting, and moral suasion was the crux of the seeming difficulty in invoking the cider tree as a national or even regional symbol of the nation’s past. Like the work of the founding fathers, the cider tree was unfinished and waiting for the current generation to transform it through improvement. Improvement, however, threatened to transform the meaning if the seedling tree from a symbol of the thrifty yeomanry of the past to the elite product of the agrarian reformer. The seedling tree might be too contested or radical a symbol at the national or regional level, however, the imagery of the apple tree was pervasive enough to inspire local veneration across the vernacular landscapes of the northeastern Union.

The American elm might well be the arboreal representative of the vanishing revolutionary landscapes of the founding fathers in New England and the pear tree the rural marker of the Boston aristocracy. The cider orchard and apple tree, however, were the doughty monuments of the forefathers of the yeoman farmer. In a sense nearly every apple variety acted as a memorial to place or venerated some local yeoman family. Names of local varieties almost always carried reference to the place in which they originated or the surname of the first farmer to propagate the tree. Such famous names as
the Hubbardston Nonesuch, Roxbury Russet, Danver’s Winter Sweet, Westfield Seek-no-further, Esopus Spitzenbur, Newtown Greening, Chenango, Stark Sweeting, and a thousand more like them spoke to place and cultivated connections among farmers with community and their lands.

Although not quite as ubiquitous as the untold thousands of varieties that venerated some local family or a sense of place in rural society, hundreds of local varieties kept the memory of singular historic local events. The melancholy Trunk Apple of Maine conveyed the story of a loss of a son at sea and the veneration of his memory by the planting of an apple tree from a seed found in his sea trunk. In Vermont, the Chimney Apple commemorated the lonely outpost of the French Empire at Crown Point on Lake Champlain, the variety having been propagated from an abandoned apple tree found among the chimneys and crumbling walls of that sight. In New York, the Middle Apple kept alive the story of a long forgotten land dispute upon which the original tree straddled the alleged property line. In Connecticut, the “Mike” apple perpetuated the story of the murderous eighteenth-century farmer named Micah Rood and was purported to have a tiny red speck in every apple of that variety. Such was the resonance of the many of the very varieties cultivated by yeomen agrarians that, in the mania which swept the young republic for the veneration of the past through monuments, farmers were encouraged to see every apple tree as a living testament. The apple tree venerated ordinary patchwork landscapes of the rural Union, however, and would not be imbued with the same legitimacy of veneration by reformers. Not only would agricultural reformers not suffer such vernacular landscapes to take on such meaning, through their pomological societies
and conventions they would begin got efface such landscapes of local memory after 1847.\textsuperscript{313}

An anonymous author, writing for the \textit{Albany Cultivator} in 1844, implored its readership, “Would you have your children love their home—respect their parents while living, and venerate their memory when dead…then plant an orchard.”\textsuperscript{314} Such rhetoric resonated with farmers. Thirty years earlier, in a letter to former president John Adams, Benjamin Rush lamented of visiting the farm of his youth, “I next inquired for an orchard planted by my father. He conducted me to an eminence behind the house, and showed my a number of large apple trees, at a little distance, that still bore fruit, to each of which I felt something like the affection of a brother.”\textsuperscript{315} Of noted Hampden County, Massachusetts farmer Richard Bagg Jr., one of his contemporaries concluded, “500 Baldwin apple trees, planted by his own hands, grow thriftily on this plain, a living monument to his industry and skill.”\textsuperscript{316} An aged arboreal monument adorned the place of final repose of the founder of Rhode Island forever gaining recognition as “the apple tree that ate Roger Williams.”\textsuperscript{317} In New York’s Hudson Valley, a region long admired for the cultural resonance of its rural landscape, a pair of apple trees, trunks and branches forever intertwined, marked the final resting place of two Moravian missionaries. How proper a monument was the ubiquitous apple tree to the venerated memories of such individuals.

Just as apple trees served as physical and vernacular memorials for communities across the northeastern states of the Union, such forms of veneration invariably resulted in monuments to significant apple trees as well. The construction of monuments to the thrifty apple trees mirrored a more national mania with the veneration of the past through monuments in during the mid-decades of the nineteenth century. New Englanders led
efforts to establish monuments at Bunker Hill in the 1820s, Lexington, during the 1830s, and a monument to George Washington in the nation’s capital. Monument construction proved another means of creating a usable national past and in such a role the apple tree had its own part in such cultural endeavors. Beginning in the 1840s, and for a half century afterward, farmers and agricultural reformers planned or erected similar memorials for the Baldwin, Western Spy, Danver’s Winter Sweet, Newton Pippin of New York, and the famous Rome Beauty of Ohio lineage.318

In 1847, the Baldwin apple tree became the first variety to merit such veneration and contentious debate surrounded the placing of a monument to celebrate that most important New England scion. S.P. Fowler, an Essex County farmer of some repute, thought the aged Danver’s Winter Sweet deserved similar commemoration. Speaking of the importance of that variety to the citizens of South Danvers and its environs Fowler lamented, “And could the sight where it once flourished be found, I am persuaded my esteemed friend, Kendall Osborn, Esq., who now owns the farm where or near this fine apple originated, would place a simple monument, like the one erected to the Baldwin, to mark the spot where it once grew.”319 Another Massachusetts farmer, seemingly caught up in the spirit of his age, felt compelled to construct a humble stone obelisk to memorialize the setting out of his new grafted orchard. “I have taken so much interest in this young orchard” wrote this farmer, “that I have erected a stone monument with this inscription—‘Set out by Amos Preston, 1847.’”320 He too, derived inspiration from the Baldwin Apple monument.

In the summer of 1846, Dr. Rufus Kittridge, of Portsmouth New Hampshire, first claimed the ancestral homeland of the Baldwin Apple as that of Tewksbury
Massachusetts. According to Dr. Kittridge, the first Baldwin sprouted around 1740 in a lane connecting the house and barn upon the farm of John Ball. Dr. Benjamin Kittridge, born in 1742 within a quarter mile of this tree, eventually took nearly 1800 scions from the Ball property and, one presumes, grafted them in his orchard before his death in 1822. The cultivation of the Residents largely confined the cultivation of the “Tewksbury” Baldwin to the immediate neighborhood and the original tree remained on the Ball farm at least as late as 1817. At some unrecorded time Dr. Rufus Kittredge declared that Colonel Loami Baldwin of the neighboring town of Woburn, Massachusetts took notice of the apple and propagated it in other localities that the fine winter apple took his name.321

Dr. Kittridge’s definitive account never made it to print, at least not as he intended it, for when the Boston Cultivator published his account in an article entitled “Origin of the Baldwin Apple” on July 1846, it was but one of three competing claims to the location of the first Baldwin Apple Tree. Acknowledging Dr. Kittridge’s standing in the community the editor of the Boston Cultivator wrote, “From Dr. K’s well known intelligence and the deep interest he takes in fruits and the history of important varieties, we supposed that we might regard the above account as official.”322 However, the editor quickly pointed out that a few days prior he met with Col. James Jaques, “a gentleman of much intelligence and nice observation also.”323 Jaques, undoubtedly to the chagrin of Dr. Kittridge, promptly claimed the town of Wilmington as the true domicile of the first Baldwin Apple. Jaques’s account more closely matches the Thompson map of 1856 in that he placed the original tree on the Butters farm of Wilmington. According to Jaques, Mr. Butters, whether it was Samuel, William, or perhaps their father, he could not say,
took the original tree in the spring from a road on Wood Hill, and replanted it near his farmhouse. Col. Baldwin is prominent in this version as well, for he is introduced to the apple when Butters brings them to market in Wilmington town proper. Baldwin found Butters’ apple so agreeable that, as in Dr. Kittridge’s account, he disseminated grafts among other communities and the apple eventually took his name. As if in a parting effort to muddle the issue further, the editor of the *Boston Cultivator* closed by exclaiming that there still remained another account of the origin of the Baldwin Apple, from a Mr. Sheldon who claimed the original tree resided on his property on or about Wood Hill.\(^{324}\)

In November of 1846, and undoubtedly in response to Dr. Kittridge’s claims, Benjamin French, Vice President of the Massachusetts Horticulture Society, in an article written for publication in the *Horticulturist and Journal of Rural Art and Rural Taste* largely confirmed Col. Jaques’ account of the first Baldwin Apple. French agreed that the first tree resided on the Butters farm, originally in the town of Wilmington but by 1847 constituting a part of the town of Sommerville. Like Jaques, he acknowledged that the Baldwin was known by more local names prior to its dissemination by the colonel. In Wilmington, the Baldwin was first known as the Butters Apple, and for a time afterward as the Woodpecker or Pecker Apple. Perhaps to add veracity to his observations, French quickly pointed out that his trees set out in 1818 were “registered Peckers.” French thought that the Butters land where the first Baldwin originated was now in the hands of Major Samuel Jaques, “eminent as an agriculturists, breeder, and horticulturist, as well as public benefactor of his age.”\(^{325}\) Only in one respect did French appear seemingly misinformed. The towns of Wilmington and Sommerville do not run adjacent to one
another but were separated by the towns of Medford and Woburn. French’s mistake was simply a typographical one, which he rectified in print some years later. Before the clarification, *The Maine Farmer* repeated the error when they reprinted French’s article in an April 8, 1847 column. Though this simple mistake came from one article and originated with a single author, its publication in two separate agricultural journals in Massachusetts and Maine in early 1847, brought about claims from other communities as to the presumed location of the first Baldwin Apple and, for a time, made the town of Sommerville Massachusetts a contender for such title.326

In 1847 Colonel Samuel Jaques further solidified Wilmington’s claim to the Baldwin Apple when *The Cultivator* published an excerpt from one of his letters. The first half of the article came largely from the one authored by Benjamin French in the *Horticulturist and Journal of Rural Art and Rural Taste* in January 1847. The second half of the article consisted of a single excerpt from one of Jaques’s letters to *The Cultivator*:

Whenever I go to the spot on my farm where this memorable tree once stood, I am carried back in agreeable recollection, to 1784, when I went with Col. Loammi Baldwin, of Woburn, and my father, and saw them take scions from this tree. When Col. Baldwin’s scions bore fruit, he sent some barrels of it to a particular friend in England, where it created so much excitement that letters came to this country inquiring for the ‘Baldwin Pippin,’ as it was there called; hence the name Baldwin apple.327

Jaques’ account is revealing in that it inadvertently belied the continuing resonance Dr. Kittridge’s account of the origin of the Baldwin apple must have maintained. In accounts of 1846 and early 1847 Jaques made no mention of his father being with Col. Baldwin. By the summer of 1847, however, Jaques placed himself as a witness to his father and Col. Baldwin’s taking of scions from the tree formally owned by Butters. It is well he reinforced his claim, for by 1848 the editor of the *Boston Cultivator* admitted that
“writers on the subject seem prejudiced in favor of one account, and neglect, or pass
lightly over the others.” Again the veracity of the Tewksbury and the Wilmington
claims were weighed against one another and of both the *Boston Cultivator* supposed:

In searching for the origin of the Baldwin apple, we have had two accounts, both
equally authentic; and we have our information from gentleman long acquainted,
as they say, with the original tree. A Mr. Butters says that his brother found it on
Wood Hill, in Wilmington, and set it out on his farm. Dr. Rufus Kittridge of
Portsmouth, N.H., informs us that the original Baldwin tree stood in a lane on his
Grandfather Ball’s farm, in Tewksbury, a few miles from Lowell. In reply to the
intimation that that tree may have been grafted from the other, he says that no
grafting was done there in those days, and the tree was a large one 50 years ago. It
died about 1822. The Mr. Butters who transplanted the little tree from Wood Hill,
was born less than a century ago, so that it probably was not set out 70 years
since, and would not have attained a large size sooner than 50 years ago, and the
stump now remain; so that priority can not be claimed for the tree of Wilmington.
They must have been contemporary. This variety is so important that the history
of it has become important also, therefore historians should be impartial on a
subject of so much interest to the public.

Debate over the location and township of origin of the Baldwin apple continued
throughout the next several years and communities as far away as Baldwin, Maine
claimed the original abode of the first tree as late as the early twentieth century. The
granite memorial suggested by the committee was not the only means by which
agricultural reformers contended the history, identity, and memory of New England’s
most famous apple during the forth and fifth decade of the nineteenth century. In
Massachusetts, Wilmington citizens began constructing a monument of a different kind to
further strengthen their connection to the Baldwin Apple.

In 1856, the residents of Wilmington, Massachusetts felt enough affection for the
then ubiquitous Baldwin Apple to commission a new and ostensibly unique town map
from Cyrus Thompson, a surveyor from neighboring Woburn. Thompson’s survey
entitled, “Plan of Butters Row in Wilmington Showing the Site of the Original Baldwin
Apple Tree,” prominently displayed the original location of the first Baldwin tree within the boundaries of the Ball Property on Butters Row. Four decades later, in 1895, the Rumford Historical Association in similar, if slightly more reverent, fit of pomological nostalgia, placed on the Butters Farm a granite marker commemorating the Baldwin Apple near the location were the original tree once stood. The idea of a monument to the Baldwin apple, however, was the product of the 1840s unrealized for another half a century. The discussion of such a marker doubtless inspired, at least in part, commission of the Thompson map. The sense of permanence exuded by the Thompson map was largely illusory, for the surveyor’s cartography was but a snapshot of time and place in a community continually confronting, and occasionally transformed by horticultural change. In this respect, Wilmington differed little from other New England communities and perhaps of the greater portions of New York and Ohio as well.

Though Thompson ostensibly constructed his map to venerate the location of a biological marker on the Middlesex County landscape, his work was not one of ecology, but one of commerce, and the socio-political boundaries of Wilmington Township. William Cronon described the changing ecological landscape of colonial Massachusetts as, “A World of Fields and Fences,” however; there is precious little of pasture, woodlot, or any other agricultural marker on Thompson’s map to place the Baldwin Apple in context. Thompson’s map is misleading in other ways as well. The Baldwin Apple tree was never originally located in front of the Butter’s house, nor, for that matter, was the Baldwin Apple a Baldwin Apple at all. This is to say that Baldwin’s was just one of a number of names, some local, others vernacular, and still others national, applied to the hapless tree before the pomological congresses of the late 1840s and 1850s decreed it, for
all time, as the Baldwin. Thompson’s identification of the trees as Baldwin invariably speaks more to cultural perception than ecology. The map, which at first strikes the reader as nostalgic, commemorating the location of the first Baldwin Apple tree, is actuality progressive. The Thompson map portrayed a community looking toward the future, rather than toward some recalcitrant Jeffersonian past. By looking carefully at what Thompson is both willing, and unwilling, to share about the Baldwin Apple, one can gain a more accurate sense of how Wilmington’s people viewed their place in the changing agricultural landscapes of nineteenth century Massachusetts.

