

West Virginia ranks high in the production of coal, petroleum, natural gas, and salt. There are fertile farms in the western lowland valleys.

Wheeling, in the coal and gas region, manufactures iron and steel, and glass.

TOPICS ON THE MIDDLE STATES.

- I. STATES. Characteristic products and industries of each state
- II. CITIES. Characteristics of one or more of the leading cities in each state.

The six states of the Northern Section between the Appalachian Mountains and the Mississippi River lie partly or wholly in the Ohio and St. Lawrence basins. They are sometimes called the East Central States. In the north, east, and south of this group there are extensive forests; but the central part is mostly an open prairie, which is the very heart of the food-producing region of our country.

OHIO. What states and waters border Ohio? What river flows into Lake Erie; into the Ohio? Name and locate the capital. Name two cities in the southwest; two on Lake Erie.

Ohio ranks high in agriculture, manufacturing, and wool-growing. Besides the great food products, there is a large yield of tobacco, fruit, and dairy products. There is an abundance of coal, petroleum, and natural gas; and iron ore is cheaply obtained from Lake Superior. Iron and steel, machinery, flour, lumber, liquors, tobacco, and packed meat are important manufactures.

Cleveland, the largest city, and *Cincinnati* are both

INDIANA. What states and waters border Indiana? What river crosses it? Name and locate the capital. What city is in the southwest; in the west; in the northeast?

Indiana is noted, not only for its agricultural products, but also for meat packing, and the manufacture of flour, lumber, iron, cars, machinery, and liquors.

Indianapolis is a great railroad center. *Evanville* and *Terre Haute* are in the coal region. *Fort Wayne*, near the lumber region, manufactures wagons, cars, and agricultural implements.

ILLINOIS. What states and waters border Illinois? What three rivers traverse the state? Name and locate the capital. What great city is on Lake Michigan? What city is on the Illinois north of the capital? What city is on the Mississippi west of the capital?

Illinois is often called the Prairie State, and is one of the greatest food-producing states in the Union. It ranks third in population and manufactures. It mines much coal.

Chicago, the largest city on the continent, after New York, is the greatest railroad center and meat and grain market in the world. It has immense stock yards, meat-packing establishments, and grain elevators, and many clothing factories. The city is near the coal fields of the state, and iron ore and lumber are brought here by lake to be manufactured. The University of Chicago is one of the largest in the country.

Peoria has great distilleries, stock yards, and meat-packing houses. *East St. Louis*, a railroad center, has meat-packing houses and iron and steel works. *Springfield* is an important coal-mining center.

KENTUCKY. Name the states, waters, and mountain range that border Kentucky. What four rivers flow through the state? Name and locate the capital. What city is west of Frankfort? What city is north of Frankfort?

Kentucky produces about one third of the tobacco grown in this country, besides much corn. Wheat, hay, and hemp are also important products. The principal manufactures are liquors, flour, lumber, tobacco, machinery, and iron and steel. It is noted for its "blue-grass" pastures and its fine live stock. Mammoth Cave, on Green River, is the largest cavern known.

Louisville, at the falls of the Ohio, is a great market and manufacturing center for tobacco.

It also manufactures distilled liquors, machinery, flour, packed meat, and clothing. *Covington* and *Newport* are on the Ohio River opposite Cincinnati. These cities manufacture tobacco, machinery, iron and steel, and beer. *Lexington* is an important stock-raising center in the blue-grass region.



Stock yards in Chicago.

very active commercial and manufacturing cities. Cleveland manufactures iron and steel, machinery, clothing, packed meat, kerosene, and ships; and Cincinnati, clothing, machinery, liquors, packed meat, shoes, and tobacco. Toledo is an important lake port. Columbus and Dayton manufacture machinery.

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GEOGRAPHY OF KENTUCKY.

HISTORY.

Indians once roamed over the land now known as Kentucky. They did not live here, but this was their hunting ground, to which they came every year for wild game. When white men began to settle it, the Indians were determined not to give it up. The settlers, who came mostly from Pennsylvania, Virginia, and North Carolina, had never before seen such an abundance of game nor a more beautiful country. They therefore determined to make their home here and stay in spite of the Indians.

