

THE RISE OF TOBACCO AS A SOUTHERN APPALACHIAN STAPLE:
MADISON COUNTY, NORTH CAROLINA¹

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This paper traces the development of the farm system in Madison County, North Carolina from the mid-19th century to the present, describing processes that contributed to the rise of tobacco as a Southern Appalachian staple, including the diffusion of technological and biological innovations, regional economic development, the changing political economy of tobacco manufacturing, and federal intervention. Using census data, published historical accounts, and contemporary newspaper articles, this paper details two eras of commercial tobacco production in western North Carolina. The Flue-Cured Era lasted from the 1870s into the first decade of the 20th century. The Burley Era started in the mid-1920s and continues to the present, tempered recently by the development of an amenity landscape.

Tobacco is a contested commodity in late 20th century American society. It is the subject of litigation, an object of corporate strategizing, and a symbol for individual freedoms. It is reviled, defended, and openly or surreptitiously indulged in. It has also been a cash crop and source of livelihood in Southern Appalachia for over 100 years. Amid the furor of tobacco discourse, the small-scale tobacco farmers of this region merit attention because of the sensitivity of the mountain environment, economic underdevelopment that historically has plagued the region, recent farm trends that favor the growth of agribusiness over family farms, and the continuation of a traditional lifestyle that symbolizes, for many, a rural ideal.

This paper examines why and how tobacco came to occupy a central role in the farm system of one southern Appalachian county. Madison County, North Carolina lies in the smaller of two core burley tobacco producing areas (Fig. 1). Grounding the study of agrarian continuity and change in a particular locale illuminates the interactions of national and regional forces with local environment, economy, and culture. Madison County reflects many of the processes that have transformed Southern Appalachia during the past century and a half, and thus, serves as a case study both of Appalachian agrarianism and of adaptation by small-scale farmers.

THE SETTING. Madison County lies in the Blue Ridge province of the southern Appalachian Mountains on the North Carolina-Tennessee border (Fig. 2). The

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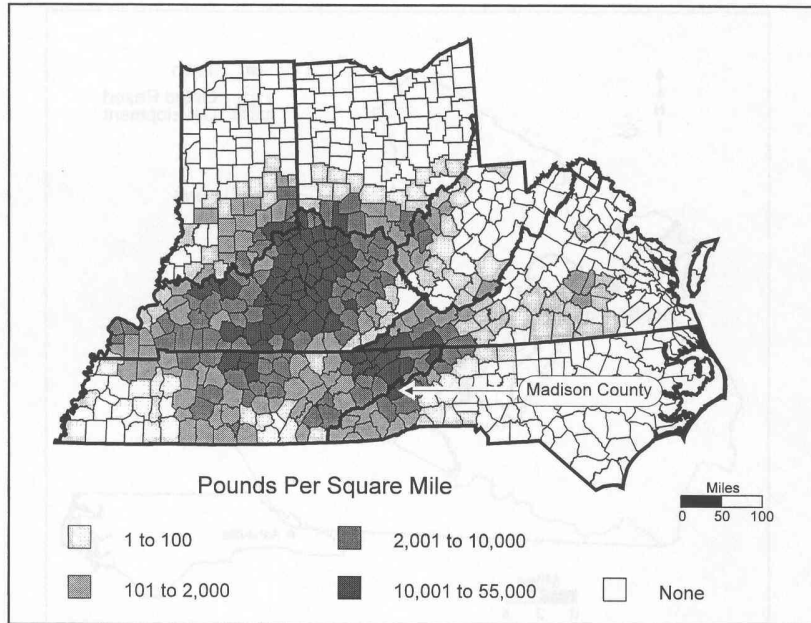


Fig. 1. Burley production by county, 1993. *Source:* Agricultural Stabilization and Conservation Service.

rolling hills of the Asheville Basin occupy the southern and eastern parts of the county. Elevations become higher and the topography more rugged to the north and west, where peaks range between 3600 and 5500 feet. The county is bisected by the French Broad River, which flows north to the Tennessee and is not navigable along this part of its course.