Scholars often appear leery of the supposed meanings of monuments. This certainly holds true with Thompson’s map, and perhaps more still with the five foot tall, Baldwin apple crowned, granite monument placed on the Butters Farm four decades later. The marker only speaks of surveyor Samuel Thompson and is silent as to the Butters family, the original proprietors of the land. The original tree was among a number of nameless apples growing along the banks of the Middlesex canal nearly a quarter mile away from the Butters residence. The tree on the Butters farm was not the first Baldwin Apple tree but the first grafted Baldwin Apple. The distinction between the two is not academic for one represents the seedling tree of the colonial era of the cider orchard while latter represented the winter apple and the best of mid-nineteenth century agricultural reform. Placed as it was in the dooryard of the Butters residence, and conveniently close to the road, this tree was the first Baldwin apple made available for dissemination, first among neighboring farmers, and some years later nationally by Colonel Baldwin.
Ironically, in an age where New Englanders were looking back to their founding fathers and grappling with the disquieting meanings of the actions of their own forefathers, Wilmington’s citizens were looking forward rather than to the past. Belying the transformation from a world of cider and hogs to one of agricultural specialization, and in Middlesex County, most probably one of dairying and table apples, the story that Thompson’s map and Baldwin’s monument failed to tell is equally compelling. It does not commemorate the original tree, the wild seedling growing along the banks of the canal, indeed the canal itself did not find its way on the map, by 1856 already having been relegated to things of the past by the railroad right-of-way now residing on its old towpath. More than likely, the woodlot too was no more, as Massachusetts experienced unprecedented deforestation followed by and equally quickening reclaiming of upland pasture and poor stony till-lots. The Baldwin Monument and Thompson map did not abide the fathers of New England yeomen to speak of their agricultural worldview, rather they celebrated Massachusetts’s fleeting contribution to agricultural improvement in an age dominated by reform movements. It was not the Butters apple, a chance seedling of a past era, but the Baldwin apple, a thrifty scion of New England, following in the outward diasporas of the region’s young farmers who went forth to make industrious the western agricultural lands.

In an age of constructed antiquities and a national search for a venerable past the apple tree played a prominent if disquieting role. Covering the grounds of thousands of New England farmers these biological monuments exuded various disparate meanings a new generation of country gentlemen, civic leaders, and agricultural and moral reformers found difficult to control. The apple tree served as living referent to forefathers,
community, pasts national and local, and as marker of the common farmer rather than country gentleman. Venerating a symbol of the yeoman cultivator was not in the best interests of an agricultural elite, transfixed with the class status emanating from cultivating pears and perennials, while constructing memory and monuments that spoke to a national history dominated by the founding fathers and other scions of a better class of men. The men who wrote for and read the agricultural periodicals like the *New England Farmer* and *Albany Ploughboy*, however, noted the pervasive symbolic resonance of the apple tree on the cultural and physical landscapes of New England, and sought to exploit that milieu to make every yeoman an orchardist.
NOTES


277 For the history American elm as the emergent arboreal symbol of national identity during the three decades preceding the American Civil War see Thomas Campanella, *Republic of Shade: New England and the American Elm*, 47-51.


Of Sullivan’s expedition against the Iroquois Confederacy J.M. Waters wrote, “and in central New York, too, when Gen’l [sic] Sullivan invaded the country of the Five Nations, our countrymen were surprised to find, not only well built villages and abundant crops of corn and beans, but large thriving orchards of peach and apple trees, all of which, vandal like, (if I mistake not) they visited with the besom of destruction. To the honor, though, of not a few of those rugged sons of war, be it said that they declared they had no heart for any such work.” J.M. Waters “Did the Indians Plant Orchards,” *Prairie Farmer* 14, no. 6 (June 1854): 218.


J.M. Waters “Did the Indians Plant Orchards,” *Prairie Farmer* 14, no. 6 (June 1854): 218.


J.M. Waters “Did the Indians Plant Orchards,” *Prairie Farmer* 14, no. 6 (June 1854): 218.


“A Pioneer Apple Tree,” *Ohio Cultivator* 14, no. 11 (1 June 1858): 171. This “aboriginal” tree was reputed to be on the Maumee River on the bank opposite from old Fort Defiance.

J. Van [Buren], “Southern Apples—No. 2.,” *Southern Cultivator* 12, no. 8 (August 1854): 257. Ironically the Wall Apple took its name from Garrit Wall, an Anglo European settler in Rabun, Georgia even though its original cultivation was widely attributed to the Cherokee.

J. Van Buren, “Nantehalee Apple & C.,” *Southern Cultivator* 17, no. 7 (July 1859): 220. The location of the Junaluskee was thought to be either in Macon or Cherokee, County in North Carolina. For more on Southern Native American agricultural practices or apple growing and orchard cultivation see J. Leitch Wright Jr., *TheOnly Land They Knew: American Indians in the Old South* (Lincoln, NE: University of Nebraska Press, Reprint Bison Books Edition, 1999), 222-224; David Wishart, “Evidence of Surplus Production in the Cherokee Nation Prior to Removal,” *The Journal of Economic History* 55, no. 1 (March 1995): 127-128; James Carson, “Native Americans,
the Market Revolution, and Cultural Change: The Choctaw Cattle Economy, 1690-1830,”

297 J. Van Buren, “Nantehalee Apple & C.,” Southern Cultivator 17, no. 7 (July 1859): 220; Van Buren thought that Nantehalee loosely translated from Cherokee to “Maiden’s Bosom.”

298 “The Middle Apple,” Horticulturist and Journal of Rural Art and Rural Taste 4, no 6 (1 June 1855): 255. For a more extensive account of the history of the “Middle Apple” of Herkimer County see S.A. Beach, The Apples of New York, volume 1, 207-208.


300 “The Middle Apple,” Horticulturist and Journal of Rural Art and Rural Taste 4, no. 6 (1 June, 1855): 255.

301 S.A. Beach recounts a version of the history of the “Middle” apple, which tells of a Herkimer County boundary dispute and makes no mention of the Know Nothing Party or the German variation of “mittle.” He does, however, list “mittle” as one of its synonyms. See S.A. Beach, The Apples of New York, volume 1, 208.


303 “Great Age of Trees,” Southern Rose Bud 2, no. 42 (14 June 1834): 165; apparently the history of the Hingman Seek-no-further was originally published in the Hingman Gazette.

304 Saturday Evening Post, 19 December 1857.

305 “How Long Will an Apple Tree Live?,” Maine Farmer 3, no. 8 (September 1847) :127. George Stilphen contends that an apple tree will live from 150-200 years and perhaps longer still in Maine. See George Stilphen, The Apples of Maine, preface xiv.


321 Dr. Rufus Kittridge, “Origin of the Baldwin Apple,” *Boston Cultivator* 8, no. 29 (18 July 1846): 226; Clarence Day contends that the John Ball farm of Wilmington was the same farm own later by the Butters family, Clarence Day, *History of Maine Agriculture, 1604-1860*, 213; S.A. Beach similarly concludes the Ball and Butters farm were the same properties. See S.A. Beach, *The Apples of New York*, volume 1, 58.


Lamenting the transformative social, moral, and agricultural pressures redefining the rural landscapes of Massachusetts, Concord resident Henry David Thoreau wrote, with no little sense of melancholy, in November of 1850:

The era of the wild apples will soon be over. I wander through old orchards of great extent, now all gone to decay, all of native fruit which for the most part went to the cider-mill. But since the temperance reform and the general introduction of the grafted fruit, no wild apples, such as I see everywhere in deserted pastures, and where the woods have grown up among them, are set out. I fear that he who walks over these hills a century hence will not know the pleasure of knocking off wild apples.\(^{331}\)

The sentiments expressed in Thoreau’s journal were not the words of *Walden*, although that grand experiment at Walden Pond had already come to pass several seasons prior. Such prose reflected, rather, a very personal understanding of much of the disparate anxieties associated with the changing rural and cultural landscapes of nineteenth-century New England. For farmers, reformers, and Concord transcendentalists, the apple tree was an integral and prominent arboreal symbol upon the cultural landscapes of rural New England. Its meaning was rooted deep in the conflicting rhetoric of rural decay, agricultural improvement, social change, and moral reform.\(^{332}\) Hoping to capitalize on the cultural resonance of the apple trees, agricultural reformers sought other ways to compel
New England yeomen to embrace agricultural progress. During 1840s and 1850s agricultural reformers invoked a moral covenant of reciprocity and civic duty to encourage farmers to set new orchard while reluctance toward such change was perceived by agricultural elite in ways that inadvertently reflected rural anxiety emanating from transformative antebellum changes.

How differently Concord transcendentalist Henry Thoreau spoke of the “struggling cider-orchards” in his essay “Wild Apples” only twelve growing seasons later in 1862, as the Union broke apart among the pastures, till-lots, and orchards of Shiloh, Antietam, and Perryville. Where, for Thoreau, the cider tree once stood as a symbol for the decay of agricultural New England, the wild apple served twelve years later as the antithesis of the grafted market apple, restrained by fencing to the dooryard and kitchen garden. Thoreau’s was only the most articulate of a number of voices negotiating the cultural meaning of the cider orchard and apple tree upon the rural landscapes of mid-nineteenth-century New England. Henry David Thoreau found the resonance of the apple tree in the rich tapestry of New England’s transformative agricultural landscapes equally difficult to articulate. Thoreau, like the farmers populating the landscapes from which he drew his inspiration, was caught in the competing and conflicting ideologies of cultural landscapes of mid-nineteenth-century New England. A new vision of landscapes, one of order and one of wilderness, played itself out among the pasture, wood, and till-lots of Concord and other New England towns.

For much of the nineteenth century old apple trees vied with the cellar hole and stone wall as the most representative feature of the cultural landscape of rural change in
New England. Decades later, Robert Frost lamented the passing of the last venues of rural New England in “After Apple Picking,” a poem appearing in his anthology *North of Boston* in 1914, and Sherwood Anderson invoked similar imagery when he spoke of the “sweetness” of the twisted apples of Winesburg, Ohio in 1919. By Frost’s time six to eight decades had again passed since anxious agricultural reformers noted the neglect of New England apples orchards and only the old stone walls, entombed in the piney second growth of the New England’s backcountry were left to incite the inquisitive nature of scholars like Harold Wilson.

Farmers worked the land at the intersections of a transformative New England Landscape during the first five decades of the nineteenth century. Economic forces wrought by industrialization and the opening of western lands brought first unprecedented deforestation followed by equally rampant farm abandonment and the return of a second growth wilderness. By 1850, woodland acreage in southern New England hit its nadir and was already increasing as abandoned pasture transitioned to second growth forest. At the same time as this second New England wilderness threatened to engulf old New England farms, the social forces of reform sought to reorder the ailing rural landscape through such movements as roadside beautification and the rural cemetery movement.

Moral suasion and agricultural improvement demanded the last full measure of commitment of the nineteenth-century New England smallholder. Agricultural leaders thought New England’s farms could remain competitive and youth persuaded to keep the land if smallholders embraced an unrelenting regime of intensive agricultural cultivation.
Cultivation of grafted market apples was among the most intensive of the new endeavors of agricultural viability in New England. Moral suasion was both the instrument and the currency of agricultural reform in nineteenth-century New England. It served to bolster the modest economic incentives for engaging in new patterns of unrelenting agricultural labor and recast the yeoman as the moral standard of the young Republic. For who else would willingly work so hard with the expectation of so little during the three decades prior to the War for Union? Moral suasion acted as a countervailing force against rural anxiety emanating from rampant emigration and the explosive agricultural potential of new western lands. Against such transformative forces the rural landscapes of New England were a powerful instrument in creating rural anxiety and reinforcing moral suasion. \(^{336}\)

For many agricultural reformers and yeomen alike, New England landscapes abounding with neglected orchards had been declared a palpable reflection of rural decay by agricultural reformers in New England since the early 1820s. John Gates of Petersham, Massachusetts stoically remarked that, while his orchards were well cared for, his neighbors’ trees were “more or less injured” by “common nuisances, too common in fruit orchards, through the careless neglect of the husbandmen.” \(^{337}\) John Wells complained bitterly that New Englanders too often abandoned their orchards to the “canker worm and caterpillar, to the total loss of fruit and foliage.” In a strongly worded indictment of Yankee apple culture in the *Massachusetts Agricultural Repository*, Wells warned that only diligence and care could, “obviate the evils which beset our trees.” \(^{338}\) Similarly, in a blanket condemnation of New England farmers’ lack of horticultural
prowess, one anonymous critic confided that, “a large proportion suffer their lands to be occupied by trees that neither warm by their wood, not [nor] gratify by their fruit, hundreds of stunted apple trees may be seen cumbering the ground, where a little attention would have produced a profitable orchard.” That improperly cultivated cider trees seemed to populate New England farms, eliciting the ire of farmers and reformers alike in the 1820s, was more a product of geography and the proximity of the Boston market than of pomological mismanagement. The collusion of religious reformers and agrarians in the temperance movement of the early 1830s only exacerbated perceptions of arboreal neglect as New England alone became, seemingly overnight in some districts, vexed by shabby, neglected, and abandoned cider trees. In 1839, one contributor remarking on the state of Massachusetts orchards in the Boston Cultivator concluded that, “the growing of good fruit has been much neglected heretofore, and does not yet receive half the attention its importance demands.”

By the 1830s and 1840s, however, regional anxiety gained national momentum as book-farmers, pomologists, and other advocates of scientific agriculture bemoaned the mean condition of apples trees in New York and Ohio as well. One observer from eastern New York, La Marte Barney, speaking of the decrepit condition of orchards on Long Island remarked that, “to look at what is called a fine orchard here in midsummer, a stranger would come to the conclusion that a heavy frost had visited the land and left the leaves withered as in the fall season.” North of Boston, another anonymous farmer speaking of “a growing neglect of orcharding in Maine,” regretfully concluded that this resulted in part “the allowing of orchards already set out to suffer and become useless, for
want of proper attention.” Likely speaking of upstate New York, a cultivator only known as P. B. speaking (of course) of his neighbors’ orchards and not his own wrote that:

I have found many excellent apple orchards, loaded with the finest varieties of fruit, but these would not average one in fifty…. The greatest number are of the most worthless character, and the trees miserably taken care of. – Suckers are growing up for several feet around the trees, and the heads or tops have never been pruned or thinned out. This neglect would in a few years deteriorate the very best fruit.

Gangly, decaying, and ill looking orchards were not a uniquely New England phenomenon and could be found in all the oldest rural neighborhoods of the northeast in the first five decades of the nineteenth century. Agricultural journals, self-styled book farmers, and agricultural reformers alike picked up on such regional tensions and used them in advocating for the planting of market apple orchards and the transformation of existing cider trees into grafted trees which had moral as well as economic value.

Troubled and judged wanting by the ailing seedling trees of their fathers, New England farmers were caught in the same currents of rural beautification and radical transformations of the rural landscape that provided so much artistic inspiration for transcendentalist writers like Henry David Thoreau. Speaking of apple trees ruined by careless grafting and pruning; “Trees are often mutilated and disfigured by ignorant persons” concluded one irate grower. “A few such trees as I have described would spoil the beauty of any farm or rural scene, let all other improvements be what they may.”

Another, in describing a New England landscape awash in old, decaying, and aged apple trees concluded, “there are neglected wastes on almost every farm, which, with a little care and labor, can be made rich with beauty or luxury, which lend peculiar charms to the
The tenets of rural beatification were invariably entwined with the moral sinews of improvement. For many yeomen a good orchard spoke of thrifty farmers just as bad orchards reflected the agricultural and moral erosion of rural New England. Of the value of good orchards as an indication of responsible men, one Granite State farmer wrote, “here in old Cheshire County, N.H., we have some fine orchards, which shows that we have some good farmers, for every good farmer will devote a portion of his time to the cultivation of fruit.” Such rhetoric was not reserved for New England yeomen alone, for well kept orchards were symbols of good men and good farmers across the northeastern states of the Union. Speaking of German farms and farmers in Ohio, a Buckeye native concluded; “Look at their farms, their orchards, their gardens, their cattle and horses, and you will see what they are about.” Just as easily as farmers and reformers could point to good orchards as evidence of good farmers, good citizens, and good men, bad apple trees spoke equally poorly of their proprietors.