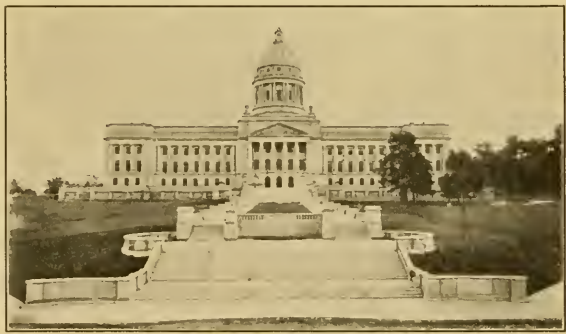
Among the early pioneers was Daniel Boone. He brought his family and a number of his friends across the mountains from North Carolina to a point on the Kentucky River in what is now Madison county, directly north of the present site of Richmond. This settlement was known as Boonesboro. On their arrival, they saw many buffaloes that had come to the lick for salt. The forest was also full of elk, deer, and wild fowl. These supplied them with sufficient food until corn and vegetables could be grown.

Influenced by stories of this wonderful land, others had crossed the Cumberland Mountains or had sailed down the Ohio to find homes along its banks or beside the beautiful streams that flowed into it from the south. Harrodsburg was settled a year before Boonesboro; and settlements at Lexington, Louisville, Frankfort, and Limestone (now Maysville) were soon made. All the larger settlements were made west of the mountains. Here the

land was very fertile, and the rich soil brought forth abundant crops.

The people found that there were many things needed in common. Protection from the Indians, good roads, to connect these widely separated settlements, bridges across the large streams, laws to punish people who did wrong, and officers to attend to these and other affairs of common interest that would benefit all alike. No one settlement could afford to have all these things; so, as the older states had done, a state government was organized and a constitution adopted.

Until this time this territory was a part of Virginia, but in 1792, by authority of the Congress of the United States, it became the state of Kentucky. Although it had been but 18 years since the first settlement was made, at Harrodsburg, there were more than 75,000 inhabitants when Kentucky became a state of the Union. Even then



The New State Capitol, Frankfort.

there was not a railroad in America, and travel was exceedingly slow and tedious, for there were no good wagon roads, nor even steamboats on the rivers. In 1910 there were 2,290,000 people living in Kentucky.

Government. When Kentucky became a state, men were elected to make the laws for the whole state. The men chosen for this purpose were called senators and representatives; both together made up the general assembly. The constitution, or supreme law of the state, also provided for courts and judges to interpret or explain the laws, and for a Governor and other officers to enforce or carry the

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The State University of Kentucky, Lexington.

laws into effect. As the state grew, it was found that the first constitution and early laws did not altogether suit; so, from time to time, other constitutions somewhat different were adopted by the people of the state. The present constitution was adopted in 1891.

There are many matters which do not concern the state as a whole. For this reason, it is divided into counties, each having officers to look after its own affairs. The chief county officer is the county judge. Some of the other officers are the sheriff, county attorney, assessor, clerk, jailer, coroner, and the superintendent of schools. Now there are 120 counties in all.

In many of the counties are cities which also have their own government. There are a number of officers in each city who are connected with its government. The mayor is the chief of these city officials.

Education. At first, strange to say, no provision was made in Kentucky for public education, but now a vast sum of money is spent for both white and colored schools. The public school system of Kentucky now includes the common schools, county and city high schools, two normal schools for

whites and one for blacks, and a state university. Any child may now go from the lowest to the highest schools with free tuition. When a pupil completes the common school course, he may attend the county high school, and after that the State University, at Lexington, which is the head of the public school system of the state. Here he may acquire a college education in almost any branches of study he may wish to pursue. Those who desire to become teachers are allowed free instruction in either of the State Normal Schools, one of which is located at Bowling Green, the other at Richmond. Colored

students are given free tuition in the Normal and Industrial Institute at Frankfort. There are also many excellent private schools and colleges in the state, the oldest of which is Transylvania University at Lexington.



Western State Normal School,
Bowling Green.



