

Wayne County Summary

Wayne County Agricultural Land Use/Land Cover Study

A study examining the change of agricultural land use and land cover
in Wayne County from 1959 to 2002

This is report C-1, Wayne County; in a series of reports examining land use and land cover change in Wayne County's 28 municipalities, particularly agricultural land between 1959 and 2002. For a detail of the study procedures, see the Project Narrative.

Overview



Agriculture has long been an important part of Wayne County's social and economic base. Over the study

period agriculture as an occupation, and subsequently a scene on the landscape, has declined in Wayne County.

The charts below provide a visual comparison of the land use and land cover of Wayne County in 1959 and 2002. These pie charts are based on the information contained in Table 1 to the left. Categories that contained small percentages that would not have shown clearly in the charts have been grouped together in one category of "other". For presentation purposes in the charts, the farmstead and residential categories were combined.

Table 1 - Wayne County Land Use/Land Cover

Land Use/Land Cover	Wayne County 1959 Acres	% of Total	Wayne County 2002 Acres	% of Total
Residential	6,200.08	1.3%	25,455.98	5.3%
Commercial	1,977.02	0.4%	3,799.04	0.8%
Industrial	106.41	0.0%	211.92	0.0%
Transportation	623.08	0.1%	518.73	0.1%
Utilities	20.77	0.0%	122.36	0.0%
Religious	322.21	0.1%	386.27	0.1%
Gov/Inst	350.19	0.1%	1,017.34	0.2%
Recreational	417.80	0.1%	990.43	0.2%
Cropland	88,170.61	18.4%	61,914.25	12.9%
Farmstead	4,229.55	0.9%	2,183.18	0.5%
Pasture/Brush	97,899.50	20.4%	53,831.63	11.2%
Forest	266,994.36	55.6%	313,305.79	65.2%
Water	12,647.66	2.6%	16,030.86	3.3%
Mining/Extraction	342.90	0.1%	534.37	0.1%
Total	480,302.14	100.0%	480,302.14	100.0%

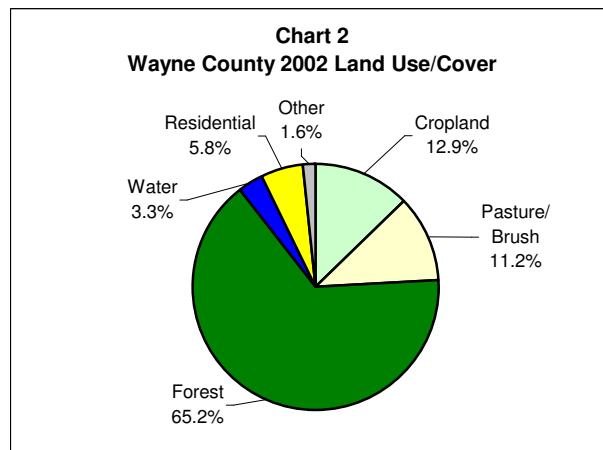
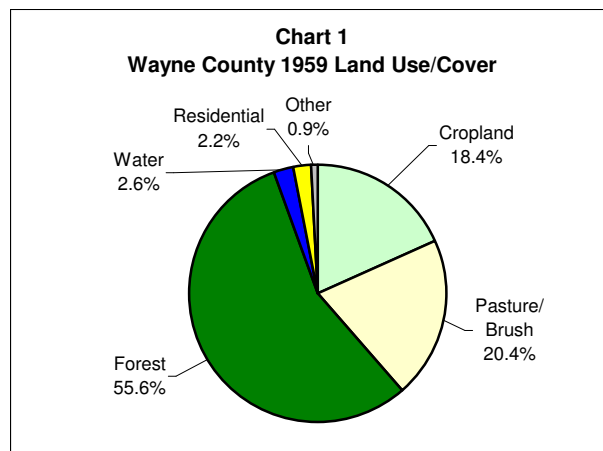


Table 1 {above} compares the land use and land cover of Wayne County in 1959 and 2002. In general, Table 1 and Charts 1 and 2 {right} show that almost 10% more of Wayne County was forested in 2002 than was forested in 1959. Forestland increased from 55.6% of the County to 65.2%. Residential land uses (not including farmsteads) covered 4% more of the County in that same period, increasing from 1.3% of the County to 5.3%. Water, in 2002, covered 3.3% (16,030.86 acres) of the County, while in 1959 it covered 2.6% (12,647.66 acres). In the sections to follow, the current usage of the 1959 cropland will be examined along with prime and non-prime agricultural soil.