Euro-American settlement occurred primarily in the wider valleys of the French Broad's tributaries. Today's population is largely descended from settlers of English, German, Irish, and Scotch-Irish origin and is unusually homogeneous. African Americans comprise less than 1% of the county population, far below the state proportion of 22% (U.S. Census Bureau, 1991; U.S. Census Bureau, 1992a). The county retains a strongly rural character, and none of the three incorporated towns contains the minimum population of 2500 needed to qualify for the Census Bureau designation of "urban place." Instead, the county's 16,953 residents (U.S. Census Bureau, 1991) occupy a low-density sprawl of houses and trailer homes.

TOBACCO IN WESTERN NORTH CAROLINA. Two distinct eras of tobacco cash cropping in western North Carolina are distinguished by the type of tobacco

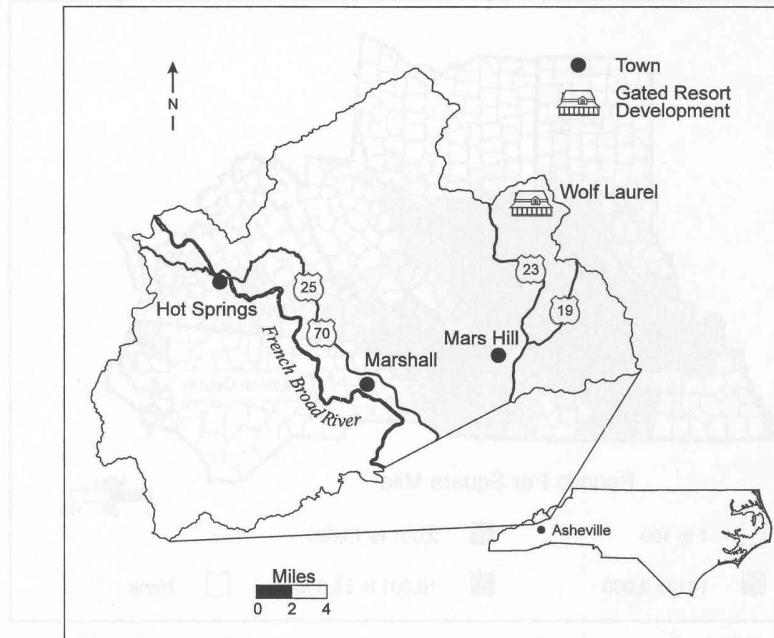


Fig. 2. Madison County, North Carolina.

grown and the method used to cure the leaf (Fig. 3). The mountain counties are famous for producing air-cured burley tobacco during most of this century, but their production of flue-cured bright leaf in the 19th century is less well known. This earlier tobacco era is significant because flue-curing technology and bright tobacco varieties were adopted in the mountains nearly simultaneously with their diffusion through the Piedmont and Coastal Plain, testifying to Appalachian awareness of agricultural innovations, adaptability to changing market conditions, and readiness to adopt non-capital-intensive technologies.

Madison County stands out within western North Carolina for the rapidity and degree to which its farmers embraced commercial tobacco production. At the onset of each era, Madison farmers expanded acreage faster than farmers in other counties, and they persisted in cultivating tobacco during market downturns, when production in other counties plummeted. This affinity for market production had a precedent in the cash cropping of corn. During much of the 19th century, the Buncombe Turnpike and the drovers who traversed this route along the French Broad River created a substantial market for locally grown corn to feed slow-moving herds of cattle, hogs, and turkeys (Dykeman, 1955, pp. 138-143). Corn production tied mountain farmers into a credit system financed by general

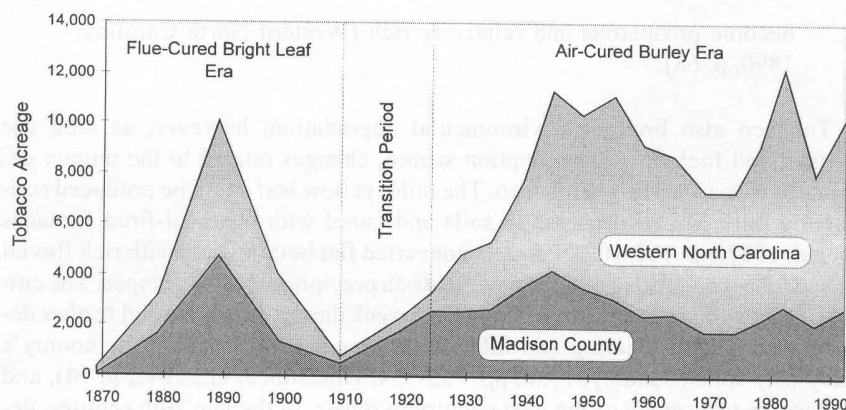


Fig. 3. Tobacco in Western North Carolina, 1869 - 1992. Acreage for 1869 was estimated from reported production and an average yield of 500 lbs. per acre. Source: U.S. Census of Agriculture.