Apple trees were living biological referents of their inner character of the yeoman upon the rural landscapes of New England for all who wandered by to pass judgment. “Although he has been on a piece of land for twenty years, ask him for grafted apples, and he will tell you he could not raise them, for he never had any luck,” complained one yeoman. Of the man who failed to improve their orchards he concluded, “He is a poor father, a poor neighbor, a poor citizen, and a poor Christian.” “How painful it is to see a large and once thriving orchard entirely ruined for want of care and proper management,” wrote another farmer. He continued:

I never see a farm on which the fences are half lying down, the fruit trees all untrimmed, the out-buildings out of repair, the shingles and clapboards half off
the house, the tools all lying strewed about, that I do not judge rather harshly the man’s moral character.\textsuperscript{350}

The implication was that good orchards reflected good inner moral and civic character, while neglected, decaying, or poorly managed trees were indicative of a farmer who was invariably wanting as a cultivator, family man, citizen, and Christian, all of the most formidable attributes of nineteenth-century society.

The moral benefits emanating from careful attention to apple cultivation were not solely and constantly championed by the agricultural press alone. Many of the most renowned groups of men styling themselves as pomologists began publishing their own books designed to identify varieties and assist the cultivator in improving his orchard in the 1830s and 1840s. Numerous works dealing with apple and fruit culture went to press about the same time the number of agricultural journals incrementally expanded in the early 1830s, and many of these new journals aggressively advertised and promoted these new horticultural books. Indeed, some indication of how popular such books must have been is evidenced not only by the number of such works but by the frequency of new printings and revised editions as well. Thomas Bridgman’s \textit{The Young Gardener’s Assistant} went through at least five printings between 1832 and 1847. F.R. Elliot’s \textit{Elliot’s Fruit Book} and George Jaques’ \textit{A Practical Treatise on the Management of Fruit Trees} each went through multiple editions as well. William Kendrick’s formative work on pomology, \textit{The New American Orchardist, or an account of the most valuable varieties of fruit adapted to cultivation in the climate of the United States}, went through no fewer than seven editions in the years between 1833 and 1848. All of these works extolled upon small farmers of New England, New York, and Ohio the virtues of good
apple culture simply by providing a means of assessing order and giving value to the
innumerable varieties of apples available to the farmer in the 1830s. However, many
paralleled the more aggressive agendas of the agricultural press and made more overt
overtures for farmers to improve their apple orchards for moral reasons as well.

Andrew Jackson Downing spoke well of the congruous agricultural and moral
prerogatives of his formative work, *The Fruits and Fruit Trees of America*, when he
described the fruit tree as “the most perfect union of the useful and the beautiful that the
earth knows.” George Jaques had just such questions of civic value and apple growing
in mind when he wrote in his work, *A Practical Treatise on the Management of Fruit
Trees*, that “the small farmer who consults economy or regards the happiness of his
family, will never regret the labor which can so easily spread his table an abundance of
the various fruits of the successive seasons.” Speaking of the moral suasion of the
apple grower Jaques confidently concluded, “it seems impossible that a wicked man
should have a taste for it.” Downing shared such sentiment as expressed by Jaques
commenting “when I say I heartily desire that every man should cultivate an orchard, or
at least a tree, of good fruit, it is not necessary that I should point out how much both
himself and the public will be, in the very sense, gainers.” Conversely, Downing noted
that the farmer who owns even a few acres of land, and neglects to prepare or to improve
his orchard, “in the face of all the pomonal riches of the day, only raises crabs and choke-
pears, deserves to lose the respect of all sensible men.”

William Kendrick’s work, *The New American Orchardist*, proved most indicative
of the subtle yet lasting strains of moral reform which permeated pomology texts in the
1830s and 1840s. In his 1833 edition of *The New American Orchardist*, Kendrick recognized the value of horticulture, remarking “to the poor, its resources yield subsistence – to the rich, and to those spirits who cannot idly slumber, a pleasing occupation.” Two years later during the height of the temperance crusade against the cider tree in 1835, Kendrick took a more aggressive position extolling the moral value of good apple culture. Speaking of the use of tobacco, alcohol, and “strong fermented liquors,” Kendrick concluded “the friends of abstinence, who would abolish the use of these, as pernicious, must encourage the cultivation of fruits, as the healthy antidote and useful substitute.” Quoting Mr. Knight, the author likewise thought “supplying the public with fruit at cheap rate, would have a tendency to operate favorably on the physical and moral health of the people.” In 1841, Kendrick reaffirmed his position on the inherent moral value of agricultural progress in the orchard declaring “the fruits of various countries and climes should be regarded as one of the most valuable gifts which divine Providence had bestowed upon man.” The author’s commitment to such moral improvement as might be affiliated with agricultural progress remained strong in the coming decade, for the 1842, 1843, 1844, and 1848 editions of *The New American Orchardist* carried the aforementioned quotes from the 1835 or 1841 editions.

For many reformers and farmers alike, one seminal way to combat the decay and erosion of rural society in New England, as represented by neglected trees and decaying orchards, was to imbue agricultural improvement, orchard culture for example, with moral suasion. Many thought New England farms were inexorably returning to a state of wilderness that suggested a kind of moral bankruptcy as the gospel of improvement
disappeared from the landscape and uncounted acres of New England till, mowing, and upland pasture devolved toward a state of nature. Orchards ailing were as pertinent a symbol of decay as any other; however, orchards improved might speak to a reordering of rural landscapes, a new era of agricultural and moral relevancy in the midst of radial urban and industrial transformation. The marriage of apple tree and moral suasion seemed only natural as so many had, only a few years prior, been caught in the zealousness of the temperance cause. The reformers in the agricultural press doubtless thought if yeomen could be persuaded to smite their orchards in a fit of moral fervor, they might be persuaded to engage in the improvement of those same seedling trees as an equally righteous moral cause.

“In short, if you wish to avail yourselves of the blessings of a bountiful Providence, which are within your reach, you must plant an orchard,” asserted one writer in 1844. Another queried, “Would you make home pleasant—the abode of the social virtues—plant an orchard.” “There is no doubt but that health, comfort, sociability, temperance, and good morals, generally, would be promoted, by making a choice fruit garden near our dwelling,” contended another, while a contemporary implored, “If you have no apple orchard on your farm, you should look upon it as a moral duty to plant out one this fall.” A farmer might be judged poor or thrifty by the condition of his apple trees; however, reciprocity would be one of the means by which that moral condemnation would be turned into moral suasion for the improvement of one’s apple trees.
As early as 1824 one anonymous contributor to the *New England Farmer* reiterated, “Planting trees was among the duties the present generation owes the next,” and two decades later another queried of planting apple orchards, “Would you leave an inheritance to your children?”

Echoing a similar sentiment another New England apple grower concluded:

Somebody has said that ‘planting trees was among the duties which the present generation owes the next;’ if so let our agriculturists discharge the duty towards their children better than our predecessors have to us; do not continue to cultivate trees which can produce nothing but crabbed unpalatable fruit, merely because we found such in our fields, lest our children say, ‘Our Fathers have eaten sour grapes and our teeth are set on edge by them.’

In Albany, New York, the respected horticulturist J. Buel, speaking of apple and shade trees at the Berkshire Agricultural Society in the fall of 1837 said, “our fathers planted for us, and we should requite the obligation, by planting for our children.”

The growing consensus that every yeoman should plant apple trees for posterity filled the pages of the agricultural press throughout 1850s. “Upon this point,” confided one apple grower in the *American Farmer*, “every farmer and planter should consider it a duty that he owes himself, to his children, and to society, to have a good orchard of choice apples, pears, peaches, and other fruit on his estate.”

Traveling across New England in the first decades of the nineteenth century the reverend Timothy Dwight noted of yeoman cultivators that, “apples abound” and upon closer inspection might have observed with less enthusiasm that, in many neighborhoods, pests plagued their orchards with equal ubiquity. Of the myriad pests vexing the ailing orchards of New York and New England one anonymous farmer wrote:
Independent of the injury they occasion, there is nothing scarcely more disgusting than myriads of caterpillars creeping over thee trees, eating the foliage, and making free with anyone who enters an orchard where they abound. It should be remembered also, that by destroying a single nest, with its inmates, we destroy what might become, by the process of transformation to the moth state, the parents of millions of caterpillars; and in neighborhoods where the worms are destroyed wherever they appear, they become so rare as to occasion little or no inconvenience whatever.\textsuperscript{368}

In the states of the mid-nineteenth-century Union, the eradication of orchard pests was not just sound economic policy; it was the civic duty of every yeoman to smite the swarthy curculio and the squirming caterpillar with the same fervent zealousness that might compel him to lay low his father’s orchard for the temperance cause.

The seeming explosion of noxious orchard pests among the gangly apple orchards of the yeoman farmer proved one of enduring ironies of the transformative changes wrought by the dual tenets of agricultural and moral reform. Agricultural reform brought a reordering to the rural landscapes of New England and New York, placing apple trees near one another and inviting infestation. No longer were the yeoman’s apple trees scattered about the innumerable acreage of his till, meadow, and mowing, a natural ecological barrier to infestation. No longer were the yeoman’s apple trees the diverse seedlings of the cider trees of his forefathers, and the biological similarity of his well ordered rows of Baldwins, Roxbury Russets, and Rhode Island Greenings courted infestation. Similarly the temperance cause, when not suffering the destruction of apple trees, invariably helped to populate New England orchards with the caterpillar and curculio.

For generations farmers swept the under-stories of their apple orchards for windfall apples to transform into the vapid juices of second-rate cider. The temperance
cause ended the utility of these windfalls. Almost immediately, these orphan windfalls became breeding grounds for new generations of orchard infestations. Only belatedly did reformers suggest letting swine root among such windfalls destroying the breeding grounds of noxious orchard pests. Invariably farmers and reformers alike realized that inhibiting the spread of such evils in the orchard was a civic responsibility as the caterpillar and curculio paid no heed to the boundaries which separated the farmer who looked to his apple trees from the one who suffered his trees to be infested with such creatures. How fitting then, the curculio and the caterpillar, impediments to agricultural progress, might be stymied in their dark endeavors through moral suasion.

“It is well to look at the wild cherry and all the wild scrub apple tree upon the farm” wrote one author for the *Christian Watchman*, “for such these favorite abodes of the caterpillar, if undisturbed, will send swarms of breeders to furnish a numerous progeny to people the neighborhood the next season.” Another orchardist, S.P. Fowler, speaking of the joy of destroying the curculio confided, “Beside, it is a satisfaction, to know and feel as you hold him between your thumb and finger, that he is about to die, and do no more mischief, and that you have not been guilty of the mean act of driving him over the fence into the garden of your neighbor to annoy and vex him.” Reciprocity was the currency by which farmers might rid their orchards of pests and successfully cultivated the newest varieties in the most infested districts of the Union. One writer for the *Genesee Farmer and Gardener's Journal* confided:

The rule, then, among farmers should be, for each one to free his own orchards, and not while one in making laudable efforts to rid his trees of the pest, have his neighbor rearing a stock of caterpillars, which, when converted into the perfect
insect, or moth, will, in a few hours, undo all he has with so much care and labor performed.\textsuperscript{371}

Moral suasion and agricultural reform were complementary ideologies, for propagation of new market varieties in pest prone New England, prior to an age of pesticides, could only be undertaken through a moral covenant in which each farmer looked to his own orchards for the protection of neighbors.

Citing a lack of good orchards, reformers often looked to find reasons why farmers would not be compelled toward better apple cultivation through both moral suasion and the very real economic benefits emanating from burgeoning eastern markets for winter apples. Ironically, reformers often ignored more mundane reasons, issues like time, labor, knowledge or market distance, and instead focused on issues that reflected larger regional anxieties toward rural change in the three decades prior to 1860. In trying to explain lack of interest in orchard culture, reformers looked to such disparate reasons as old age, emigration, theft, dishonest grafters and fraudulent nurserymen, all, in actuality, manifestations of more substantive rural anxieties toward early-mid-nineteenth century change. Agriculture reformers thought of poor orchards as another symbol of agricultural decline and a monument to farmlands abandoned for the agricultural lands of the Ohio country or the life of a mechanic in southern New England’s growing industrial cities.

“None of the farmer’s sons are willing to be farmers,” wrote Henry David Thoreau in 1852, “and the apple trees are decayed, and the cellar-holes are more numerous than houses, and the rails are covered with lichens.”\textsuperscript{372} Echoing such sentiment another lamented:
Our ancestors sixty or eighty years ago, planted fine orchards, which have gradually died off with those who planted them, and their successors for the last quarter of a century, have been moving from place to place, or been kept in perpetual motion by the spirits of speculation, and have much neglected this important and interesting duty.\footnote{373}

Still more troubled by the apparent correlation between the transformative emigrations of mid-nineteenth century New England and the disappearance of the apple tree, another farmer wrote “How often do we hear people say, it is not worth while [to plant apple trees], for I may move away or rent, and in either case I should not get paid for my trouble!”\footnote{374} Yeomen farmers and agricultural reformers, struggling to explain the dearth of new orchard acreage in New England, anxiously concluded that young men trade the farm for the factory and those who remained too old to reap the fruits of their labors should they set out new trees. The rhetoric of emigration and old age invariably spoke more to rural anxiety than agricultural improvement.\footnote{375}

As a counter to such reckless acts ignoring the yeoman’s duty to posterity, agricultural reformers like the respected Joel Buel of Albany, New York, implored his fellow cultivators:

Every man may plant an elm and a maple—an apple tree and a vine—a lilac and a rose-bush, in a leisure hour, and may live to enjoy their shade, their fruit, and their fragrance; or should Providence otherwise ordain, may leave them as a grateful inheritance to his posterity.”\footnote{376}

Joshua Everett said assuredly that, “any man under seventy years, in good health, and in favor of the Maine Law, may hope to live to eat of the fruit from the trees set by his own hands.”\footnote{377} Albert Todd, of Smithfield, Rhode Island attempted to venerate the old man who would graft and orchard and visited public distain upon the other who, in his few remaining days, looked to his personal interests alone:
Now, mark the difference in the views of the two individuals, owners of the orchards. One is for putting his trees in a condition to be of benefit to others, if he does not live to take the good of them himself. The other is of the opinion, that as he is becoming advanced in years, and not likely to live to reap the benefits in his day, he will leave his trees to take their own course… Is it right to suffer our trees property to go to decay, because we are not likely to live to enjoy it? Then let us take care of our orchards—improve our old trees if they are worth it—if not, transplant new ones, and if we are not benefited by them, we shall have the gratification of having left something for our children, and those that come after us.  

Todd’s rhetoric reflected similar suppositions among many farmers and agricultural reformers that New England farms had become the decaying refuge of old farmers and even older apple trees as New England youth fled to western lands or New England mill-towns.  

The tool most valued among the editors of the agricultural and religious press for moving their readership to graft apples, regardless of old age, was the testimonial. That favored rhetorical device of the pulpit manifested itself in two general kinds of stories among the various agricultural and religious journals of the first half of the nineteenth century. The first kind of testimonial always spoke to some aged yeoman cultivator who, fully cognizant that Providence had not left him seasons enough to reap the fruits of his endeavors in the orchard, persisted for the good of those who would come after him to spend his last days engaged in the business of setting and grafting apple trees. One author, for example, speaking of his father improving his farm before he died declared:

And the last time I saw him there, he was grafting a few apple trees which he had planted. He said then, that as he was getting old there was little probability that he would ever eat the fruit of those trees; but if he were certain he should not, he still would take none the less satisfaction in making these improvements. This unselfish sentiment is too rare in this world.—How often do we hear the reverse sentiment expressed, by persons too who pass for worthy members of society. ‘I
care nothing about it, it will do me no good—or harm,’ is acted, if not stated in words. 380

Another individual inquiring of “a very poor aged man” queried “why do you plant [grafted apple] trees, who cannot hope to eat the fruit of them?,” the old man replied, “Some one planted trees for me before I was born; and I have eaten the fruit.” The old man continued, “I plant others that the moral of gratitude may exist when I am dead and gone.” 381 Had such venerable yeomen been found one morning expired in the orchard of their fathers, grafting balm and scion clutched in each aged hand, the agricultural and religious presses should, doubtless, have rejoiced in such examples of moral constitution and civic reciprocity.

