

VARIATIONS AMONG INDIANA COUNTIES IN LAND VALUES AND ROADS.

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There was an average increase of \$72.40 per acre or 203 per cent in the value of farm land alone (not including buildings) between the census of 1900 and that of 1920. But this increase was by no means uniformly distributed over the state. Figure 1 shows the percentage of increases. The eight counties in black had greater than a 300 per cent increase, the next darkest counties increased 250 to 300 per cent; most of the counties increased 150 per cent to 250 per cent while the 14 white counties increased less than 150 per cent.

The counties making the greatest increases are among the best farm lands in the state, and those making an increase of 250 to 300 per cent are also mostly in the almost level glacial plain of the north-central part of the state.¹

However, two southern counties, Scott and Spencer, made an increase of 250 to 300 per cent. Extensive draining was carried on in Scott County during these 20 years, raising the average value of the land notably. Spencer County's exceptional increase, as well as the increase of certain other southern counties, reflects very low valuations in 1900, the average value of land in Spencer County being only \$16 per acre in 1900 and \$57 in 1920.

The fourteen counties which had an increase between 1900 and 1920 of less than 150 per cent in the value of farm land alone are all in the southern part of the state, except St. Joseph and Steuben counties in the extreme north. Most of these counties contain much rough land, poor roads, and a large percentage of unprogressive people.

The actual increases in the value of farm land alone between the 1890 and the 1920 censuses likewise reveal a sharp contrast between the better and the poorer parts of the state. Six counties experienced an average increase of over \$120 per acre in that 30-year period and 26 counties increased \$90 to \$120 per acre. On the other hand, 21 counties increased less than \$30 per acre, and 19 from \$30 to \$60. All of those which showed an increase of less than \$30 per acre are in the southern part of the state, most of them in the unglaciated portion, or in the rougher tracts along the Ohio River. In the northern part of the state, also, the roughest land made the least increase.

These facts clearly indicate that the low-priced land has not been the best land investment during this period, for it has increased far less per acre and notably less in per cent than the high priced land of the

¹ Maps showing the average value of farm land per acre in 1920, the variation in taxables per average square mile, and the relative areas of waste land may be found in the author's paper in the 1923 Proceedings of the Indiana Academy of Science and in the Economic Geography of Indiana (Appletons, N. Y., 1923).

more level counties of the north-central part of the state, with their deep soil, excellent transportation and thriving cities. Furthermore, cheap land seldom can be rented as advantageously as good land can, and unfortunately, is taxed more heavily in proportion to value.

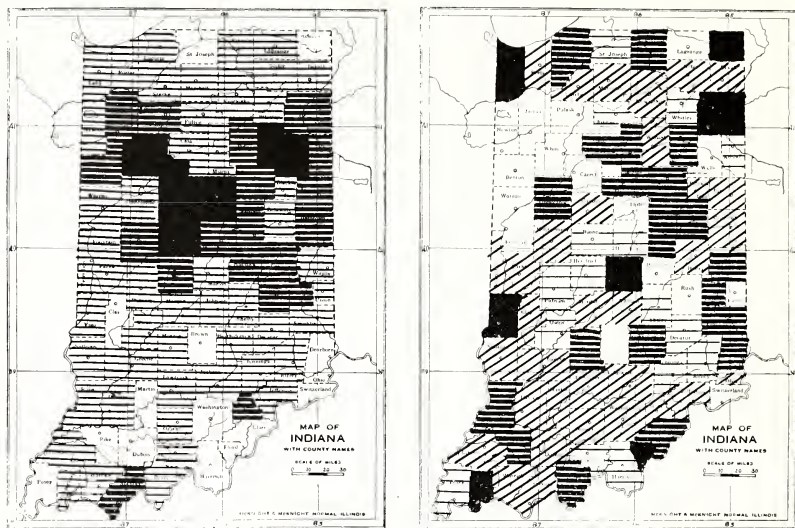


Fig. 1. Percentage of increases in farm land values alone between the 1900 and 1920 censuses. Legend: Black, over 300 per cent; dark, 250 to 300 per cent; light, 150 to 250 per cent; white, less than 150 per cent.

Fig. 2. Ratio between value of "land" and "lots" (both without improvements) by counties, 1921 (calculated from State Auditor's Report in 1922 Year Book). Legend: Black, lots more valuable than land, or about equal; widest lines, land 2 to 7 times value of lots; diagonal lines, land 7 to 15 times lots; lightest lines, land 15-25; white, land 25 or more times the value of lots.

Comparative Value of "Land" and "Lots."—Figure 2 shows the ratio between the value of "land" and "lots", both without improvements, according to calculations made from the State Auditor's Report in the 1922 Official Year Book.

In the seven black counties, the "lots" are more valuable than the "land", or else about equal. These counties contain large cities with the exception of Steuben County, which contains many valuable lots along the shores of its several popular summer resort lakes.

The counties with the next shade reported their land worth two to seven times as much as their lots. These counties contain most of the remaining sizable cities of the state. The 15 white counties, on the other hand, assess their lots at less than one twenty-fifth as much as their land. These counties are almost strictly rural or else have farm land of great value and only small cities. The lightest shaded counties report their land worth from 15 to 25 times as much as their lots. Most of these counties are predominantly rural, but in many of them the farm land has a low average value. This map (figure 2) suggests in a

novel way the relative importance of the farmer and the city dweller in the payment of taxes and also some geographic variations in this ratio.