stores. Farmers purchased supplies on credit throughout the year in exchange for payment in corn at the time of the fall droves (Blackmun, 1977, pp. 219-220). Store owners along the pike ran stockstands, where drovers bought corn to feed animals corralled for the night (Wellman, 1973, p. 44). Madison County's 19th-century farm system thus was a crucial link in extra-regional trade, connecting livestock-producing regions west of the Appalachians with markets in the low-land South (Inscoc, 1989, p. 52).

The Flue-Cured Era. The adoption of flue-cured tobacco by large numbers of farmers in the 1870s and 1880s was a response to increased market access and the diffusion of innovations in tobacco culture. This burgeoning commercial production differed from the limited tobacco production for home consumption and barter that had long been part of a diversified agropastoral farm strategy in the Appalachians. Farmers increasingly marketed their own crops, and the role of the store owner in aggregating and marketing tobacco declined. The result was an infusion of cash to farmers at a time when cash was scarce in Appalachia:

Madison County is pre-eminent in the quality and quantity of its tobacco. That crop can be raised on a comparatively small area, and great values can be compressed into relatively small bulk. This has given increased value to lands. Mountain tops and ridges that seemed forever destined to wear their verdure and crown of forests have been brought into cultivation; and men who a few years ago were scarcely familiar with the name or sight of money have

become prosperous and relatively rich (Western North Carolina, 1890, p. 68).

Tobacco also brought environmental degradation, however, as land use changed and fuel wood consumption soared, changes related to the unique demands of flue-cured bright tobacco. The mild, yellow leaf could be produced consistently only if grown on sandy soils and cured with charcoal-fired furnaces (Siegel, 1987, pp. 100-102). Farmers converted flat bottomlands with rich fluvial soils to tobacco, but also cleared new fields on precipitously steep slopes. The cutting of fuelwood to keep fires burning for a week during curing caused further deforestation. Forest clearing and hillside farming severely gullied the county's heavy clay soils (Sondley, 1930, pp. 733-734; Goldston et al., 1942, p. 14), and the damage took much of the next century to repair. In the late 20th century, decrepit tobacco barns in the midst of hardwood forests mark formerly cultivated mountainsides.

Increased market access after the Civil War spurred tobacco production, and farmers who sold directly to manufacturers lost less of the proceeds of their labor to middlemen. Before the war, better-connected farmers and store owners who pooled tobacco could afford to engage the services of a Knoxville commission merchant who would arrange for tobacco to be shipped to New Orleans via the Mississippi (Dunaway, 1996, p. 236). They could also ship hogsheads of tobacco by rail from Old Fort, east of Asheville, to one of the principal auction markets in Danville, Richmond, Lynchburg, or Petersburg, Virginia (Robert, 1933, p. 178). Small-scale farmers had fewer options. They could barter tobacco at a country store or sell to a "drummer"—a roving tobacco company buyer who bought leaf in the barn or standing in the field (Robert, 1933, p. 181). Prices paid in both instances were below market value, and the farmer paid high interest and a 40% to 70% mark-up on store goods purchased on credit (Campbell, 1993, p. 9; Dunaway, 1996, p. 241). Considerable speculation occurred, and much tobacco changed hands several times before finally being sold to a manufacturer (Hanna, 1934, p. 299).