The only testimonial preferred more by the agricultural press than the aged yeoman grafting his orchard for an uncertain posterity was the equally venerable man who lived still to take the fruit of his labors. Reverend Davis, of Fitchburg, told of an old acquaintance of his, in Michigan, who set out an orchard after he was eighty years old, and lived to eat the fruit thereof, a number of years.” 382 The editor of the Trumpet and Universalist Magazine personally recounted the story of an aged couple who, having “… not more than two or three trees of any kind fit for eating,” planted an orchard in his last years. Against the misgivings of his wife who concluded they would never live to take the fruit of their endeavors, the editor happily reported that she lived to eat of the tree and the old farmer thrived still longer to reap the rewards of his personal contribution toward agricultural improvement of the region. 383

Old age might well temper the best intentions toward agricultural improvement among venerable yeomen, however, dishonest persons, traveling grafters and nurserymen
of uncertain character and low moral constitution, might prove equally culpable in inhibiting the setting and grafting of new apple orchards. Of just these kinds of men, one anonymous farmer wrote:

Besides the neglect with which Farmers themselves have treated this subject, there are other causes which the scarcity of good fruit may be very justly ascribed, viz; the peddling of apple trees around the country by persons possessing comparatively no knowledge of fruit culture themselves, and caring as little, if they could only make a profitable business of it.  

Just as old age and orchard cultivation reflected deep-rooted anxieties about farm abandonment and emigration, the archetype of the outside tree peddler and degenerate grafter encompassed rural distrust of the new knowledge systems and practices of these transient outsiders.

“How vexatious it must be,” wrote one leery New England cultivator, after paying a hired man to graft an orchard “and then find that the graft produces the like in every respect as the parent tree!” Another more stoically lamented, “yet we suppose that if apple trees would speak with men’s tongues and teach in men’s language, there are many in Massachusetts that would tell that their ancient heads were taken off simply to be restored by scions from their own sprouts.” W.L. Eaton of East Ware, New Hampshire reluctantly admitted, “the individual that grafted this orchard was rascally enough to put scions taken from ordinary trees” and concluded, “such a course cannot be too severely condemned, and the person who would do it is almost too mean ‘to get a living be stealing.’” He continued, “Scarcely a farmer with whom I have conversed, but has thus been deceived. These gentlemen and their scions are well worthy of notice.”

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A most disquieting consensus appeared to be attributed to many yeomen apple growers that, as one farmer declared, “extensive frauds have been practiced throughout the whole country, by persons who make a business of engrafting.” Invariably described as untrustworthy outsiders, *The American Farmer* warned, “in the purchase of trees he should avoid tree-peddlers, as he cannot rely upon such animals.” A correspondent for the *Genesee Farmer* echoed such sentiment suggesting that “no confidence should be placed in those itinerates who have no character at stake, for disappointment will be the result in nine cases out of ten.” Speaking of the actions of these outsiders, an anonymous grower concluded in *The New England Farmer* that, “the evil falls upon the man who employs them to graft for him.”

The root of such impropriety, most concluded, resided with the fact that “most farmers, if they hire a man to graft for them, require him to furnish his own scions. The author continued, “they take his word for it, that all his kinds are ‘first rate’” Such trust was deemed foolhardy, “let every farmer do his own grafting and budding” wrote Noah Hardy. And W.L. Eaton concluded:

The safest course is for every farmer to do his own grafting, or at least to select his own scions; and then, if, after waiting anxiously a number of years, he finds his trees bear inferior fruit, he has the satisfaction of knowing that there is no one to blame but himself.

Dishonest grafters were perceived as a threat to improved orchard culture; however, these men were invited in to pastures and kitchen gardens. The anxieties emanating from emigration and industrialization brought a much more incorrigible outsider to the apple orchard in the mid-decades of the nineteenth century.
For many reformers, worse things than temperance zealots or dishonest grafters increasingly populated northeastern apple orchards during the first five decades of the nineteenth century. In Maine one subscriber to the *American Standard* lamented, “It is the villain that will steal fruit from the garden or orchard”\(^{396}\) and that such men and boys rob farmers “of a thousand fond hopes and delightful anticipations”\(^{397}\) for apples lost by such depredation. “Many farmers in this vicinity are deterred from cultivating fruits,” wrote another irate New England farmer, “from the fact of its liability to be stolen by unruly boys, not to say men, or animals in the shape of men.”\(^{398}\) “Some are afraid the fruit would be stolen; and some—though I am sorry to say it—would rather steal,”\(^{399}\) quipped another farmer, and a neighboring New York grower concluded of thee Genesee country, “there is probably not one cultivator of good fruit in the western part of the state who has not suffered more or less from the depredations of lawless plunderers, and many despair of ever obtaining for their own use the finest productions of their own hands.”\(^{400}\) Indeed the Empire State seemed particularly afflicted with such thieves as one old New York farmer acidly remarked, “A fruit garden in this free country, ought be protected by nothing less formidable than a pale or picket fence.”\(^{401}\) Another New York yeoman confided that he was “haunted and harassed, and more particularly [during] the night time, by fruit-stealers.”\(^{402}\) Just as book farmers hoped to compel yeomen farmers to set new orchards through moral suasion, they hoped to speak to the same themes of moral and civic responsibility to fight theft in the orchard.

Reformers ardently cautioned that apple theft served as an introduction to more serious legal misconduct. This kind of moral suasion must have come natural to
reformers who, in the cause of temperance crusade, similarly warned that cider drinking invariably led the imbibers to more ardent spirits like scotch, brandy, and whiskey. One “old man” implored the readership of the New York Farmer that apple theft, unrestrained among boys, “degrades them by lessoning their self-respect, and prepares them for vices of greater magnitude? Well, let us hope there are some, and that the next generation will be better.” If children cannot obtain fruit at home, they are very apt to steal it; and when they have learned to steal fruit, they are in a fair way to steal horse,” declared another cultivator. And speaking of stealing fruit a New York farmer declared “there can be little doubt that habits of stealing, early matured as they so often are by this practice, are acquired to an incurable degree, and become ultimately the means of filling our jails and prisons with their victims.” Children could be turned away from the lives of crime from which orchard theft invariably led only through education, another of the salient reform movements of the antebellum period.

In 1835 the Youth's Companion cautioned “good children will certainly never pick apples, or other fruit that belongs to others without permission.” In 1846, an article originated in The Farmer's Cabinet about a number of young girls who were sickened upon unripe apples they took from a farmer’s orchard neighboring the schoolhouse. They apparently entered the orchard having no intention of stealing apples, however, “It is unwise and unsafe to linger in places of temptation.” Again, stealing led invariably to the higher infraction of dishonesty when confronted by adults and, as the story concluded, “her sin had found her out.”
Although many hoped to change the perceptions of orchard theft as a victimless crime through moral suasion in the agricultural and religious press, others sought more militant means of reining in those who would plunder the trees not of their own property. In 1832 a new subscriber to the New York Farmer queried, “Would it not be proper and advisable, for our agricultural and horticultural societies, to offer premiums to those who detect fruit-stealers?” In favor of such proactive action, a New England grower recollected:

In some neighborhoods, societies have been formed for the detection of such marauders, and have been completely successful in breaking them down, as at Salem, in Massachusetts; but though I entirely approve of such combinations, may not something be done in a different way?

Could not, those men wondered, the various agricultural and horticultural societies act as a policing force against the outrages inflicted upon the orchards of their members? By taking these obligations to police neighborhoods where farmers perceived fruit theft rampant, societies would take on the kinds of legal suasion that would become indicative of their monitoring and control of the spread of new apple varieties in the late 1840s and early 1850s. Not surprisingly, many yeomen must have been reluctant to make the jump from moral to legal suasion of their burgeoning agricultural societies and looked toward municipal and state legislation to remedy what moral suasion failed to avert.

Of the laws protecting farmers from the wholesale looting of their orchards during the first decades of the nineteenth century, most yeomen found their application and penalties wanting. A contributor for The American Standard (Maine) complained of orchard theft “the laws are too lenient upon this subject, and our Justices too apt to look upon it as a trivial affair.” Still legal suasion seemed to gain momentum in the apple
growing regions of the Union from east to west during the 1830s and 1840s. In 1830, New York State revised a law where the plundering of fruit or the damaging of fruit trees was elevated from mere trespass to a misdemeanor punishable by a $150.00 fine and up to six months incarceration. By the early 1830s, a municipal statute was already on the books in the city of Rochester, New York that imposed fines from two to fifty dollars for anyone who took fruit from “upon any grassland, garden, or orchard.” Fines doubled for anyone who committed their act of orchard theft after dark or on the Sabbath. Many New York apple growers thought the tide turning against orchard thieves by mid-1830s after the conclusion of the aforementioned Common Please case of “Gavit Vs. Shaw” in Cayuga County. Legal suasion gained momentum west of New York by the middle growing seasons of the 1840s.

In 1845 the Ohio Legislature passed a law protecting fruit trees, though one Coshocton County farmer complained:

It extends however to a few of the most civilized and advanced counties only, but it is ardently to be hoped the present legislature may consider the state of advancement and civilization sufficient in all the counties to have the benefit of such a law, and that we may no longer have a partial law, casting odium upon the balance of the State, as semi-barbarous, and unsuited to the wholesome and useful restraint of just and equitable laws.

The act initially only covered Cuyahoga County and was extended, by Sec. 4., to include Geauga, Lake, Ashtabula, Trumbull, Huron, Lorain, Erie, Wood, Summit, Medina, Portage, Fayette, Seneca, Sandusky, Green, Tuscarawas, Meigs, and Richland Counties. The Act was extended to all of Ohio in February of 1846. Ohio’s laws must have proven unsatisfactory for the esteemed Cleveland horticulturist J.P Kirtland, writing in 1860 of protecting his bees and orchards from theft, concluded:
In your moral community, these defensive means would not of course enter into your method of winter bees, but in a State whose upright and independent Legislatures durst not pass a bill for punishing fruit and bee-thieves, lest it should in some way interfere with the pursuits of their constituents, such precautionary means are found both necessary and effective. 415

Nineteenth-century farmers and reformers were equally divided as to whether such “lawless plunderers” were local citizens, European immigrants, or mechanics. “The laxity of morals is a shame to us as a people, and seems almost peculiarly American” recorded the Southern Cultivator, “for foreigners, unless they enter some school of depravity after landing on our shores, are generally free from this vice.” 416 One native Connecticut farmer “in a neighborhood infested by canal diggers” thought “one Yankee is worse than one hundred Irishmen” when it came to orchard plundering. 417 Farmers who thought this way, though, were among the minority of New England cultivators and most thought a thief behind every mechanic, Irish canal worker, or German day laborer.

Most suspected the epidemic of orchard theft sweeping the Union was acting as a detriment to good apple culture by men of honest character and was a product of the social changes transforming the Northeast. Lest New Yorkers doubt the corrosive effects of orchard theft among neighbors, they were reminded that wars had been waged over the theft of a handful of peaches in the Dutch colony of New Amsterdam. Farmers thought yeomen were not the architects of rampant theft in the orchard. Instead they believed it was the actions of mechanics, day laborers, and immigrants populating the growing industrial centers of New England and along the Erie Canal in New York. Resistance among Westchester farmers toward the Croton Water Project during the 1830s was in large part predicated upon the conception among rural growers that the legions of
aqueduct laborers would steal from orchards, bring down fences, and commit other such outrages. The idea that legions of mechanics and day laborers were destroying good orchards resonated with farmers to the degree that some cities passed severely punitive city ordinances in effort to discourage such theft.\textsuperscript{418}

In Rochester, New York one farmer invoked a municipal law upon “A young man engaged in a factory in this town, on $5.00 a month” for stealing three apples from his orchard. The penalty for taking fruit under the ordinance was from $5.00 to $50.00 and the fine doubled if the offending act was committed between sunset and sunrise or on the Sabbath. The young factory worker having been fined $5.00 for apple theft, $5.00 for committing the act at night, and $12.00 for court fees found that he owed over three months wages for the pilfered apples under the Rochester law. Such articles as this in the \textit{Genesee Farmer} were not merely meant to scare young factory workers, who doubtless seldom read the \textit{Genesee Farmer}, but place the blame for such depredations upon the new class of mechanics and laborers who were contesting spaces and contesting common right on the peripheries of growing industrial cities along the Erie Canal like Rochester, Utica, Syracuse, and Rome.\textsuperscript{419}

Such thought was not relegated to New England and New York alone. One writer for the \textit{Ohio Farmer} recounted:

And there are not a few occasions to admire that thrift which cuts down an orchard because birds get the cherries, or boys and Irishmen steal all the apples. ‘Provocation of this sort, which constantly vexes one in a large country town, suggests the question, whether he who removes a public ornament and good, even on his own land, is not as much a subject for the law as he who creates a public nuisance.’\textsuperscript{420}
Farmers from New England to Maine thought theft in the orchard an epidemic brought about by an emerging laboring class, however, fruit theft had always been about as ubiquitous as cider trees. When cider trees abounded the boundaries of ownership were more ephemeral. Market apple orcharding required skill and labor and new interlopers in the orchard were not from agrarian backgrounds. Canals, factories, and railroads brought the city to Jefferson’s agrarian society and farmers, mechanics, and laborers found they had to renegotiate long held ideals of common right.

Agricultural reform asked of yeomen cultivators ever increasing obligations of labor and technological know-how to keep the oldest sections of the Union competitive with the new rural lands of the mid-west. Faced with the challenges of agricultural improvement and competition from western lands, farmers were often appalled and dispirited by the way in which damages from theft were so little valued in comparison to crimes committed against mechanics or shopkeepers. “It is remarkable that so many of our countrymen scarcely consider it a crime to plunder an orchard or garden” decried one farmer.\textsuperscript{421} Another fruit grower queried, “But why is it not as iniquitous to rob the cultivator of his fruits, as to rob the mechanic of his wares, or the merchant of his goods?”\textsuperscript{422} Legal suasion culminated in legislation against orchard theft and was not merely the result of anxiety emanating from the collision of rural and urban landscapes along canals and railroads. Laws against theft or destruction of fruit trees was part of the reordering of the rural landscape, effacing traditional cultural conceptions of common right and sharpening the boundaries between farmers, mechanics, laborers, and other yeoman through legal suasion. Surmising as to the cause of seemingly rampant orchard
theft and changing conceptions of communal common right in rural America generally, one author simply concluded, “If we inquire into its cause, we should probably find that a maxim—not of common law but rabble law—has exerted a powerful influence.”

The rural world of Concord resident Henry David Thoreau was one turned upside down by the collision of farmers, mechanics, day laborers, an emergent market economy, and agricultural reformers. Thoreau lamented the coalescing of communal boundaries and emergent market agriculture that denied local access to traditional huckleberry picking meadows, while farmers and textile industrialists contested ownership of the waters of the Concord and Merrimack rivers and their tributaries. In central New York, author James Fennimore Cooper, long respected for his works celebrating the exploits of early New York yeomen, faced much local criticism for denying local access to swimming beaches long held in common use by his neighbors. Even the new park-like rural cemeteries, symbols of a new era of social reform and appreciation for the aesthetic and morally enhancing qualities of the natural world, were to be governed by rigid rules shaping the common use of these new public spaces.