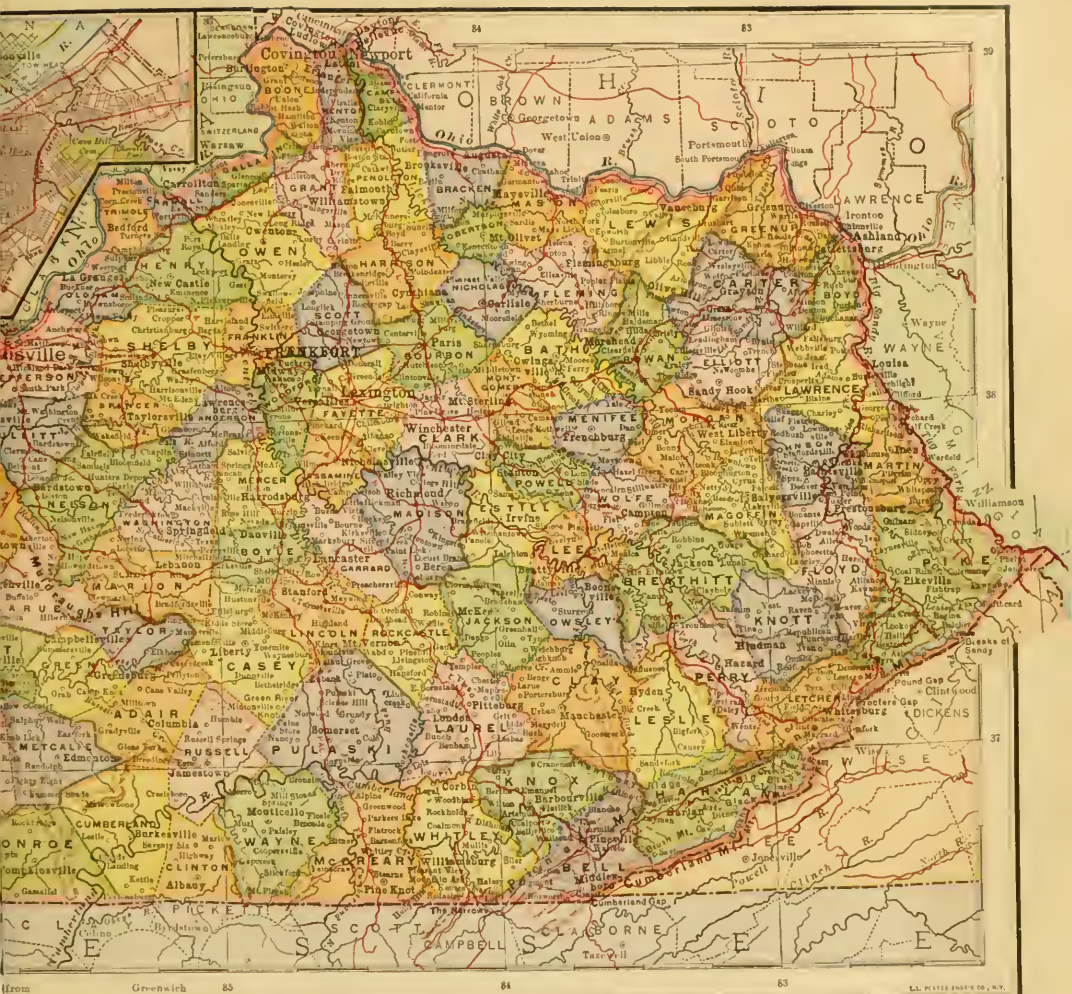
Eastern State Normal School, Richmond



QUESTIONS ON THE MAP.

What two great rivers form part of the natural boundaries of Kentucky? What smaller river and what two mountains also form natural boundaries of the state? What two important rivers cross the western part of the state? Name several other rivers which flow into the Ohio River. Mention several counties in the central part of the Mountain region (*see the map of natural regions*). Locate

Cumberland Mountain and Cumberland Gap. Name several counties crossed by the Knobs. Mention several counties of the Blue Grass region. What two important rivers flow through this region? What hill forms its southern and western boundary? Name several cities of the Blue Grass region. Where is the region known as the Western Coal Fields? What river divides it into two nearly equal parts? What two important cities are in this region on the Ohio?



In what part of the state is the Jackson Purchase? What river forms its eastern boundary? What city of this region is on the Ohio River at the mouth of the Tennessee? In what part of Kentucky do you live? In what county? In what natural region or regions is it situated? Describe the boundaries of this county. Locate Boonesboro. Who made a settlement here? Locate Harrodsburg, Maysville, Louisville, Frankfort, and Lexington. Which of

these is the largest city of the state? Which is the capital? With the scale of miles find out how far these neighboring settlements were apart. Is it likely they were well acquainted with one another? What two cities are on the Ohio at the mouth of the Licking River? Locate Bowling Green, Hopkinsville, Ashland, Bellevue, Dayton, Winchester, Richmond, and Paris. In what county is the Mammoth Cave?

SURFACE AND DRAINAGE.