Market access was facilitated by two developments—Reconstruction-era railroad building and the creation of a regional tobacco market in Asheville. In 1868, a railroad line between Wolf Creek, Tennessee, four miles west of the Madison County line, and Morristown, Tennessee, was completed. Tobacco acreage initially expanded in the northern part of the county, which, except for relatively narrow bottomlands, was generally unsuited for agriculture (Yoder, 1949, p. 48). Expansion here, instead of on the rolling hills of the southern and eastern part of the county that produce most of today's tobacco, suggests the importance of the rail link through Morristown to Knoxville and other markets. Despite the mountains, egress to the railhead at Wolf Creek was not as difficult as might be imagined. Most roads ran along creek beds or wider valley bottoms, so that the

dendritic drainage pattern of the watershed connected roads in side coves and tributary valleys to the Buncombe Turnpike (Holmes, 1911, p. 50). In 1882, a railroad line was extended from Asheville to Wolf Creek, and six railroad stations in Madison County gave farmers access to distant markets on both sides of the Blue Ridge.

Markets gave farmers access to multiple potential buyers and greater knowledge of current prices so that they were less likely to accept a low valuation of their crop. Auction sales started in Asheville at the Pioneer Warehouse in 1879. The following year Asheville supported four sales warehouses and Madison County one (Sondley, 1930, p. 729; Van Noppen and Van Noppen, 1973, p. 276). By 1889, Asheville was marketing 80% of the western North Carolina crop (Western North Carolina, 1890, p. 62). In the greater anonymity of fast-paced auction sales, social capital, such as class and business connections, probably became less important as a determinant of price. One observer, however, suggests that the market was not a perfectly egalitarian institution: "The more humble farmers could afford to pay their better known neighbors two cents a pound to market their tobacco" (Hanna, 1934, p. 301).

Restructuring of tobacco manufacturing in the late 19th century and the national fiscal crisis of the 1890s ended the flue-cured era in western North Carolina. During the last two decades of the 19th century, the American Tobacco Company staged an aggressive consolidation of tobacco manufacturing ownership. By 1910, that company had established a near-monopoly, controlling 80% of U.S. tobacco manufacturing outside of the cigar sector (Robert, 1949, p. 146). The manufacturing monopoly created a monopsony in tobacco sales warehouses that allowed buyers to dictate farm prices. Burley prices in 1880 on the Louisville and St. Louis markets ranged from three to twenty-five cents per pound, depending on grade, with an average of seven to eight cents per pound (Dodge, 1881, pp. 943-945). Prices on the Asheville market were similar to those of the western markets. In 1879, Madison County farmers received an average of eight to twenty cents per pound (Killebrew, 1881, p. 119). At the height of the monopsony, tobacco prices fell to one half cent per pound, and many farmers abandoned tobacco production (Farmers Federation, 1942).

Monopsonistic buying practices were compounded by the collapse of the Asheville flue-cured market. Credit for warehouse operators was severely constricted following the national bank panic of 1893, and all the Asheville warehouses folded within four years (Sondley, 1930, p. 732). Farmers then bore the added onus of railroad freight rates in order to market their tobacco. Tales from this time abound of farmers who shipped their crop to market only to receive a bill from the railroad company when the tobacco's price failed to cover its shipping cost. Many farmers fell into debt when tobacco prices fell below the cost of production, and tenancy rates soared between 1880 and 1910 (Campbell, 1993, p. 2, 9).

The Burley Era. Commercial tobacco production in western North Carolina revived following the 1911 break-up of the American Tobacco Company. Although flue-cured production recovered briefly, farmers rapidly adopted a new type of tobacco that had been diffusing south- and eastward since its discovery in southern Ohio in 1864 (Axton, 1975, p. 68). During the 1920s, this new air-cured tobacco almost completely replaced flue-cured tobacco in Madison County. Burley, the youngest of the major tobacco types, originated as a genetic mutation in several dark tobacco plants on one southern Ohio farm (Axton, 1975, p. 68). Production expanded rapidly from this hearth because burley's physical properties ideally suited it for the most popular tobacco products of the late 19th century. The leaf's low natural sugar content and porous structure made it extremely absorptive, a quality valued by manufacturers of chewing tobacco. Plugs and twists of chewing tobacco were infused with flavorings and sweeteners both to make the tobacco more palatable and to differentiate among proliferating brands (Siegel, 1987, pp. 132-133). Burley could absorb four to six times more flavorings by weight than other varieties, and it became popular among chewers (Axton, 1975, pp. 71-72). During the late 19th century, chewing rivaled cigar-smoking as the most popular mode of tobacco consumption, and chewing tobacco led all other forms of consumption in pounds per capita from the turn of the century into the early 1920s (Robert, 1949, p. 104, 225). This demand ensured that burley received consistently good prices in an otherwise volatile market.