The agricultural press in the 1830s and 1840s was similarly full of disparate complaints of varied kinds of trespass and equally riotous calls for the solidifying of boundaries between neighbors and communities. Farmers looked to construct legal barriers among themselves and their mechanic and laboring neighbors from dog laws in the sheep pasturing districts of Ohio and Vermont to laws prohibiting the grazing of livestock in public roadways in Southern New England. Farmers’ diaries spoke to increasing instances of trespass of livestock or acts of theft and vandalism in the three
decades prior to 1860. Peter Chardon Brooks was vexed by increasing visitations of his neighbor’s sheep to his upland rye fields while both Brooks and Connecticut farmer Carlton White reported theft of fruit, and occasionally, the whole tree. Theft then, was a very real form of rural anxiety indicative of a more widespread coalescing of boundaries among farmers, mechanics, and laborers in the northeastern states of the antebellum Union.

In the efforts of the agricultural press to make every yeoman a pomologist they invoked a kind of marriage of moral suasion and agricultural reform in the apple orchard compelling farmers to better cultivation even as evidence of absence of improvement spoke inadvertently to larger regional anxieties. Agricultural reformers doubtless recognized the powerful resonance of moral suasion in their dealings with the temperance crusade’s troubling agenda for the New England cider tree. Reformers invoked the same tenets of moral suasion to compel farmers to engage in modes of agricultural reform requiring new obligations of capital and technology that might not pay off economically. When farmers resisted moral and economic arguments for improvement to their orchards, reformers often cited reasons that spoke toward their own cultural anxieties emanating from regional changes in New England. Just as the orchards of New England farmers suffered the depredations of temperance zealots in the 1830s, they were similarly vexed by dishonest traveling grafters, populated by fruit stealing mechanics and day laborers, or kept by farmers too aged to master the tasks of horticultural improvement. All of these vexations were not based upon economic or agricultural realities, but manifestations of rural anxiety toward industrialization, emigration, and emergent market economies.
Farmers, however, had very pertinent rationales for resting moral and economic suasion for planting new orchards of grafted market apples in the decades prior to the War for the Union.
NOTES

331 David Foster, Thoreau’s Country: Journey Through a Transformed Landscape (Cambridge, MA: Harvard University Press, 1999), 133.


La Marte Barney, “The Apple as Food,” Water Cure Journal (1 July 1848): 28; Barney’s description of trees suffering from withered leaves suggests that Long Island orchards suffered from such ailments as the blight or the rust.


“Signs of a Poor Farmer,” The New England Farmer 1, no. 6 (3 March 1849): 94.


William Kendrick, *The New American Orchardist, or an account of the most valuable varieties of fruit adapted to cultivation in the climate if the United States* (Boston, MA: Carter Hendeem, 1832), vii.


“Work for the Month,” *The American Farmer* 12, no. 5 (October 1856): 101. For the intersections of those interested in setting apple trees for future generations and
larger regional interests in rural beautification through arboriculture see, “Tree Planting,” *Friends Intelligencer* 12, no. 28 (29 September 1855): 447.


372 David Foster, *Thoreau’s Concord*, 127.


375 The specter of aged farmers too old to plant new orchards was an anxiety based upon some measure of reality. Hall Barron, for example, noted in his study of Chelsea, Vermont that the “critical” factor contributing to agricultural stagnation was a declining labor supply. There was work in the “hill country” but youth simply had more attractive alternatives in the urban cities or in the rural mid-west. See Hal Barron, “The Impact of Rural Depopulation on the Local Economy: Chelsea, Vermont, 1840-1900, *Agricultural History* 54, no. 2 (April 1980): 330, 334.


381 “Gratitude,” The Farmer & Gardener, and Live-Stock Breeder and Manager 2, no 44 (1 March 1836): 349.


390 “Work for the Month,” The American Farmer 12, no. 5 (October 1856): 101.


“Stealing Fruit. –Mis-Education of Boys,” *Southern Cultivator* 5, no. 2 (February 1847): 21.


“Sin Found Out,” *The Youth’s Companion* 16, no. 8 (1 July 1846): 30. The education of youth against the crime of stealing from orchards was among the most common collaborations between agriculturists, educators, and the religious press during the 1840s and 1850s. See “The Boys and the Apples,” *Universalist Watchman,*


414 “Law for the Protection of Gardens, &c.,” *Ohio Cultivator* 2, no. 6 (15 March, 1846): 47.

415 J.P. Kirtland, “Wintering of Bees,” *Prairie Farmer* 6, no. 1 (5 July 1860): 3; Kirtland’s recommendation for the protection of his bees and orchards was rather unique. “The next step,” reported Kirtland, “was to collect together my hives and arrange them in a line, under the raking of a saucy looking musket and to place among them, sundry mantraps, Orsini bombs, and certain nameless infernal machines, connected and rendered efficient by secreted wires.”

416 “Stealing Fruit, –Mis-Education of Boys,” *Southern Cultivator* 5, no. 2 (February 1847): 21.


418 For the “Peach Tree War” of New Amsterdam in 1655 see Oliver Rink, *Holland on the Hudson: An Economic and Social History of Dutch New York* (Ithaca, NY: Cornell University Press, 1986), 258-259. For the anxiety of Westchester farmers toward the influx of laborers and the subsequent theft of apples and other agricultural


421 “Stealing Fruit, –Mis-Education of Boys,” *Southern Cultivator* 5, no. 2 (February 1847): 21.


423 “Stealing Fruit, –Mis-Education of Boys,” *Southern Cultivator* 5, no. 2 (February 1847): 21.


425 See “Rural Economy” *The New York Farmer* 5, no. 15 (12 April 1832): 137; “Taxing Dogs” *Ohio Cultivator* 2, no. 2 (15 January 1846): 15. One author advocated for the planting of apple trees along public roadways as a means of alleviating the evils of others using such space to pasture their livestock. He noted that a loss of half the apples from theft to wayside travelers would be worth banishing neighbors’ livestock from public thoroughfares. See “How to Keep Cattle Out of the Highway,” *The Farmers’ Cabinet and American Heard Book* 2, no. 2 (15 August 1835): 31.
CHAPTER VIII

NEW ENGLAND APPLE CULTURE AND THE OHIO VALLEY

Fifty years after the first New England families entered the Connecticut Western Reserve C.J. Pitkin, a farmer and orchardist from North Bloomfield, Trumbull County, Ohio, recounted for Michael Bateham of the *Ohio Cultivator* “the history of a valuable apple which I have not seen noticed in any work pertaining to the science.”⁴²⁶ The Henderson Pippin, as remembered by Pitkin, originated as a seedling tree from a parent nursery in Hartford, Connecticut and came first to fruition under the culture of Jason Henderson in New Hartford, New York. Several years later New Hartford, New York emigrants took grafts of the Henderson Pippin to the Western Reserve of Ohio disseminating them among a number of burgeoning villages like Charleston, Hudson, and Painesville. By 1850 Pitkin noted that the Henderson Pippin could be found among only a handful of orchards in central New York and northeast Ohio. The “science” Pitkin referred to was undoubtedly that of pomology and as Pitkin’s history of the Henderson Pippin concluded in the pages of the *Ohio Cultivator* in 1848 it became less clear whether the author was speaking of New England apple culture or the experience of itinerate New England emigrants on the Ohio frontier more generally. Even as New Englanders grappled with agricultural transitions in apple culture throughout much of New England
in the four decades prior to the War for the Union, Ohio farmers of New England heritage were making lasting contributions to the emergent agricultural science of pomology.427

As Michael Bateham quickly acknowledged there were a number of inconsistencies with Pitkin’s history of the Henderson Pippin typical of the histories of so many Ohio apple varieties of New England provenance. Pitkin noted for example that the seedling trees taken from Harford, Connecticut produced a dozen trees of nearly identical fruit in New Hartford, New York. Bateman noted the improbability of such an occurrence and suggested to Pitkin that the seedling trees from Hartford, Connecticut had been grafted with some forgotten New England variety prior to their arrival in New Hartford, New York. When Pitkin wondered why some of his Henderson Pippins seemed transformed by the grafting process in his North Bloomfield, Ohio orchard, Bateham thought it likely some of the scions had been mislabeled in a prior orchard or some of the apples had perhaps originated from a non-grafted branch or another branch grafted with some forgotten variety on the parent tree. The New Englanders’ fondness for apple culture and the corresponding confusion coming from the transfer of that affection to the Ohio country eventually found palpable expression in the Ohio State Pomological Convention of 1847, among the first and most important of the early state conventions in the Union.

After a less than cordial relationship, the North American Pomological Convention and National Pomological Congress of New York merged creating The American Pomological Congress in 1850, the first truly national organization for the propagation of fruit culture in the Union. New York nurserymen, horticulturists, and
pomologists undoubtedly shaped the structure of the emergent national organization; however, a number of state societies shaped early organizational efforts between 1847 and 1850. During this first period of organization it was not the apple growers of New York but New England orchardists in Maine, Vermont, and Ohio that guided the Union in bringing ideals of progressive organization and agricultural science to apple cultivation. Of the three only Ohio remained prominent during the 1850s while similar organizations in Maine and Vermont became increasingly marginalized, fractured regionally, or were largely forgotten altogether. The motivations for organizing among Ohio apple growers differed markedly from growers in Maine and Vermont and as New Englanders became increasingly marginalized in national societies during the 1850s, Ohioans of New England heritage played increasingly prominent roles at the same national conventions.  

In the summer of 1846 Winthrop farmer Elijah Wood wrote optimistically of the future of apple culture in Maine:

I believe that the State of Maine, especially the central part, say the counties of Kennebec, Oxford, part of Somerset and Franklin, possesses greater advantages for the raising of apples than any other place I know of in America. The season is exactly long enough to perfect the apple.

Elijah Wood could be excused for such unabashed optimism, for the Kennebec township of Winthrop, Maine quietly emerged as the center of apple culture in Maine by the early 1840s. No fewer than five native apple varieties originated among the orchards of Winthrop farmers and nearly half of all Maine apple varieties came from Kennebec County prior to 1850. At $13.55 per farm Kennebec farmers produced more value from the products of their orchard in 1850 than any other county in Maine and almost double the average state-wide value of $7.33. Township valuators for Kennebec County reported
no cider among their returns in 1820, however, farm journals of men like Kennebec farmer Tobias Walker revealed that cider making was nearly as commonplace as cultivating grafted winter apples into the early 1850s. Kennebec farmers, nurserymen, and orchardists took leadership roles in the organization of a pomological society predicated upon issues that differed markedly from their New England cousins in the Ohio Country.\textsuperscript{430}

Maine farmers recognized the potential of the export apple market by the 1840s and many apple growers worked to transition their neighbors away from more traditional practices of stock feeding and cider pressing. These seasonal activities remained entrenched among farmers even as they lost favor across much of southern New England after 1840. In 1847 E. Burrit explained that apples used for cider and feeding hogs commanded higher prices when exported to England and, in 1848, Henry Little wrote that “… fruit grown in Maine will be found equal to any other, not even excepting that of Massachusetts or of New-York, particularly for exportation.”\textsuperscript{431} Even in poor years, argued D. Tabor, “still there are more apples than enough to supply our home market, and some thousands of barrels are now being shipped Massachusetts, Rhode Island, and even to N. [ew] York…”\textsuperscript{432} Although Tabor concluded “much more interest is now apparent among farmers in Maine than formally, in the cultivation of fruit as a source of profit. . .”,\textsuperscript{433} the early Maine state pomological gatherings first addressed the ecological limits of apple cultivation rather than the growth of extra-local export markets.

In spite of the success enjoyed among Kennebec farmers and their neighbors in Oxford, Somerset, and Franklin counties, Maine farmers produced the lowest average
yield of value per farm from orchard products in all of New England in 1850. In the extreme eastern counties of Washington, Hancock, and Aroostook the average values farmers gleaned from their orchards seasonally plummeted to $0.87, $1.65, and $0.80 respectively. Maine farmers recognized that the same cool temperatures preventing successful cultivation of grafted winter apples throughout large sections of the state could also be an advantage for storing and keeping apples for extra-local markets if only the boundaries of the Baldwin-Greening line could be pushed into the northern reaches of the Maine. Maine horticulturists realized that Baldwin, Rhode Island Greening, and other standard market varieties of southern New England would never thrive across much of the state and turned instead to identifying and testing seedling apple trees acclimated to their native environs. Native varieties or seedling apple trees commanded the attention of those who organized the Maine Pomological Convention of 1847.⁴³⁴

Convergent interests in extra-local markets while negotiating the ecological boundaries imposed on apple cultivation by the state’s unforgiving climate served as the foundation for the organization of the Maine Pomological Convention by Augusta and Winthrop orchardists, under the capable leadership of Dr. Ezekiel Holmes, in January 1847. Writing in 1848 S.N. Tabor remarked, “It is hoped that our Pomological Society will do much to test and disseminate new and superior varieties of native fruit.”⁴³⁵ The sentiment resonated in Maine’s leading agricultural journal a few months later. The most important objectives of the Maine Pomological Convention were listed by the Maine Farmer in 1847:

To encourage the propagation of good fruits; to seek out, describe, and make known to the public the best native fruits of all kinds; and to collect and publish
such facts and experiments in regard to all fruits that will grow in the state as shall be valuable to the cultivator."\textsuperscript{436}

Experimentation with new cold resistant apple trees and careful evaluation of previously unknown seedling native varieties, the tenets of the Maine convention, mirrored efforts among Vermont growers from 1849 to 1851 but differed markedly from those of Ohio farmers in 1847.\textsuperscript{437}

Vermont farmers and orchardists convened at Montpelier, Vermont on 18 October 1849 for their first pomological convention nearly three years after Maine growers came together to discuss the merits of new seedling varieties. The regional nature of this state gathering was noted by Chauncey Goodrich who quipped of the Vermont Pomology Convention of October 1849 that “only a small portion of our small territory was represented.”\textsuperscript{438} The following year an equally provincial group of Vermont apple growers gathered in St. Albans after the Franklin County Agricultural Fair on 4 October 1850 to display fruits and lay the foundation for a horticultural society to gather in 1851. The horticultural convention was regional in nature, however, and in 1851 representatives from four Champlain Valley counties in Vermont and two in New York gathered at Burlington, Vermont. The small cadre Vermont growers who tried to organize a state pomology convention in 1849 settled for a regional horticultural society catering to orchardists on both sides of Lake Champlain and was indicative of the widening schism between Champlain and Connecticut Valley apple growers.\textsuperscript{439}

The marginalization of the Vermont Pomology Convention of 1849 and the emergence of the Horticultural Society of Lake Champlain in 1851 spoke to sectional differences confounding the united efforts of prospective Vermont orchardists. In 1850
the Champlain counties of Addison, Chittenden, and Grand Isle averaged orchard values of $18.19, $17.74, and $33.11 respectively, while counties above the Baldwin-Greening Line like Orange, Caledonia, Essex, Washington, Orleans, and Lamoille all averaged returns under $10.00 per farmer. Vermont growers east and north of the Green Mountains turned to local cold resistant seedling varieties like the Tinmouth or Bethel for home use while Champlain orchardists turned their attention toward pushing back the northern growing boundaries of marketable winter apples in the valley. As in Maine the discovery and evaluation of cold resistant native seedling apple trees carried regional importance for many Vermont farmers, however, regional ecological concerns resonated little with the national New York and Ohio conventions during the late 1840s.  