Turn to the map. Find Hickman. It is in the southwestern corner of the state. It is 500 feet above sea level. Locate the Cumberland Mountain range. Its crest is 2000 feet above sea level. Some of these mountains are even higher than that, but to the north and west they gradually get lower and lower until they are but hills. The crest of Cumberland Mountain is how many times as high as Hickman above sea level? The larger part of Kentucky is a great plain furrowed by rivers. Its northern boundary is the Ohio River, which separates it from Ohio, Indiana, and Illinois.

that of the state of Tennessee, Virginia, or Ohio, and a little greater than that of Indiana.

In the mountains the rivers are rapid, with many falls; but where they flow through the long, gradual slope they can be easily traversed by boats. Much

of Kentucky has easy water communication with the Ohio River. Begin at the northeastern corner of the state and name in order seven rivers which flow into the Ohio. Which of these rivers drain the most land? What river drains all of Kentucky? Through what stream do the waters from Kentucky reach the ocean? Trace the waters in the stream near your home to the Mississippi River.

A Coal Mine,
Mountain Region.



Cumberland Falls.

Its western boundary is the Mississippi River, which separates it from Missouri. Its eastern boundary is Cumberland Mountain, Pine Mountain, and Big Sandy River in the Appalachian Highland. These separate it from Virginia and West Virginia. The southern boundary, which separates Kentucky from Tennessee, differs from all the others, as it is composed of nearly straight lines marked out by man, and does not follow any one river valley or mountain ridge or other natural feature.

The length of the state is about 350 miles, and its greatest width is about 170 miles. Its area is about 40,000 square miles, being almost as great as

The surface of the state has a general slope from the Appalachian Plateau in the southeast to the Ohio River on the northwest. Thus the principal streams of Kentucky flow northwest



The Ohio River near the Mouth of the Kentucky.

and are tributaries of the Ohio. Among these streams are the Big Sandy, Licking, Kentucky, Rolling Fork, Green, Tradewater, Cumberland, and Tennessee rivers. The Cumberland rises in southeastern Kentucky and the Tennessee still further east in Virginia, and both of these streams

flow through Tennessee in great bends before they cross western Kentucky to join the Ohio.

Although the general slope is to the northwest, the state may be divided into several regions by well-marked differences in the character of the surface. These natural regions are six in number: the *Mountain Region*, the *Knobs*, the *Blue Grass Region*, the

and although some of the valleys contain fertile soil, the region as a whole is not well adapted for farming. It contains, however, rich stores of coal and iron and is covered with valuable forests. The western edge of the upland forms an irregular line of hills called the Knobs.

The Knobs Region extends across the state from Lewis county on the Ohio to Allen county on the Tennessee boundary, and from Lincoln county a prong circles toward the northwest, to the Ohio River near Louisville. This prong of the Knobs is a range of wooded hills known as Muldraughs Hill. The Knobs, though poor soil, is a splendid fruit region. The numerous small valleys are quite productive.

The Blue Grass Region lies west of the Knobs and north of Muldraughs Hill.



Southdown Sheep, Blue Grass Region.

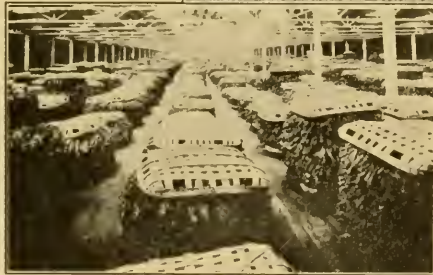
Cavernous Limestone Region, the *Western Coal Field*, and the *Jackson Purchase*.

The Mountain Region. On the map of Kentucky find Greenup county, on the Ohio River. Then find Wayne and Clinton counties on the Tennessee line. Draw a line with your pencil from the northern point of Greenup county to the point on the Tennessee line where Wayne and Clinton counties join. The part of Kentucky east of this line is commonly called the Mountains. This is about one fourth of the state, and consists of an upland 1000 to 2000 feet high, which has been

divided by the deep steep-sided valleys of the streams into a great number of small plateaus and ranges of high hills which render the surface very rough and rugged. In the extreme southeast, near the Virginia boundary, are the high, even-topped ridges of Cumberland Mountain and Pine Mountain. The surface rock of this upland is generally sandstone,



Kentucky Horses.



The Largest Loose-leaf Tobacco Warehouse in the World, Lexington.

It is an undulating limestone country with a deep and fertile soil, well adapted to farming and to the growth of the beautiful velvety blue grass. The Kentucky and Licking rivers flow through this region in deep, steep-sided valleys, but away from these streams the surface is comparatively level or rolling, and forms one of the finest farming and stock-breeding regions of the world.