Burley diffusion initially followed the valleys of the Ohio River and its navigable tributaries because water transportation was critical for moving heavy barrels of tobacco (Axton, 1975, pp. 48-49). During the 1860s and 1870s burley replaced dark tobacco and hemp in the Ohio River valley and the Bluegrass region of Kentucky (Dodge, 1881, pp. 881-950). Cincinnati became a marketing and distribution center, but manufacture was concentrated in New York, long a tobacco manufacturing center, and in St. Louis's burgeoning plug industry (Dodge, 1881, pp. 943-945). In later decades, Louisville grew to prominence in both distribution and manufacture of burley. In the 1880s production spread up the Missouri River valley and into central and eastern Tennessee. A few farmers in Madison and neighboring Buncombe County experimented with burley as early as 1898, but it was not widely accepted until the mid-1920s (Sondley, 1930, p. 734). By this time chewing tobacco was losing favor to the new American blended cigarettes, but as these were one-third burley in composition, swelling ranks of cigarette smokers maintained the burley market (Goodman, 1993, pp. 246-247; Robert, 1949, pp. 230-240).

Competition from eastern flue-cured growers, whose soils were better suited to bright tobacco production, encouraged the adoption of burley in Madison County and the surrounding mountain area (Tilley, 1948, pp. 140-141). Tobacco is highly sensitive to soil type, and varietal characteristics can change in different soils (Killebrew, 1903, p. 46). The best bright leaf is grown on nutrient-poor, sandy soils, like those around Danville, Virginia, in the Old Bright Belt and those

of the coastal plain of the Carolinas and Georgia, the New Bright Belt (Siegel, 1987, p. 101). Madison County soils, which are dominated by heavy loams and clays of the Hayesville, Halewood, Porters, and Ashe series (Goldston et al., 1942, p. 12), are better suited to burley than bright leaf. Diffusion of burley in the 19th century was primarily into areas with limestone-rich soils, and these early producers eschewed the use of fertilizer and manure (Killebrew and Myrick, 1903, pp. 342-344). Increases in the availability of lime and chemical fertilizers following the First World War allowed Madison County farmers to treat their acidic soils and produce high-quality burley. The use of lime tripled nationwide between 1910 and 1920 (Cochrane, 1979, p. 109).

The creation of a burley tobacco market in Asheville and active promotion of burley by those associated with the market contributed to the rapid expansion of burley production in western North Carolina. Markets existed in Greeneville, Johnson City, and Morristown, Tennessee, but Asheville was closer and more accessible to much of the prime farmland in Madison County. Asheville's first burley auction warehouse opened in 1930, financed jointly by the Farmers Federation, a regional agricultural cooperative, and the Asheville Chamber of Commerce (Farmers Federation, 1946, p. 13). The chamber businessmen anticipated, in addition to a return on their investment, increased trade from farmers flush with tobacco checks. The Farmers Federation, under the leadership of James McClure, had worked since its inception in 1920 to improve farm practices and raise farm income in western North Carolina. It sponsored cooperative purchase of supplies, established markets for farm produce, and created storage and processing facilities. The tomato canning plant that the Federation built in Hedersonville in 1928, for instance, provided an alternative to the seasonally glutted fresh tomato market (Farmers Federation, 1946, p. 15).

James McClure started promoting burley as a cash crop for the mountains in 1926 (Ager, 1991, p. 269). He had extensive connections with the Asheville elite and national business leaders (Ager, 1991) and may have convinced tobacco manufacturers to send buyers to Asheville. Tobacco company buyers made the market, for without them there could be no auction. Once Asheville was on their circuit, however, other warehouses were easily added to the daily auction schedule. Financiers moved to take advantage of the presence of buyers and other economies of agglomeration, such as stemming and redrying facilities, and the market grew to 11 sales warehouses by 1950. McClure was instrumental in bringing a second set of buyers to the expanded Asheville market in the 1950s (Ager, 1991, p. 446). Warehouse owners also promoted burley cultivation to increase their sales volume. Victor Shelbourne of the New Banner Warehouse, for instance, held meetings in country schoolhouses to instruct farmers in cultivation techniques (Farmers Federation, 1933).