In 1847 the Ohio Cultivator announced the assembly of a state pomological convention to gather in Columbus, Ohio in late September. Contemporary reaction was mixed nationally and agricultural journals like Hovey’s Magazine of Horticulture attempted to marginalize the importance of the Ohio convention in deference to more important apple producing states like Virginia, Pennsylvania, and New York. In a terse reply A. Fahnstock of Lancaster, Ohio recounted how the first call for an Ohio pomology convention came as early as the winter of 1844 and produced a legitimate convention in 1847, a full year before the Buffalo or Albany meetings in New York State. Still others ridiculed the Ohio Convention’s rather provincial stance in not addressing the confusion in vernacular names of other states. The attendees at the Buffalo convention the following year, for example, were more than willing to dismiss Ohio’s Cooper Apple as a vernacular name for an eastern variety, much to the chagrin of Buckeye
Ohio’s convention came nearly nine months after Maine’s, however, the issues taken up by the Ohio convention held national resonance assuring Ohio growers a place in the national conventions that followed in the early 1850s. Ironically, Ohio’s significance in the emerging national discourses of pomology in the Union was predicated upon agricultural endeavors of New England emigrants who populated eastern Ohio and grafted apple trees between 1788 and 1850.

The New England, New York, Pennsylvania, New Jersey, Maryland, Virginia, and Kentucky farmers who settled much of southern and eastern Ohio following the American Revolution left a remarkable legacy of biological diversity upon Ohio apple orchards. In the Connecticut Western Reserve pioneer farmers brought grafts of New England varieties from which to propagate their first orchards. Apple grafts of varieties from Pennsylvania, and Maryland orchards arrived with settlers from those states and were widely disseminated in the eastern central counties along the Ohio River and among the townships of the original Seven Ranges. In the southernmost part of Ohio, Kentucky and Virginia settlers grafted their orchards with varieties of similar origin in the Ohio River and Scioto Valley townships of the Virginia Military District. In 1796 a bastion of Massachusetts and Connecticut pioneers in Marietta, Ohio began disseminating New England varieties in this region of predominantly Southern heritage and by doing so shaped apple culture in the Midwest more than any other community in the Ohio River Valley.

Connecticut orchardists played a more important role than those of any other state in the Union in shaping the biological heritage of Ohio apple orchards. Countless
numbers of Connecticut varieties like the Henderson Pippin, and perhaps the Cooper, were taken as grafts to the Western Reserve by innumerable Connecticut farmers between 1798 and 1820. In East Bloomfield, New York a farmer and orchardist named Heman Chapin also left the indelible mark of Connecticut upon Western Reserve orchards. Chapin came from Salisbury, Connecticut and in 1800 planted an orchard of seedling trees of similar Connecticut heritage. No fewer than three of Chapin’s seedling apple trees came to be well regarded market varieties. They quickly found favor among Western Reserve orchardists, and were brought to the Western Reserve from Chapin’s orchard or purchased from the Elwanger Berry Nursery in neighboring Rochester, New York in the late 1840s. Most notable among these Bloomfield varieties were the Northern Spy, Early Joe, and a local vernacular variation of the Red Canada or “Nonesuch” well regarded in Summit County, Ohio as the “Richfield Nonesuch.” The imprint of Connecticut orchardists was even more conspicuous in the Ohio River Valley where the twenty-three varieties grafted in the Marietta nursery of Israel Putnam in 1796 were of Connecticut lineage. New Englanders, particularly those from Connecticut, shaped apple culture in the counties of the Western Reserve and the Ohio Company of Associates in ways that still resonated across the Union by the time of the Ohio Pomology Convention of 1847 and the national conventions emerging in the late 1840s and early 1850s.\(^445\)

As in New England, apple growing was locally significant in the Western Reserve from the time the first Connecticut emigrants came in 1798. When George Stanford, Jonathan Hale, and other Connecticut settlers arrived in the region a few years later they discovered Native American orchards along the Cuyahoga River in Boston Township and
in other neighborhoods as well. These orchards spoke furtively to the history of the Ohio Country as a land in-between if only Connecticut farmers would listen. Apple trees were not indigenous to the Americas and the seedling trees found in Native American clearings could only have thrived on the banks of the Cuyahoga through itinerate trading with the English, Dutch, and French empires nearly a century prior to the formation of the Western Reserve.

The first seedling orchards of the Western Reserve were scions of the intersections of the European and Native American communities of the Atlantic World. French settlers planted apple and pear trees near Detroit and Monroe, Michigan as early as 1675 or 1680. French pioneers planted apple trees in Vincennes, Indiana and Kaskaskia, Illinois after 1732 and it is likely some of the trees in the Cuyahoga River bottomlands were decedents of the hardy French Fameuse or Snow Apple, sometimes known as the Chimney Apple in the Champlain Valley. Trade with the English colonies flourished briefly in the Cuyahoga Valley during King George’s War in the 1740s and the native trees discovered by New England settlers sixty years later might just have easily originated with seeds left by itinerate Pennsylvania or Virginia traders passing through Mingo, Wyandot, or Ottawa villages.

The first Connecticut settlers of the Western Reserve also propagated their orchards absent the underpinnings of any local pomological authority. Scions or seedlings were brought into the reserve largely by individual farmers, like Jason Henderson, late of New Hartford, New York and raised in Hartford, Connecticut, who then exchanged grafts from their orchards among neighbors for nearly a generation. Only in 1824 did Professor
J. P. Kirtland arrive at his father’s farm in Poland, Trumbull County, Ohio and commence the first nursery business in the Western Reserve. Kirtland gathered from New England one hundred varieties of apples, peaches, pears, and cherries, adding hundreds more varieties from New Jersey and New York in following years.448

In 1824, however, the Western Reserve of J.P. Kirtland’s world was, at best, only tenuously connected to eastern markets by the completion of the Erie Canal to Buffalo, New York and the direction of Western Reserve apple culture developed accordingly. Some Western Reserve apples found their way to Southern markets (along with increasingly voluminous amounts of cheese), but most apple production was local in nature until the completion of the Ohio and Erie Canal from Cleveland to Portsmouth on the Ohio River in 1832. Even though farmers and progressive agriculturists recognized the beneficially moderating influence Lake Erie had upon local climate for horticultural endeavors, there was little of the kind of intensive fruit cultivation that became so common among the Lake Erie islands and the northern townships of Lorain, Cuyahoga, Lake, and Ashtabula counties by the end of the nineteenth century.

By the eve of the Ohio State Pomological Convention of 1847 Western Reserve orchardists participated in agricultural regimes which largely mimicked those of large sections of rural New England, rather than the corn and wheat belts of the burgeoning Midwestern states (Table 8.1). Although the production of English grains for export gained some traction in the southern third of the region, Western Reserve farmers, like the New England neighbors they left behind, were wool growers and dairymen by nature. The heavier clay soils of the northern two thirds of the district were ideally suited for hay
and pasturage and by 1850 local farmers were exporting increasingly large quantities of cheese to eastern and southern markets. Western Reserve farmers were integrated into a dairy region extending from northern-western New England, through much of central New York and into Crawford and Erie counties in Northeastern Pennsylvania. Summit and Portage county farmers like George Stanford mowed, collected shocks, produced large quantities of butter and cheese, and picked and sorted apples for market and cider well into the last decades of the nineteenth century. As in New England, apple culture fit well both ecologically and with labor obligations of Western Reserve farmers, and apple culture developed in a similar and unspectacular fashion prior to the War for the Union.

Table 8.1 Average Yield per Farm Ohio 1850

<table>
<thead>
<tr>
<th></th>
<th>Ohio</th>
<th>Western Reserve</th>
<th>Ohio Company</th>
</tr>
</thead>
<tbody>
<tr>
<td>Improved (acres)</td>
<td>68.5</td>
<td>66.6</td>
<td>60.5</td>
</tr>
<tr>
<td>Unimproved (acres)</td>
<td>56.6</td>
<td>37.2</td>
<td>94.6</td>
</tr>
<tr>
<td>Total (acres)</td>
<td>125.2</td>
<td>103.9</td>
<td>155.0</td>
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</tbody>
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Production

<p>| | | | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Orchard Products</td>
<td>$4.84</td>
<td>$4.64</td>
<td>$4.29</td>
</tr>
<tr>
<td>Corn (bush)</td>
<td>410.8</td>
<td>149.2</td>
<td>376.4</td>
</tr>
<tr>
<td>Wheat (bush)</td>
<td>100.7</td>
<td>53.5</td>
<td>57.0</td>
</tr>
<tr>
<td>Oats (bush)</td>
<td>93.7</td>
<td>92.1</td>
<td>50.3</td>
</tr>
<tr>
<td>Potatoes (bush)</td>
<td>35.2</td>
<td>50.3</td>
<td>56.4</td>
</tr>
<tr>
<td>Hay (bush)</td>
<td>10.0</td>
<td>19.1</td>
<td>6.9</td>
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<tr>
<td>Cattle</td>
<td>5.2</td>
<td>6.3</td>
<td>3.8</td>
</tr>
<tr>
<td>Swine</td>
<td>13.6</td>
<td>4.9</td>
<td>10.7</td>
</tr>
<tr>
<td>Sheep</td>
<td>27.4</td>
<td>37.6</td>
<td>19.2</td>
</tr>
<tr>
<td>Wool (lbs per sheep)</td>
<td>2.6</td>
<td>2.8</td>
<td>2.3</td>
</tr>
<tr>
<td>Milk Cows</td>
<td>3.8</td>
<td>5.2</td>
<td>3.2</td>
</tr>
<tr>
<td>Butter (lbs per cow)</td>
<td>63.3</td>
<td>61.7</td>
<td>53.8</td>
</tr>
<tr>
<td>Cheese (lbs per cow)</td>
<td>38.2</td>
<td>151.8</td>
<td>10.1</td>
</tr>
<tr>
<td>Maple Sugar (lbs)</td>
<td>31.9</td>
<td>73.5</td>
<td>0.7</td>
</tr>
</tbody>
</table>
Western Reserve apple culture reflected that of New England not only on account of early emigration patterns but also by similar intersections of ecology. The southern boundary of the Western Reserve was after all was an extension of the southern boundary of Connecticut across the eastern states of the Union. Portage, Geauga, and Ashtabula farmers cultivated old New England varieties on similar soils and similar climatological variations as New England growers thwarting much of the changes in growth, texture, color, and taste that plagued the same varieties under cultivation in southern Ohio. By 1860 the most common varieties of apples grown on Western Reserve farms were of New England origin like the Baldwin and Rhode Island Greening, or newer varieties from similar agricultural regions in upstate New York like the Esopus Spitzenburg or the Northern Spy. These varieties sold well in northeastern cities but were less popular in Southern communities along the Mississippi Valley and its tributaries or on the New Orleans wholesale markets. Farmers of New England lineage proved capable apple growers in the Western Reserve counties prior to the Civil War, however, it was their New England compatriots in southern Ohio who made lasting contributions to pomology and became, perhaps, the most remarkable New England orchardists of the antebellum period.

New England farmers in the Washington County, Ohio communities of Marietta, Belpre, and McConellsville shaped apple culture in the Ohio Valley for nearly half a century after the first settlers arrived opposite Fort Harmer in 1788. Marietta farmer and civic leader Israel Putnam and his brother Aaron W. Putnam in neighboring Belpre, Ohio, set out the first nursery of grafted apple trees, all of Connecticut varieties, in the Ohio
River Valley at Marietta in 1796.\textsuperscript{451} There was no more influential orchard in the history of the first three decades of the Ohio Valley. From 1796 to 1817 the Putnam Nursery of New England varieties provided the parent grafts for orchards in southern Ohio, southern Indiana, northern Kentucky, and the Kanawha River Valley of Virginia. New England families gained initial title to the fertile bottom lands of the Ohio and Muskingum River valleys and held tenaciously to these favored agricultural lands while Kentucky, Virginia, and Pennsylvania immigrants populated the more rugged, poorer regions of the Ohio Company lands. Early New England families used the Ohio River to pass over these less fertile highlands and created enclaves on the fine bottomlands from Newport, above Marietta, to Belpre and Quaker Bottom fifteen miles below Marietta in Lawrence County, Ohio. These early New England families also maintained favored positions in trade, commerce, and local government, and it was estimated the fully one third of those living in Washington County in 1850 could still count at least one relative of New England origin.\textsuperscript{452}

A number of Putnam’s original New England varieties were so changed by soils and climate of the Ohio River Valley as to take on new vernacular names when cultivated in the Midwest. The Cooper Apple, for example, was often thought by many pomologists to be some forgotten eastern variety transformed by its new environment, while the Putnam Russet was definitively identified as a vernacular of the Roxbury Russet of Massachusetts nativity. The Roxbury Russet, a winter variety in New England and the Western Reserve, became an autumn apple in the Ohio River Valley, while others like the famous New England Baldwin or Rhode Island Greening often fell from the trees of Ohio.
Valley orchards before they came to fruition. Washington County was also at the intersections of regional varieties brought in by settlers from the Southern and Mid-Atlantic States. The Belmont Apple, for example, was a highly regarded vernacular variety originating as the Well, Wells, Mama Bean, or Gate Apple in Lancaster, Pennsylvania. The Bracken, an apple of Kentucky origin, also became widely cultivated for the Southern market among New England orchardists on the northern bank of the Ohio River. During the first decades of the nineteenth century New England orchardists in southern Ohio discovered the soft underbelly of the Baldwin-Greening Line and accordingly experimented with new seedling varieties or older grafted kinds of Mid-Atlantic and Southern heritage to find suitable cultivators to take advantage of the New Orleans apple trade.  

Grafted apple varieties were much more important to the orchardists of the Ohio Company lands and neighboring counties because these farmers were already oriented to extra-local markets by the beginning of the nineteenth century. Most Southern farmers could not produce winter apples and the new communities of the upper Ohio River Valley moved quickly to fill Southern markets with good quality late keeping winter varieties. The Ohio River acted a great inland highway from the Midwestern interior to the Southern market town of New Orleans nearly two thousand miles away. New England farmers of the Ohio Company lands looked west and south to New Orleans markets and by 1811 thousands of barrels of apples, cider, and dried fruit were shipped from the upper reaches of the Ohio Valley annually. Even with completion of the Ohio and Erie Canal in 1832 this southward traffic remained strong throughout the 1840s.
Southern wholesale merchants preferred a handful of reliable grafted varieties that acted as market name brands and functioned to regulate quality among growers in Ohio and Indiana. Apples with Ohio Valley vernacular names like the Belmont or Roxbury Russet and new Ohio Valley seedling varieties like the Rome Beauty and Bracken gained notability and widespread recognition on the Southern market.

The Southern apple trade profoundly shaped the tenor and import of apple culture among Ohio River Valley farmers. The New Orleans apple market was thriving even prior to the War of 1812. From 5 October 1810 to 5 May 1811, for example, river traffic passing the falls of the Ohio shipped 4,193 barrels of cider, 4,200 barrels of apples, 2,250 barrels of royal cider, and 442 barrels of dried fruit. From 24 November 1810 to 24 January 1811, 197 flatboats and 14 keel boats passed over the falls of the Ohio with 3,759 barrels of apples, 1,085 barrels of cider, and 721 barrels of royal cider. Receipts for first full year of steam navigation on the Ohio River to New Orleans in 1816 returned 4,253 barrels of apples and 646 barrels of apple cider and the following year New Orleans wholesalers reported 925 barrels of cider, and 562 Barrels of apples. From the beginning of this early trade, Ohio orchardists learned to cultivate single varieties like the Belmont, Roxbury Russet, or Rome Beauty for the Southern market and as one writer quipped in 1860, “Snug little fortunes were made” shipping one variety of apple, like the Romanite or Rome Beauty, to the New Orleans Market.