The Western Coal Field. The region about the lower course of Green River, including the counties from Hancock to Union and as far south as Muhlenberg and Butler, is rough and hilly and much like the Mountain region, but not so elevated. Like that region, too, it contains valuable beds of coal and much excellent timber. But most of the coal



Echo River, Mammoth Cave.

in western Kentucky lies below the beds of the streams, and must be brought to the surface by means of shafts dug down to the seams of coal. In the mountains, the coal seams are in the mountain sides, above the streams, and are mined by "drifting," or tunneling into the sides of the mountains.

Cavernous Limestone Region. Extending from Muldraugh's Hill and The Knobs to the Tennessee River, and surrounding the Western Coal Field on the east, south, and west, is a low limestone plateau whose surface is pitted with numerous sink-holes or depressions through which the surface water finds its way into underground passages. The water, by dissolving the limestone rocks, enlarges many of these passages into great caves or caverns, of which Mammoth Cave in Edmonson county is the most famous. Some of these caves are several

fall very nearly distributed through the year. It is somewhat warmer on the lowlands along the Mississippi River than on Cumberland Mountain in the southeast, and the rainfall is somewhat greater in the southern than in the northern part of the state.

RESOURCES AND INDUSTRIES.

Minerals. Coal is the most valuable mineral of Kentucky. It is mined in many localities in both the Mountain region and the Western Coal Field.



A Kentucky Tobacco Field.



Breaking Hemp, Bourbon County.

Excellent iron ore is mined in both these regions, especially in Bath county. Petroleum is also obtained, particularly in the southern counties from Wayne to Allen; and natural gas in Meade county. Marble, onyx, and stone for making hydraulic cement are quarried in various parts of the mountainous regions.



Louisville Free Public Library.

Agriculture gives employment to a greater number of people in Kentucky than any other industry. Tobacco is grown chiefly in the limestone regions and in the Jackson Purchase, and the annual crop is much greater than in any other state in the Union. Corn and wheat are raised in all sections. Hemp is extensively raised in the Blue Grass region, and this crop is greater in Kentucky than in any other state. Fine fruit is raised in the Ohio River counties of the Blue Grass region and along Muldraugh's Hill and the Knobs. The breeding of fine cattle and fast horses is a leading industry in the Blue Grass counties.

Lumbering is a leading industry in the Mountain Region, where great quantities of yellow poplar lumber are obtained. The logs are cut in the forests near the head waters of the larger streams and are floated down singly or in rafts to the sawmills far below.

Manufacturing. Among the manufacturing industries the making of chewing and smoking tobacco and the distilling of liquors are very important, as are also the milling of flour and cornmeal, saw milling, the making of iron and steel, meat packing, and the manufacture of machinery, cottonseed oil, cars, carriages and wagons, leather, and clothing. Louisville is by far the most important manufacturing center in the state.

Commercial Facilities. Kentucky is traversed by a number of important trunk lines of railway, including the Chesapeake and Ohio; Louisville and Nashville; Illinois Central; Cincinnati, New Orleans, and Texas Pacific; and other important systems, which together have a trackage of more than 3500 miles. These roads afford access to nearly all parts of the state, and, with other connections, give ample communication with all sections of the Union.

Much of the commerce of the state is transported over its navigable waterways, particularly by means of the Ohio and Mississippi rivers; while the Tennessee, Cumberland, Green, Kentucky, Licking, Big Sandy, and other rivers are largely utilized for this purpose.

CITIES AND TOWNS.

Louisville, the metropolis of the state and the county seat of Jefferson county, is located on the Ohio River at the falls, which here furnish excellent water power. A canal has been constructed around the falls, so that

they interfere but little with the navigation of the river. Owing to the commercial and manufacturing facilities afforded by its location, Louisville has grown rapidly in prosperity.

The transportation facilities of Louisville by both rail and water are excellent. The various railroads which enter the city give communication with nearly every part of the state, and bridges across the Ohio connect these roads with various sections of the Union. An extensive traffic is carried on by means of steamboat navigation on the Ohio River and the other navigable rivers of the state.

Louisville is an important market for the sale of leaf tobacco, and much of this product is here manufactured into chewing, smoking, and other forms of tobacco. Distilled and malt liquors, cottonseed oil, and leather are produced in large quantities. Other manufacturing industries include slaughtering and meat packing, flour milling, and the making of wagons, farm implements, machinery, cars, and clothing. The population in 1910 was about 224,000.