The federal tobacco program, instituted in 1933 as part of a wider commodity program to restore farm income to pre-Depression levels, largely insulated growers

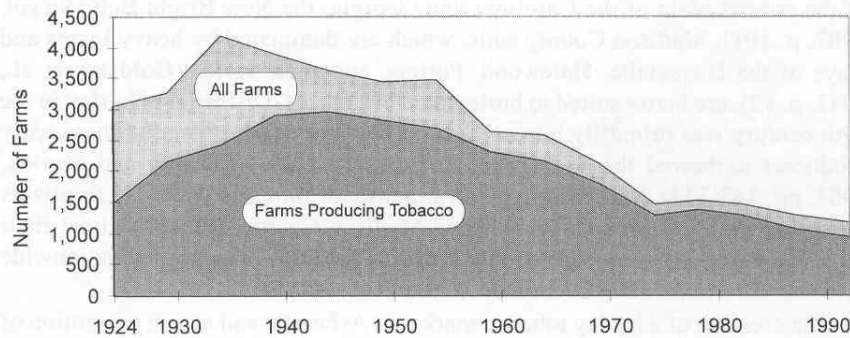


Fig. 4. Number of farms: All farms and farms producing tobacco, Madison County, 1924-1992. *Source:* U.S. Census of Agriculture.

from market price fluctuations and made tobacco a stable source of income (Johnson, 1984, pp. 52-55). The program originated in the Agricultural Adjustment Act (AAA) of 1933, a New Deal response to the farm crisis that saw prices drop over 50% between 1929 and 1932 (Blanpied, 1984, p. 7). The AAA attempted to stem the tide of farm foreclosures by restoring farm income to pre-Depression levels through control of the supply and price of basic farm commodities, such as wheat, corn, cotton, rice, peanuts, and tobacco. The program guaranteed farmers a minimum price for tobacco in exchange for limiting the amount they produced. The program has been a powerful force in maintaining the status quo of burley production. It constrains who grows tobacco, how much they grow, where they grow it, and the price they receive. Although the tobacco program has been criticized as a "government-sponsored cartel" that protects entrenched tobacco production rights and creates barriers to entry into production (Moyer and Josling, 1990, p. 142, 162), the program had a salutary effect on small-scale farming in Madison County. The combination of a readily accessible market and stable price made tobacco an attractive cash crop that usually supplemented income from other sources. Although the absolute number of tobacco farms fell after 1944, the proportion of farms growing tobacco continued to climb, reaching a high of 90% in 1978 (Fig. 4).

Visible signs of traditional farming in Madison County mask less obvious indicators of farmer adaptiveness to external constraints and opportunities. Practices such as setting tobacco by hand and plowing with mules and horses are well adapted to small fields and steep mountain slopes and persist to the present, but retention of traditional farming methods does not imply that production practices have remained static. Farmer response to two means of production control used by the federal tobacco program is one example of adaptation. Until 1971, the tobacco program limited production through acreage allotments, which were

TABLE 1
NUMBER OF TOBACCO FARMS BY ACREAGE, MADISON COUNTY,
NORTH CAROLINA, 1992

Tobacco acreage	Number of farms	Percentage
0.1-2.9	612	65.1
3.0-9.9	285	30.3
10.0-24.9	39	4.2
25.0-49.9	4	0.4
Total	940	100.0

Source: U.S. Census of Agriculture.

based initially on the amount of cropland on each farm and adjusted annually in anticipation of manufacturers' demand. Farmers could sell without penalty all tobacco grown on their allotted acreage.