New England orchardist remained remarkably influential in the Ohio River Valley on the eve of Ohio’s first state pomology convention in 1847. A number of prominent pomologists and progressive agriculturists of the 1840s were sons of prominent New
England families of the Ohio Company of Associates. Aaron Putnam was president of the Washington County Agricultural Society and contributed articles to the *Ohio Cultivator* concerning the role of his family’s nursery in the development of the Ohio River Valley.

S.A. Barker, a judge and orchardist from McConellsville, Morgan County, Ohio wrote widely about apple culture in the Ohio River Valley during the 1840s. George Dana of Belpre, Ohio maintained an extensive fruit orchard and in 1834 erected a press for cider vinegar so that Washington County farmers might benefit from their extensive harvests of windfall apples that could not be barreled and sent down to New Orleans as winter fruit.

H.N. Gillett of Quaker Bottom, Lawrence County, Ohio wrote more extensively of apple culture than any other orchardist in Ohio during the 1840s and played an important role in organizing the Ohio Pomological Convention of 1847. These men constituted a cadre of intellectuals of New England nativity who represented a like minded community of orchardists along the fertile bottomlands of the Ohio River Valley from Marietta to Quaker Bottom and beyond.458

No community in 1849 was more representative of Ohio Valley farmers’ commitment to specialization as orchardists than Quaker Bottom in Lawrence County, Ohio. Quaker Bottom was located on one of a number of extremely fertile plains on the north bank of the Ohio River and was roughly one mile in depth and nearly six miles long. The bottom straddled the Rome and Union township line and was located within the original boundaries of the lands of the Ohio Company of Associates. These rich favored soils were quickly acquired by emigrating New England farmers upriver from Marietta and Belpre. Roughly thirty Lawrence County farmers cultivated parts of Quaker Bottom
in 1849. Some were fortunate in that the entirety of their farms were located on the bottom, while others had some lands in the river valley and some on the high escarpment beyond. Among the residents of Quaker Bottom was H. N. Gillett, the most influential and prominent apple grower in the Ohio River Valley in the two decades prior to the Civil War.

Quaker Bottom farmers produced yields in apples and other agricultural products in quantities unmatched in New England or most other sections of the Ohio River Valley. On this rich bottomland these growers produced phenomenal quantities of corn, oats, and potatoes (Table 8.2). Average bushels of wheat were on par with state averages while Quaker Bottom farmers produced less than even the nominal average tons of hay for southeastern Ohio or Lawrence County. Contemporary agriculture journals like the *New England Farmer* noted that the farmers of Quaker Bottom specialized in potatoes, corn, peaches, apples, and green beans for the New Orleans trade as while as burgeoning local markets for the iron foundry workers in Lawrence and Scioto counties. It was the trade in winter apples for the Southern markets where Quaker Bottom farmers most excelled and

<p>| Table 8.2: Average Agricultural Yields Quaker Bottom, Lawrence County 1849 |
|-------------------------------------------------|---------|---------|--------|--------|</p>
<table>
<thead>
<tr>
<th>Amount</th>
<th>Average/Farm</th>
<th>Average/Acre</th>
<th>Acres/Farm</th>
</tr>
</thead>
<tbody>
<tr>
<td>Corn (bush)</td>
<td>34,872</td>
<td>1,162.4</td>
<td>55</td>
</tr>
<tr>
<td>Wheat (bush)</td>
<td>3,004</td>
<td>100.1</td>
<td>15</td>
</tr>
<tr>
<td>Oats (bush)</td>
<td>4,758</td>
<td>158.6</td>
<td>30</td>
</tr>
<tr>
<td>Potatoes (bush)</td>
<td>15,950</td>
<td>531.7</td>
<td>125</td>
</tr>
<tr>
<td>Beans (bush)</td>
<td>58</td>
<td>1.9</td>
<td>-</td>
</tr>
<tr>
<td>Buckwheat (bush)</td>
<td>105</td>
<td>3.5</td>
<td>-</td>
</tr>
<tr>
<td>Pork (lbs)</td>
<td>35,400</td>
<td>1,180</td>
<td>-</td>
</tr>
<tr>
<td>Hay (tons)</td>
<td>110</td>
<td>3.7</td>
<td>1.5</td>
</tr>
<tr>
<td>Grafted Trees</td>
<td>50,000</td>
<td>1,667</td>
<td>-</td>
</tr>
<tr>
<td>Apples (bbls)</td>
<td>1,310</td>
<td>43.7</td>
<td>-</td>
</tr>
<tr>
<td>Cider (bbls)</td>
<td>100</td>
<td>3.3</td>
<td>-</td>
</tr>
</tbody>
</table>
why southeastern Ohio became so important for the formation of the Ohio State Pomology Convention in 1847.

The Ohio Valley farmers of Quaker Bottom were more prolific orchardists than their brethren in the most progressive New England agricultural counties like Essex, Massachusetts in 1849. Quaker Bottom orchardists averaged 1,667 fruit trees per farm, a number unmatched in the most intensive apple district of Grand Isle, Vermont forty years after the American Civil War. In the fall of 1849 Quaker Bottom farmers shipped on average 43.7 barrels of apples down the Ohio River to Southern wholesale markets as distant as New Orleans. Each farmer averaged about $43.70 from the river trade in grafted apples while farmers in Lawrence County, the counties of the Ohio Company of Associates, and in Ohio averaged values of orchard products of only $2.56, $4.29, and $4.84 respectively (Table 8.3). Although it is unclear if they produced cider for consumption or for vinegar production, Quaker Bottom orchardists averaged 3.3 barrels per farm. Cider production was modest by the standard of 9 – 12 barrels of their New England forefathers a generation prior; however, they pressed more cider on average than

<table>
<thead>
<tr>
<th>Farms</th>
<th>Ohio</th>
<th>Western Reserve</th>
<th>Ohio Company</th>
<th>Lawrence County</th>
<th>Quaker Bottom</th>
</tr>
</thead>
<tbody>
<tr>
<td>Orchard Products</td>
<td>$4.84</td>
<td>$4.64</td>
<td>$4.29</td>
<td>$2.56</td>
<td>$43.70</td>
</tr>
<tr>
<td>Corn (bush)</td>
<td>410.8</td>
<td>149.2</td>
<td>376.4</td>
<td>741.8</td>
<td>1,162.4</td>
</tr>
<tr>
<td>Wheat (bush)</td>
<td>100.7</td>
<td>53.5</td>
<td>57.0</td>
<td>37.0</td>
<td>100.1</td>
</tr>
<tr>
<td>Oats (bush)</td>
<td>93.7</td>
<td>92.1</td>
<td>50.3</td>
<td>146.7</td>
<td>158.6</td>
</tr>
<tr>
<td>Potatoes (bush)</td>
<td>35.2</td>
<td>50.3</td>
<td>56.4</td>
<td>106.7</td>
<td>531.7</td>
</tr>
<tr>
<td>Hay (tons)</td>
<td>10.0</td>
<td>19.1</td>
<td>6.9</td>
<td>4.3</td>
<td>3.7</td>
</tr>
<tr>
<td>Swine</td>
<td>13.6</td>
<td>4.9</td>
<td>10.7</td>
<td>17.0</td>
<td>5.9</td>
</tr>
</tbody>
</table>
their New York neighbors in the Genesee Valley in 1855. These averages must have been fairly representative of the specialized pockets of orchardists on the Ohio Valley for Lawrence County orchardists reported nearly $30.00 in value of orchard products per farm in 1860 while neighboring Washington County, Ohio growers accounted for the shipment of nearly 23,000 barrels of apples to New Orleans in 1848.

Ohio Valley orchardists of New England heritage fundamentally shaped apple culture in Ohio and across the Midwest in the 1840. A small number of progressive agriculturists specialized in grafted winter apples for Southern markets and communities like Quaker Bottom, Marietta, and Belpre produced more barrels of market apples every fall than any similar sized towns in New England catering to the Boston wholesale market. No single nursery was more important in disseminating grafted apple varieties and spreading apple culture across the Midwest than the Putnam Nursery of Marietta, Ohio. These same orchardists also spread chaos over the identity and nomenclature of apple varieties throughout the Ohio River Valley as New England varieties were transformed by climate, old New England names were lost and replaced with new vernacular ones, or winter varieties like the Rhode Island Greening or Baldwin failed or developed into locally unreliable autumn apples. These early New England orchardists also collected local Ohio Valley seedlings or gave vernacular names to eastern varieties brought into the region by Virginia and Pennsylvania settlers further exacerbating confusion over the histories and qualities of countless apple varieties. While farmers of New England origin were undoubtedly a minority in the old Ohio Company lands by 1840, they left a remarkable imprint upon apple culture in the Ohio River Valley that
resonated in Ohio’s first major agricultural journal, *The Ohio Cultivator*, and provided a nationally significant context for Ohio’s state pomological convention in 1847.

First published in 1845, *The Ohio Cultivator* quickly emerged as a public forum for expressing the confusion among farmers, orchardists, nurserymen, progressive agriculturists, and pomologists in the buckeye state. That summer a bitter nurserymen acidly remarked that all are “aware of difficulties and sometimes serious disappointments that originate from the great number of names that are applied to the same variety, in different sections of the country,” expressing common despondence over the chaotic nature of apple growing in Ohio. Apple culture was the topic of articles, letters, and editorials submitted by seed dealers, nurserymen, gentleman farmers, and yeomen smallholders that filled the pages of the *Ohio Cultivator* with increasing frequency during 1846 and the spring of 1847. Ohio orchardists and farmers contested bitterly the true names and origins of locally cultivated apple varieties. As anxiety grew over the chaos becoming readily apparent in the Ohio apple growing community, the ongoing contest for control of vernacular language actually began to transform Ohio’s principle agricultural journal.463

Michael Bateham, editor of the *Ohio Cultivator*, began publishing detailed line drawings of various apples to assist the public in consolidating vernacular names of native varieties and exposing imposter varieties that, in actuality, were established eastern kinds propagated by local farmers across the Ohio under local identities. A new column known as “Apple Seedlings” appeared in 1846 where rural rustics and regional pomologists alike might attempt to prove the local origination of their neighborhood
varieties. Proof of native heritage became so important during the late 1830s and 1840s as nurserymen and farmers increasingly advocated for the elimination of vernacular names that the very word “seedling” became a suffix for new local varieties like Gillet’s Seedling, Miller’s Seedling, and Fink’s Seedling, acting as a referent to native origination in vernacular nomenclature.  

By the summer of 1846, cries for the elimination of common apple names, the establishment of rules and regulations for the naming of new varieties, and the necessity of holding a state wide pomological convention to act as an oversight committee filled the pages of the Ohio Cultivator with surprising regularity. Even the seemingly neutral issue of orchard theft, a mainstay topic of agricultural journals since the introduction of the New England Farmer, became polarized in the contest over control of vernacular names as progressive agriculturists accused their yeomen neighbors of stealing so much good fruit that it became economically unproductive for them to plant new and better orchards. The same gentleman confided in the Ohio Cultivator that the aforementioned rustics were equally disinclined to abandon their poor local varieties as there was good fruit for the stealing in their book farming neighbors’ orchards. Agitation for regulation of new varieties and the elimination of vernacular names produced substantive results as the Ohio Cultivator announced in 1847 the assembly of a state pomological convention in late September in Columbus, Ohio.

Ohio’s state pomological convention made lasting contributions to apple culture in that the issues addressed in Columbus by Ohio delegates like H.N. Gillett of Quaker Bottom spoke to issues that resonated with orchardists across the northern states of the
Union, particularly west of New England. The delegates of the Maine convention met first in January 1847; however, like their Vermont counterparts in 1849, issues like identifying new seedling varieties and winter hardiness were regional in nature and held far less import in a national context. The Ohio convention spoke to growing specialization among orchardists and the chaos in apple culture invariably fomented by six decades of westward expansion by New England and Southern pioneers with favored apples varieties as biologically diverse as their cultural perceptions of agriculture, free labor, slavery and abolition. By 1830 progressive agriculturists in New England were only beginning to transition farmers toward specialization in market apple varieties for Boston, Providence, and other regional markets. By 1820 New Englanders on the Ohio frontier were already successful market oriented orchardists of grafted apple varieties who participated in the expansive agricultural commerce of the Midwest and prospered by catering to distance extra-local markets like New Orleans.
NOTES


430 W.M. Munson, “Preliminary Notes of the Seedling Apples of Maine,” in Twenty-Third Annual Report of the Maine Agricultural Experiment Station (Orono, ME: State of Maine, 1908), 115-119; The best general overview of this history of Maine apple growing in the larger context of farming in that state is undoubtedly, Clarence Day, A History of Maine Agriculture 1604-1860 (Orono, ME; University of Maine Press, 1954), 203-219. However, for the formative history of every variety of apple known to have been propagated in Maine see George Stilphen, The Apples of Maine: A Compilation of the History, Physical and Cultural Characteristics of all the Varieties Known to Have Been Grown in the State of Maine (Otisfield, ME, Stilphen’s Crooked River Farm). Township valuation returns were taken from tables in Mosses Greenleaf, A Survey of the State of Maine: In Reference to its Geographic Features, Statistics and Political Economy (Portland, ME: Shirley and Hyde, 1829), 186-203. For apple growing from the perspective of a local Kennebec farmer see the Tobias Walker Diary, 16 October – 2 November 1844, Maine Historical Society, Portland, ME.


Maine Farmers’ preoccupation with the cold resistance of market varieties is evident in an 1849 article concerning the attributes of the well-regarded North Spy Apple. The author wrote that, “We have cultivated it several years in Maine, and in this section, without the least injury from cold winters. He continued, “It will endure more severe cold than the Baldwin or Greening.” “Northern Spy Apple,” The New England Farmer 1, no. 7 (17 March 1849): 105. For more on the cooling climate and crop change in northern New England, particularly Maine and Vermont, see; David Demeritt, “Climate, Cropping, and Society in Vermont 1820-1850,” Vermont History 59 (Summer 1991): 133-165. For climate and agriculture change in Maine between 1820 and 1840 see David Smith, William Barron, Anne Bridges, Janet TeBrake, and Harold Borns Jr., “Climate Fluctuation and Agricultural Change in Southern and Central New England, 1765-1880,” Maine Historical Society Quarterly 21, no. 4 (Spring 1982): 179-200. For Wheat and climate in Maine see Jamie Eves, “The Poor People Have Suddenly Become Rich: A Boom in Maine Wheat, 1793-1815,” Maine Historical Quarterly 27, no. 3 (Winter 1987): 114-117, 137.

S.N. Tabor, “Fruit Growing in Maine,” Boston Cultivator 10, no. 25 (17 June 1848): 194. Dr. Ezekiel Holmes was probably the formative agriculturist of Maine during the antebellum era. He not only served as the first president of the Maine Pomological Society but was also editor of the Maine Farmer and retained presidency of the Maine Pomological and Horticultural Society at least as late as 1859. “Untitled,” The New England Farmer 11, no. 2 (February 1859): 91; Day, History of Maine Agriculture, 1604-1860, 171, 215, 240-241.