Roads.—Everyone who has travelled about Indiana knows that there are marked regional differences in the improved roads per unit area. Figure 3 shows some of these differences. It shows the miles of improved road (gravel, stone or paved) per 100 miles of area. It is based on the mileage of state roads given in the 1922 Official Year Book divided into the area of each county. The ten black counties had over 13 miles of such roads per average 100 square miles. The counties of next darkest shade had from 10 to 13 miles, or somewhat more than enough to cross the area, 10 miles of road being required to cross a

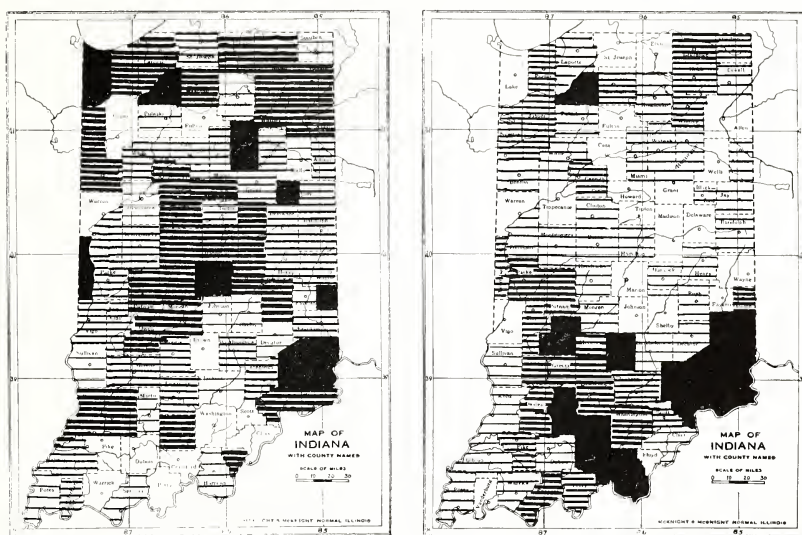


Fig. 3. Variations among the counties in miles of surfaced roads per 100 square miles of area (calculated from Report of State Highway Commission, 1923). Legend: Black, over 13 miles; widest lines, 10-13 miles; next, 8-10 miles; lightest lines, 6-8 miles; white, 3-6 miles.

Fig. 4. Variations among the counties in miles of surfaced roads per \$1,000,000 of taxables according to 1922 assessments (calculated from Official Year Book for 1922). Legend: Black, over 1.5 miles; widest lines, 1.1 to 1.5 miles; next, .8-1.1; light, .5-.8; white, .1-.5.

square 10 miles on a side. These counties have good roads, on the average. Several of them contain large cities or are where the roads leading to Indianapolis, Chicago or Cincinnati converge. Others are in areas where gravel or limestone are readily available.

At the other extreme, the 12 white counties in figure 3 have only from three to six miles of improved state roads per average 100 square miles of area, and the counties shaded lightest have from six to eight. These counties with relatively few miles of surfaced roads are largely in the southern half of the state, all but four of the white counties being

close to the Ohio River. Most of them have much land of relatively little value. Almost none of them increased exceptionally in land values.

Although southern Indiana shows up badly in respect to the mileage of improved roads (fig. 3), figure 4 shows that the counties in which the most money is being spent, in proportion to the taxables in the counties, are almost all in southern Indiana. The 13 black counties in figure 4 have over 1.5 mile of surfaced road per \$1,000,000 of taxables, whereas the 20 white counties have less than one-tenth as much. A comparison of figures 3 and 4 indicates that most of the counties with a relatively large mileage of surfaced roads have been able to build them easily, because of the great taxable wealth in their cities or on their productive farm land, compared with the situation in most of the counties with relatively few miles of surfaced roads. Thus, when, in traveling through a poor county on none too good roads, we should recall that the taxpayers of that county probably have paid a far larger portion of their taxes for roads than is the case in the richer, more level counties with good roads.

The mileage of surfaced roads varies from county to county not only with the wealth and the topography or difficulty of road maintenance, but also conspicuously with the presence of local supplies of road making materials, notably gravel and limestone.

Most of the counties in the northern third of the state possess numerous deposits of gravel and thus, except for the roads having especially heavy traffic, most of the roads are surfaced with gravel. Five counties, White, Carroll, Miami, Wabash and Huntington of northern Indiana, however, have outcrops of Niagara limestone, mostly along the upper Wabash Valley. These counties have from 500 to 800 miles of surfaced roads, which is more than the average for the northern third of the state.

Central Indiana likewise possesses numerous deposits of gravel, especially along the west fork of White River, and also scattered outcrops of limestone. Most of the improved roads are surfaced with gravel, but in Clinton, Grant, Madison and Putnam counties limestone is quarried and used extensively. This is especially true in Putnam County which has a notably large mileage of stone roads.

Southeastern Indiana has some limestone and gravel deposits but is below the state's average in surfaced roads. The southwestern counties are nearly all poor in both gravel and limestone. This poverty in materials helps explain the low mileage of surfaced roads in several counties (less than 100 miles in Pike, Warrick, Spencer and Crawford).