Madison County farms are small and have correspondingly small allotments (Table 1). From 1924 to 1978, average tobacco acreage fluctuated between one and two acres with no discernible trend toward larger units of production. Farmers began to enlarge their operations after off-farm leasing of tobacco quota was introduced in 1971. Average tobacco acreage grew to 2.9 acres by 1992, and the proportion of farms growing tobacco dropped to 80%. Limited acreage created enormous incentive to increase yield by use of closer plant spacing, newly developed hybrid varieties, and increased fertilizer application (Mann, 1975, p. 58). The connection between program limits on acreage and monotonically increasing yield is readily apparent from the drop in yields after the 1971 introduction of marketing quotas as a production control mechanism. This system limited the number of pounds of tobacco that each farmer could sell and halted the drive for ever-increasing yields that often hurt tobacco quality (Mann, 1975, p. 58).

POST-AGRARIAN RURAL SOCIETY. In the past 50 years, Madison County has been transformed into a post-agrarian rural society, marked by decline in the importance of agriculture and the spread of new forms of rural land use. As children of farm families grew up and took on "public work"—jobs in the city or in rural light manufacturing—households needed less farmland, and the excess was sold to newcomers willing to pay high prices. Between 1967 and 1977, 25% of county land was purchased by people from out of state (Plaut, 1978, p. 359). Many in-migrants were year-round residents who came to work in Asheville's booming economy. Widening and straightening of U.S. 25-70 and U.S. 23 have significantly shortened the commute, and the bedroom communities of northern Buncombe County have crept into Madison County. Other in-migrants following the back-to-the-land movement bought more remote farmsteads and practiced various

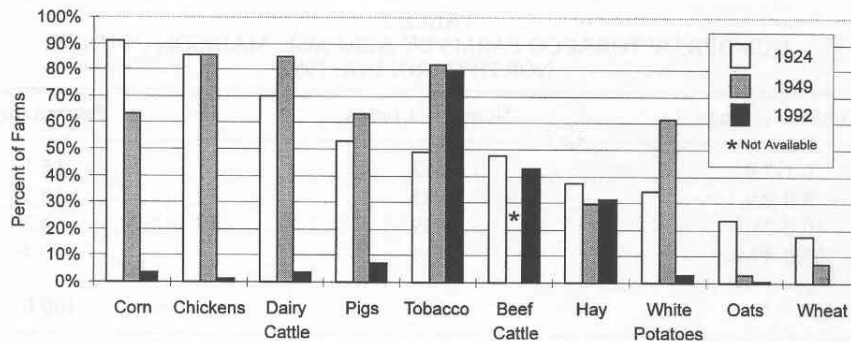


Fig. 5. Prevalence of production systems, Madison County—1924, 1949, and 1992.
Source: Derived from the U.S. Census of Agriculture.

forms of ecologically conscious farming or formed “intentional communities.” A handful started successful farms producing organic vegetables, hydroponic lettuce, herbs, or wool, but all have struggled to establish markets for their specialty crops. Other would-be farmers encountered the same problems as natives in making a living from the land and ultimately moved away or took jobs in Asheville, one of the county townships, or in construction. More affluent in-migrants, known locally as “Florida people,” are typically seasonal residents or retirees drawn by the scenic beauty, cool summer climate, recreational opportunities, or the cachet of a vacation- or second-home in the mountains.

Much of the county’s farmland has been replaced by a low-density sprawl of houses and trailer homes. At the close of World War II, the county was three-quarters farmland, and most of the remainder was former timber company land purchased in the 1920s and 1930s for the Pisgah National Forest. By 1992, the proportion of farmland had fallen to less than one-third, and the decline shows no sign of abating. Ironically, in-migration increased land values and taxes, contributing to the decline of the agrarian landscape that many had originally sought.

Declining Diversity. Coupled with the countywide decline in farmland has been a dramatic decrease in the diversity of farm production systems (Fig. 5). The decline stems both from waning production for household consumption and the disappearance of specialized market production systems. At the close of World War I, family farms produced a variety of grains, hay, vegetables, and livestock. Most farms had a flock of chickens running around the garden to pick insects off vegetables and to supply the Sunday dinner, a milk cow to fill the family’s dairy needs, and a few hogs. Eighty percent of farms grew corn to feed livestock and people, and 10% to 20% still grew small grains. As cash income increased and public work left less time for farm work, households shifted away from diversified livestock