It is interesting to notice that as forestland covered almost 10% more of the County, pasture/brush covered about 9% less. Cropland dropped in the percentage of area covered from 18.4% to 12.9%. Residential land increased from 2.2% of the County to 5.8%. Charts 3 and 4 and Table 5 examine more closely the changes as they relate to cropland on prime and non-prime agricultural soil.

Cropland

Cropland covered 88,170 acres or 18.4% of the County's land area in 1959. By 2002, cropland covered just a little less than 13% of the County. Table 2 {below} shows how the 88,170 acres of 1959 cropland was used in 2002.

Table 2 - 1959 Cropland Use in 2002

Wayne County Land Use/Land Cover	1959 Cropland Classification in 2002	
	Acres	Percent
Residential	6,352.68	7.2%
Commercial	733.69	0.8%
Industrial	66.51	0.1%
Transportation	108.48	0.1%
Utilities	40.00	0.0%
Religious	32.50	0.0%
Government/Institution	307.60	0.3%
Recreational	63.62	0.1%
Cropland	53,990.78	61.2%
Farmstead	561.23	0.6%
Pasture/Brush	15,882.44	18.0%
Forest	9,592.54	10.9%
Water	399.25	0.5%
Mining/Extraction	38.84	0.0%
Total	88,170.16	100.0%

Over 61% of Wayne County's 1959 cropland remained in cropland by 2002. Ten municipalities had a greater retention of cropland than the County's average. Those municipalities are listed below in Table 3.

Table 3 - Municipalities with higher percent of cropland retention than Wayne County Average of 61.2%

Municipality	% of Cropland Retention	Municipality	% of Cropland Retention
Starrucca	73.1%	Cherry Ridge	66.2%
Lebanon	70.5%	Mount Pleasant	64.6%
Damascus	69.7%	Preston	63.9%
Oregon	68.3%	South Canaan	62.7%
Clinton	66.6%	Salem	62.0%

Through this period, 18% of Wayne County's cropland became idle and used as pasture or grew into brush while another 10.9% was reforested. Almost 29% of 1959's cropland was converted to these two land uses or cover. Over 7% of the cropland in this time period was changed to residential usage.

Prime Agricultural Soil

Wayne County contains 10 different soil types defined by the United States Department of Agriculture (USDA) as prime agricultural soil. In 1959 Wayne County had 24,779 acres (28.1%) of its cropland located on prime agricultural soil. The remaining 63,392 acres (71.9%) were on farmland of statewide importance or non-prime soil.

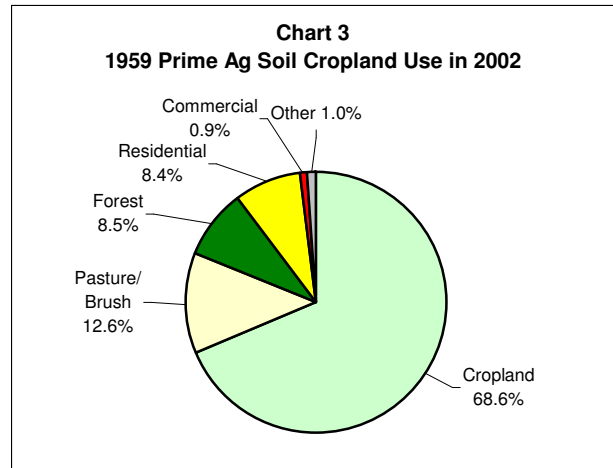


Chart 3 {above} and Table 5 {next page} show how the 24,779 acres of cropland on prime agricultural soil was used in 2002. Over 68% was still used for crop production. Pasture/brush (at 12.6%) and forest (at 8.5%) consumed 21.1% of 1959's cropland that was on prime agricultural soil. Residential usage (including farmsteads) consumed 8.4% and commercial usage another 0.9%. In 1959, 5.16% of Wayne County's land area was comprised of cropland located on prime agricultural soil. Table 4 {below} lists those municipalities that exceeded the County's percentage. Notice that the make-up of Table 4 is very similar to Table 3 {left}.