A description of the first meeting of the Maine Pomological Society in early September of 1847 shows most interest was in showing new varieties of apples and pears. It is probable that the September date was a bit early for many Maine apple growers. This might explain the relative numbers of pears and absence of apples among society members. “Meeting of the Maine Pomological Society,” Maine Farmer 15, no. 36 (9 September 1836): 2. For interest in and identification “native” Maine varieties see, the Wingate Seedling in, “Pomological Society,” Maine Farmer 15, no. 31 (5 August 1847): 2; the Fairbanks Apple in, D.A.F. “The Fairbanks Apple,” Maine Farmer 17, no. 50 (13 December 1849): 1; and the Table Greening in, “Late Apples,” The New England Farmer 1, no. 15 (7 July 1849): 225.

439 “Vermont Fruit Growers” Convention,” *Boston Cultivator* 11, no. 41 (13 October 1849): 324; Chauncey Goodrich, “Pomological Report of Vermont,” in *Fifth Annual Report of the Board of Agriculture of the State of Ohio to the Forty-Ninth General Assembly, For the Year 1850*, (Columbus, OH: S. Medary, Printer, 1851), 556; C.M. Hovey, “Pomological Convention at St. Albans, Vt.,” *The Magazine of Horticulture, Botany, and all Useful Discoveries and Improvements in Rural Affairs* (Boston, MA: Hovey & Co., 1850), 518-519. The society was to be called the Horticultural Society of Lake Champlain. C.M. Hovey, “Horticultural Society in Vermont,” *The Magazine of Horticulture, Botany, and all Useful Discoveries and Improvements in Rural Affairs* (Boston: Hovey & Co., 1851), 136; the meeting was held in Burlington on 11 September 1851 and included representatives from the counties of Addison, Chittenden, Franklin, Grand Isle Vermont and Essex and Clinton in New York Represented. Many new seedling varieties were exhibited.

440 See Table 2.1-2.4 in Chapter II for apple growing statistics by county for average value of orchard products per farm in Vermont in 1850.


442 Ironically, Maine pomologists had to defend their state as the location of the first pomology convention against the claims of the Buffalo Convention of 1848 as well. Against such accusations one Maine writer confided: “The first convention of the kind was held in Maine.” He continued, “This convention, like the subsequent held at Columbus [Ohio], was confined to the limits of the State, and not very fully attended, but was the means of bringing out some good fruit, not before known out of the immediate neighborhood of its origin.” “Pomological Convention at Buffalo,” *Maine Farmer* 16, no. 43 (26 October 1848): 1.

443 The Cooper Apple brought no end of consternation among Ohioans and other pomologists. The Cooper again came up for review and was regarded more positively by the meeting of the American Pomological Congress at Cincinnati, Ohio in October of 1850. See “Pomology,” *Prairie Farmer* 11, no. 8 (August 1851): 352; see also B. Hodge, *The Pomological Congress at Cincinnati,* *Horticulturist and Journal of Rural Arts and Rural Taste* 4, (1 April 1851): 180; “The Cooper Apple,” *Horticulturist and Journal of Rural Art and Rural Taste* 1, no. 7 (January 1847): 339; Frances Gage, “Mrs. Jones’ Experience No. 4,” *Ohio Cultivator* 6, no. 23 (1 December 1850): 366.

444 *History of Delaware County and Ohio* (Chicago, IL: O.I. Baskin & Co., 1880), 156; *History of Medina County and Ohio* (Chicago, IL: Baskin & Battey, 1881), 156. The first orchard in Cincinnati was purportedly set on the Dana Farm about 1790 and probably held varieties of New England heritage.
For the History of the Northern Spy and the Richfield Nonesuch in the Western Reserve see, Jas. Weld, “Northern Spy Apple in Ohio,” Ohio Cultivator 8, no. 9 (1 May, 1852): 132. The Elwanger-Berry Nursery Papers are located in Rush Rheese Library at the University of Rochester along with the papers of Henry Chapin son of Heman Chapin of East Bloomfield who first introduced the Early Joe and the Northern Spy apples.

James S. Lippincott, “Fruit Regions of the Northern United States and Their Local Climates,” in Report of the Secretary of the Commissioner of Agriculture for the Year 1866 (Washington, DC: Government Printing Office, 1867), 170. This report also noted that the Western Reserve, particularly the counties bordering Lake Erie, led Ohio in apple production in 1866.


For the development of a dairy region extending from New England to Northeastern Ohio prior to the American Civil War see, Sally McMurry, Transforming Rural Life: Dairying families and Agricultural Change, 1820-1885 (Baltimore, MD: John Hopkins University Press, 1995), 12-15.


E.W. Gould, Fifty Years on the Mississippi, or Gould’s History of River Navigation, 202-203, 204-205.


463 Many of the original Putnam varieties, the Putnam Russet and the Cooper apple for example, brought no end of speculation among Ohio farmers as to their origins or if they were original varieties or vernacular varieties of old Connecticut kinds. See, for example, “Apples in Washington County—Letter from Wm. Putnun—The Cooper Apples,” Ohio Cultivator 3, no. 10 (15 May, 1847): 76-77.

464 The American Orchardist (1867): 458; Described as Fink’s Seedling in Ohio Cultivator 3 (15 May 1847): 47; Proper naming of new “native” varieties and the elimination of synonyms or vernacular varieties was so important that several rules laid down by the Buffalo Convention in September 1848 spoke directly to this issue. See “North American Pomological Convention,” Maine Farmer 17, no. 10 (8 March 1849): 1.

CHAPTE R IX

CONCLUSION: APPLE TREES AND ANTEBELLUM NEW ENGLAND

Transitions in apple culture spoke to the formative changes that New England farmers experienced during the three decades prior to the Civil War. In 1820 most New England farmers produced cider from native seedling apple trees for home consumption and local exchange. Cider trees proved a comfortable ecological fit with the New England climate since the seventeenth century while cider making fit well with other seasonal obligations and within the boundaries of finite labor resources. As New England farmers began specializing in fewer agricultural crops in response to growing Midwestern competition, progressive agriculturists like Peter Chardon Brooks, Chauncey Goodrich, and Jedediah Harris earnestly believed producing grafted winter apples for growing urban markets would profit all New England growers. As progressive agriculturists implored farmers to become orchardists rather than cider makers, they never fully understood the unforgiving ecological limitations, fiscal boundaries, or labor negotiations within which most New Englanders were forced to operate. Transitioning to producing grafted winter apple varieties required capital, new skill sets in setting, grafting, budding, trimming, sorting, barreling, and marketing, while simultaneously shifting more labor obligations to the fall harvest season. By 1860, fewer New Englanders produced apples for exchange.
and progressive agriculturists came to equate the decline of New England’s apple trees with rural recalcitrance toward agricultural improvement.

This study found that apple growing in New England did not gradually decline in response to antebellum shifts from cider making to winter apple cultivation, but rather that small farmers across the region made very calculated decisions to participate in new methods of apple cultivation. For farmers in counties like Essex, Massachusetts, investing in grafted apple orchards fit comfortably with similar specializations in market garden produce or fluid milk production that were meant to take advantage of growing markets in neighboring urban centers like Boston. For farmers in northern New England, winter apple production appeared viable only in favored regions like the Champlain Valley where the lake moderated cold New England winters and prolonged the growing season. While farmers in the upper Connecticut Valley they were still progressive agriculturists who redoubled their efforts to get greater yields from other specializations like wool and dairy.

The transitioning from cider making to winter apple cultivation required the restructuring of more local labor obligations for many New England farmers. Gathering cider apples from the ground could be done at the farmer’s convenience while grafted apples had to be picked by hand before they fell from the tree. Cider making took place from October to December after more pressing fall harvesting obligations were concluded while sorting, grading, and barreling winter apples had to be accomplished concurrently with other fall activities. Given enough land, labor, and capital, wealthy farmers like Jedediah Harris could overcome such limits while average farmers were forced to make calculated choices with finite fiscal and labor resources. An examination
of the 1850 and 1860 agricultural returns for every farmer in South Hero and Isle la Motte Townships in Vermont found that apple production did not generally decline but that a large percentage of farmers simply stopped producing apples for exchange. These findings suggest that even in regions well adapted to apple cultivation many farmers consciously chose to abandon their trees and redouble their efforts in other specializations. Significantly, even progressive agriculturists like Chauncey Goodrich, or Essex County farmers who regionally specialized in winter apple cultivation, could only make that transition from cider making by neglecting other pursuits like hay, dairy, and animal husbandry.

The agricultural transitions of antebellum New England were as much ecological as they were agricultural. When progressive agriculturists encouraged New England farmers to transition to the production of winter apples for extra-local markets they still thought of the apple in terms of the hardy New England seedling cider tree rather than the more fickle grafted variety. The cider tree was hardy enough to thrive on every New England farm. However, as farmers transitioned to market varieties they encountered the Baldwin Greening line where these varieties would not prosper across much of north-central New England. Apple culture actually declined because farmers transitioned to fewer varieties with less tolerance to the cold winters of the North-Atlantic region.

The transition from cider making to winter apple production brought other ecological changes to New England farms prior to the Civil War. There had always been orchards in New England; however, apple trees on many New England farms were traditionally more dispersed among home-lots, pasture, and mowing prior to the transitions toward market apple production in the 1830s. Progressive agriculturists
encouraged farmers to think of apple orchards as specialized spaces reserved for apple production alone, thereby negating some of the natural advantages of dispersing trees or utilizing orchards for other crops or the late summer pasturing of livestock. The abandonment of cider windfalls and the setting of new grafted varieties in orchards also encouraged the spread of apple tree diseases or infestations that continued to inhibit the apple industry in New England well into the twentieth century.  

Ironically, the settlers who came to the Ohio River Valley from Massachusetts and Connecticut in the last decades of the eighteenth century were the most successful “New England” orchardists of all precisely because they had already implemented and acted upon the transitions their progressive brethren back in antebellum New England were encouraging decades later. These New England orchardists in the Ohio River Valley produced plenty of cider prior to 1830; however, they turned to grafted varieties from New England as soon as they set the first apple trees on their farms. By 1811 they were already engaged in trade with extra-local markets in New Orleans that encouraged the production of one or two grafted apple varieties for exchange. Marietta and Belpre farmers were progressive orchardists who experimented with New England varieties in more southerly climates or adopted Southern, native, and mid-Atlantic varieties brought into the region by other settlers. By 1850, their experience in the Ohio River Valley resonated at a national level, and as New England growers became more marginalized, Ohio orchardists played an increasingly important role in emergent national apple growing organizations like the American Pomological Congress.

Apple growing spoke to changing social transformations as easily as it elucidated agricultural shifts in antebellum New England.  

Even though tax valuations for
Massachusetts and Maine prior to 1820 suggested that cider production and consumption were both declining across much of New England, the temperance movement shaped the way in which the agricultural press thought of apple culture during the 1830s. It appeared at times that agricultural writers were so attentive to the rural fervor of the temperance cause, and how it may have shaped farmers’ interactions with their apple trees, that they missed more mundane ecological, social, and economic causes for the seeming abandonment of antebellum New England orchards. However, progressive agriculturists were sensitive to the social and sectional fervor of the antebellum period and expropriated similar rhetoric of moral and civic reciprocity to encourage New Englanders to attempt the difficult transition from cider making to winter apple cultivation on their farms.

Although this study offers valuable new contributions to our understandings of agricultural and social transition in antebellum New England, there are a number of new directions for subsequent research. In the course of working with individual farm returns for North Hero and Isle La Motte townships in Grand Isle County and rural directories for farmers in Windham County, Vermont, it tentatively appeared that farmers who remained committed to apple culture after 1860 were related to one another or lived in close geographic proximity. It makes sense that groups of neighbors or relatives might create networks of skilled laborers with the knowledge and abilities to graft, trim, pick, sort, barrel, and collectively ship apples to extra-local markets. Work in this direction might reveal that local kinship or neighborhood networks, particularly in the upper Connecticut River Valley, were more important than ecology, capital, or infrastructure in
the development of small pockets of specialized orchardists in mid-late-nineteenth-century New England.

Another area ripe for further exploration would be the development of a more comprehensive analysis of how gender shaped the antebellum transition from cider making to winter apple production among antebellum New England farmers. Women and children were almost entirely absent from the orchard work recorded in the eighty or more farmers’ diaries and account books used for this study. Women and children undoubtedly contributed many of the labor hours committed to trimming, grafting, picking and sorting apples for market, however, these kinds of diaries often doubled as account books and in most instances it was only outside male hired laborers that were specifically identified in these sources. Farmers’ diaries spoke to work outside of the household and, in hindsight; these kinds of documents were not the best places to look for gender negotiations in the apple orchard. Cider making was male work in nineteenth-century New England and as this declined in the 1830s and 1840s much of that work must have undoubtedly been renegotiated as female work in the form of processing or preserving winter apples that were not barreled for extra-local markets. Future work with women’s diaries will almost certainly reveal transitions in labor obligations from male to female household members as farmers abandoned the cider mill and turned instead to the paring, canning, and the drying of winter apples for extra-local exchange.

Finally, this study might have more to offer on the residual mentality of what constituted a “good farmer” in late-nineteenth-century New England and how regional specializations, like apple growing, were culturally constructed. While offering an explanation to the Vermont Horticultural Society for the miserable state of orchards in
Washington County in 1910, for example, C.O. Ormsbee concluded that it was not “from ignorance or shiftlessness, but wholly from indifference.” He concluded that Washington farmers were “progressive” and “prosperous” and that “they care no more of it [apple growing] than the average lawyer cares for religion.” Even absent the more fervent social and sectional rhetoric of the antebellum period there is a sense from the transactions of the Vermont Agricultural Society, at the beginning of the twentieth century, that good apple orchards were still biological referents for the moral and civic wellbeing of rural communities. Neighboring Windsor County orchardists felt they could not compete with the Champlain Valley apple district even though Windsor County had ample infrastructure, was below the Baldwin Greening line, and closer to the Boston market. Why equally capable Windsor County growers came to view Champlain Valley orchardists as the only Vermonters who could specialize in apple culture was a process that began with Chauncey Goodrich in the 1840s and took nearly seven decades to create. Their story should be told, but that is for another time.

*Apples Abound* was meant to explore the intersections of agricultural and cultural change in antebellum New England through the experience, decisions, and negotiations of farmers and progressive agriculturists as they transitioned from being cider makers to winter apple cultivators between 1820 and 1860. It offers new scholarship into the ecological and social boundaries of agricultural transition in the North-Atlantic region. In the process it demonstrated how a traditional agricultural activity like apple cultivation reveals much about how farmers and progressive agriculturists perceived themselves and their world in the three decades prior to the American Civil War. In the fall of 1857 a prior farm owner, former shopkeeper, and itinerant farm laborer named Jesse Jewell
gathered apples on the Bolton, Vermont farm of his relative named Isaac probably unaware of the larger meanings this simple act conveyed. This same negotiation thousands of times over and across three decades of growing seasons in antebellum New England spoke powerfully to agricultural change, rural continuity, and social ferment in the North-Atlantic states of the Union.
NOTES


469 For excellent examples of how gender roles in transitions of agricultural labor from outside the household to inside the household could be incorporated into this study see Sally McMurry, *Transforming Rural Life: Dairying Families and Agricultural Change, 1820 – 1885* (Baltimore, MD: John Hopkins University Press, 1995); Martin Bruegel, *Farm, Shop, Landing: The Rise of Market Society in the Hudson Valley, 1780-1850* (Durham: Duke University Press, 2002).


471 The Diary of Jesse Jewell, 28-29 September 1857, Personal Collection of John Robert Henris, Cuyahoga Falls, OH.
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