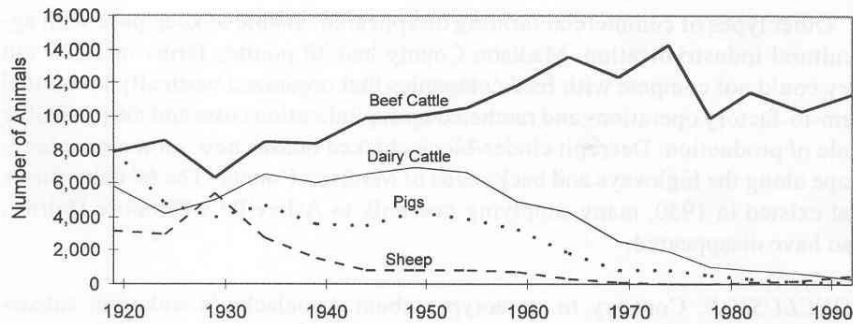


Fig. 6. Livestock: Cattle, pigs, and sheep, Madison County, 1919-1992. *Source:* U.S. Census of Agriculture.

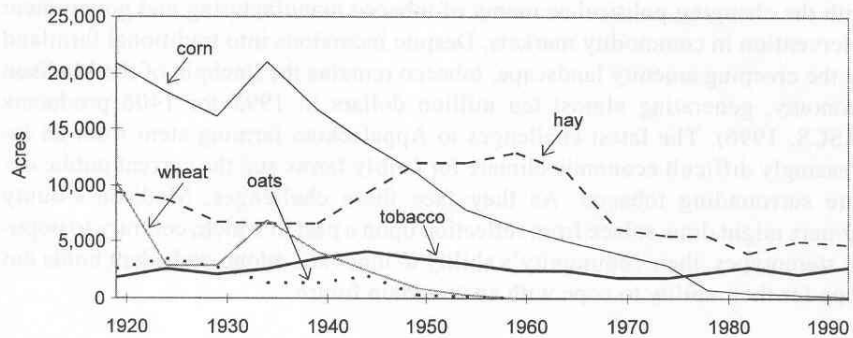


Fig. 7. Field crop acreage, Madison County, 1919-1992. *Source:* U.S. Census of Agriculture.

and grain production and concentrated increasingly on tobacco and beef cattle (Figs. 6 and 7).

In contrast to steep declines in other field crops, tobacco acreage remained relatively constant. Tobacco is labor-intensive, but occupies small plots, generally on flat bottomland close to the house where it is easily accessible for the multiple operations that must be performed throughout the growing season. Beef cattle production complements tobacco in its use of land and labor. Cattle may forage on steep hillside or woodland pastures most of the year. During the winter, they are brought closer to the house so they can graze on the tobacco plot's cover crop. Herds are small, averaging 22 animals in 1992 (U.S. Census Bureau, 1992b), and most herd owners produce calves destined for Midwestern feed lots.

Other types of commercial farming disappeared, unable to keep pace with agricultural industrialization. Madison County had 30 poultry farms in 1954, but they could not compete with feed companies that organized vertically integrated farm-to-factory operations and ratcheted up capitalization costs and the profitable scale of production. Decrepit cinder-block chicken houses now form a relic landscape along the highways and back roads of Madison County. The 60 dairy farms that existed in 1950, many supplying raw milk to Asheville's Biltmore Dairies, also have disappeared.

CONCLUSION. Contrary to stereotypes about Appalachia's isolation, subsistence orientation, and imperviousness to change, Madison County farmers actively pursued commodity production, starting with corn in the early 19th century and switching to tobacco as technological and biological innovations diffused into the region and transportation infrastructure and markets developed. Farmers altered their level of commitment to the market as leaf prices waxed and waned with the changing political economy of tobacco manufacturing and government intervention in commodity markets. Despite incursions into traditional farmland by the creeping amenity landscape, tobacco remains the linchpin of the Madison economy, generating almost ten million dollars in 1993 for 1406 producers (ASCS, 1996). The latest challenges to Appalachian farming stem from an increasingly difficult economic climate for family farms and the current public debate surrounding tobacco. As they face these challenges, Madison County farmers might draw solace from reflection upon a past in which, contrary to popular stereotypes, their community's ability to innovate, adopt, and adapt holds out hope for their ability to cope with an uncertain future.

NOTE

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