Table 4 - Municipalities with higher percent of their total area containing cropland on prime agricultural soil in 1959 than Wayne County average of 5.16%

Municipality	% of Muni with Cropland on Prime Ag Soil	Municipality	% of Muni with Cropland on Prime Ag Soil
Oregon	9.3%	Salem	6.9%
South Canaan	8.6%	Starrucca	6.7%
Cherry Ridge	8.3%	Damascus	6.0%
Mount Pleasant	7.2%	Lebanon	5.4%
Preston	7.2%	Clinton	5.3%
Dyberry	7.2%		

Pasture/Brush

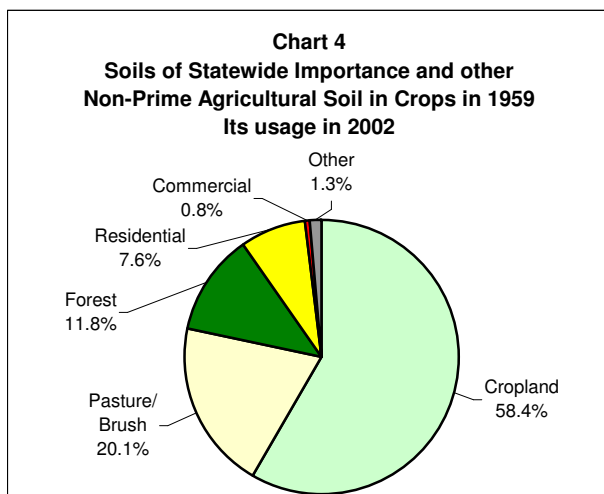
Table 5 - 1959 Prime & Non-prime Soil in Cropland

Wayne County Land Use/Land Cover	Prime Ag Soil 59 Crops Classification in 2002		Soil of Statewide Importance and other Non-Prime Ag 59 Crops Classification in 2002	
	Acres	Percent	Acres	Percent
Residential	1,898.53	7.7%	4,448.95	7.0%
Commercial	227.33	0.9%	502.95	0.8%
Industrial	18.51	0.1%	41.91	0.1%
Transportation	56.25	0.2%	57.79	0.1%
Utilities	15.65	0.1%	24.34	0.0%
Religious	14.47	0.1%	18.05	0.0%
Government/Inst	75.63	0.3%	231.97	0.4%
Recreational	30.43	0.1%	33.18	0.1%
Cropland	17,003.88	68.6%	36,998.26	58.4%
Farmstead	169.56	0.7%	397.32	0.6%
Pasture/Brush	3,125.94	12.6%	12,745.16	20.1%
Forest	2,100.99	8.5%	7,495.05	11.8%
Water	33.26	0.1%	366.37	0.6%
Mining/Extraction	8.61	0.0%	30.23	0.0%
Total	24,779.04	100.0%	63,391.53	100.0%

A higher percentage of the cropland on prime agricultural soil (68.6%) was retained than cropland on non-prime agricultural soil (58.4%).

Soil of Statewide Importance and other Non-Prime Agricultural Soil

As mentioned earlier, the other 63,392 acres of cropland were located on soil not considered prime farmland soil. Chart 4 {below} and Table 5 {above} show that over 58% of the cropland on these soils from 1959 was still in cropland in 2002. Over 20% was in pasture or brush and almost 12% was reforested. Over 7% was converted to residential usage and less than 1% was commercial.



Over 58% of the cropland on the soils of statewide importance and other non-prime Ag soil remained as cropland in 2002.

In 1959, Wayne County had approximately 97,900 acres of pasture/brush land. As is indicated in Table 1, this represented 20% of the County's land area. In 2002, this classification covered about 9% less of the County. This reduction left 53,832 acres of the County in this classification, or 11.2%.

Table 6 - 1959 Pasture/Brush Use in 2002

Wayne County Land Use/Land Cover	1959 Pasture/Brush Classification in 2002	
	Acres	Percent
Residential	4,452.63	4.5%
Commercial	489.20	0.5%
Industrial	48.22	0.0%
Transportation	167.42	0.2%
Utilities	17.12	0.0%
Religious	15.72	0.0%
Government/Institution	195.16	0.2%
Recreational	130.86	0.1%
Cropland	6,101.66	6.2%
Farmstead	274.87	0.3%
Pasture/Brush	28,925.20	29.5%
Forest	54,990.77	56.2%
Water	2,003.34	2.0%
Mining/Extraction	88.89	0.1%
*Total	97,901.06	100.0%

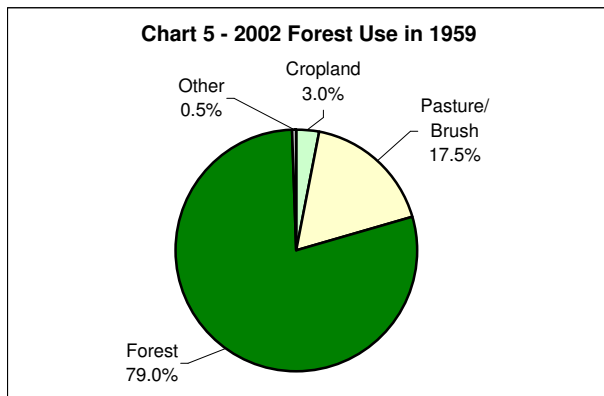
Over 1/2 of the land classified in 1959 as pasture/brush was reforested by 2002. (*Total varies from Table 1 due to rounding)

Table 6 {above} examines how pasture/brush changed between 1959 and 2002. Of the 97,900 acres of pasture/brush in 1959, 29.5% was retained. The three municipalities with the highest percentage of pasture/brush retention were Starrucca (40.5%), Waymart (40.2%) and Damascus (38.4%). Over 56% (54,990 acres) of the pasture/brush converted to forestland. Over 6% (6,102 acres) was changed to cropland and 4.5% (4,452 acres) to residential usage. Over 2,000 acres of pasture/brush converted to water between 1959 and 2002. These generally were small pond sites, which were often located in areas of a farm that had less than ideal soil for crops.

Forest

Forestland, in 2002, covered nearly 10% more of Wayne County than it did in 1959. In 2002, 92.5% of the 1959 forestland remained in that

category while only three percent changed to residential uses. Chart 5 {below} provides a visual depiction of the source of the 2002 forestland in Wayne County.



The main contributor to the increase in forest cover in Wayne County between 1959 and 2002 was from pasture/brush land followed by cropland.

Protected Agricultural Land

Throughout Wayne County 105,735 acres were enrolled in the Agricultural Security Area Program. This program strengthens agricultural operations by protecting farmers from state and local government actions and nuisance complaints that would otherwise interfere with normal agricultural activities and production. This acreage represented 22% of Wayne County.

Wayne County is participating in the Pennsylvania Agricultural Conservation Easement Purchase Program. Those landowners who have chosen to enroll in Wayne County's program have placed 4,419 acres under perpetual easements that will protect some of Wayne County's most important agriculturally productive lands. This has resulted in \$4,706,529 being invested through Wayne County's program to protect farmland from future development.

As mandated by the Pennsylvania Farmland and Forest Land Assessment Act ("Clean & Green" – Act 319) Wayne County's participation in the program resulted in 116,394 acres of land enrolled in Clean and Green as of May 2006. The premise behind the Clean & Green Program is to lower the tax burden to the farmer in order to promote continued usage of agricultural lands in the Commonwealth. It also lowers the tax

burden on forestland owners to encourage them to keep their lands forested. This program provides real estate tax assessment reductions for owners of land who qualify under Act 319. These 116,394 acres represent 26.5% of the total taxable acreage in Wayne County. This is a decrease in taxable real estate value of \$145,554,100 or 3% of the County's market value. This reduction in the enrolled landowners tax bills represents a savings to them as follows: \$118,796 less in local municipal tax payments, \$405,514 less in county tax payments and \$1,703,859 in school tax payments. Added together, Clean & Green reduced the participating property owners tax bills by \$2,228,169. This savings to the participants can also be viewed as annual investments by the other taxpayers of the County.

Summary

The most notable change in land use/land cover over the study period was the amount of cropland that converted to pasture/brush use. Over 15,882 acres or 18% of the 1959 cropland was idled and began the process of reforestation. Another 9,593 acres, or 10.9%, was reforested in the 43-year study period. Over 6,352 acres, or 7.2%, was converted to residential uses. All other categories each were less than 1% of the 1959 cropland. The greatest contributors to forestland were pasture/brush and cropland. Wayne County's farming industry and its farmland appear to be more influenced by the farmer's ability to survive in the world's economy than by competing with growth pressures from residential or commercial developments. The next generation's lack of interest and enthusiasm to continue with farming as a 24/7 occupation is also contributing in the further decline of active farms. This is especially true with dairy farms due to the depressed price of milk being paid to the farmer as the associated production costs, such as feed, fuel and farm equipment continue to rise.

Wayne County Agricultural Land Use/Cover Study

This project was funded in part by the Wayne County Commissioners and by a grant from the Pennsylvania Department of Community and Economic Development. This study examines the change in agricultural land use/cover over 43 years (1959-2002).