Scene in Central Park, Louisville.

Covington is in Kenton county on the Ohio River. The Ohio and various railroads provide a ready means of communication, and bridges across the Ohio River connect Covington with Cincinnati. Its manufactures include tobacco factories, foundries, machine shops, and breweries.

Newport, on the Ohio opposite Cincinnati, in Campbell county, is separated from Covington by

first settled in 1798. It is situated on the Ohio River, and has excellent facilities for trade and manufacture. Its chief manufactures include tobacco, flour, lumber, machinery, wagons, buggies, and cellulose.

Henderson, the county seat of Henderson county, is situated on the Ohio River. The city is one of much wealth, and is an important tobacco market. Its manufactures include tobacco, cotton and woolen goods, distilled liquors, and flour.

Frankfort, the capital of the state, is situated in Franklin county on the Kentucky River, which is here navigable for Ohio River steamers. The city is situated within the limits of the Blue Grass region, and is an important commercial and manufacturing center. The State Reformatory, the institution for educating feeble-minded children, and the state normal and industrial school for blacks are located here.

Hopkinsville is the county seat of Christian county, which is noted for its agricultural resources. These contribute in a large measure to the growth and commercial importance of the city. It has a large trade in flour and tobacco.

Bowling Green, the county seat of Warren county, is located on the Barren River in the center of a very rich agricultural and stock raising section; besides, it possesses a number of manufacturing industries. Here are located Ogden College, the Western Kentucky State Normal School, and other important educational institutions.

the Licking River. Machinery, clothing, and lumber are among its various manufactures.

Lexington, the county seat of Fayette county, is a flourishing city. This city, often called the Belle of the Blue Grass, was founded in 1776, and was the home of Henry Clay. It is noted for its sales of fine horses, which bring buyers from all parts of the country, and also as being the chief hemp market of the United States, and one of the largest tobacco markets in the world. The State University, the Eastern State Hospital for insane persons, Transylvania University, and a number of private colleges are located here.

Paducah, the county seat of McCracken county, is located at the point where the Tennessee River enters the Ohio. The city has extensive shipping interests, and is an important tobacco market, besides maintaining a large number of manufacturing industries.

Owensboro, the county seat of Daviess county, was



Courthouse and Public Square, Lexington.



Transylvania University, Lexington.

Ashland is in Boyd county on the Ohio River. It has large interests in coal and iron mining, and in the manufacture of iron and steel and their various products. The city is also in a rich lumber region and has many lumber mills.

Middlesboro. in Bell county, is in the southeast-iron corner of the state in an important coal and iron mining region, and has extensive iron and steel furnaces and coke ovens.

Winchester, the county seat of Clark county, is a flourishing city in the Blue Grass region. The chief interests of the city are those connected with stock raising, manufacturing, and lumbering. Kentucky Wesleyan College is located here.

Bellevue and Dayton, in Campbell county, and **Ludlow,** in Kenton county, are suburban places among the group of cities on the Ohio opposite Cincinnati.

Maysville, the county seat of Mason county, was settled in 1787, and was formerly called Limestone. It is situated on the Ohio at the Zanesville and Lexington turnpike crossing, which was, in the early history of the state, an important thoroughfare for commercial traffic.

Mayfield, the county seat of Graves county, is in the western part of the state in the Jackson Purchase region. The city has a large and growing trade in the products of a rich agricultural section.

Paris, the county seat of Bourbon county, has an important trade in live stock, tobacco, and distilled liquors.

Danville, the county seat of Boyle county, is in the southern part of the Blue Grass region, and is chiefly noted for its agricultural products and live stock. Here is located the Central University of Kentucky.

Richmond, the county seat of Madison county, is on the eastern border of the Blue Grass region. The Eastern Kentucky State Normal School is

located here. Richmond is noted for extensive shipments of fine horses, mules, and cattle.

Madisonville, the county seat of Hopkins county, is in the Western Coal Field. Besides the adjacent coal mines, it has various manufactories.

Georgetown, the county seat of Scott county, is in the Blue Grass region, and has an important trade in the products of this part of the state. Here are located Georgetown College and several seminaries.

Somerset, in Pulaski county, is a mining city, with railroad shops, excellent schools, a good public library, and numerous banks, wholesale houses, and factories.

Mt. Sterling, the county seat of Montgomery county, is situated on the dividing line between the Blue Grass and the Knobs regions. Lumber and its products are among its chief manufactures.

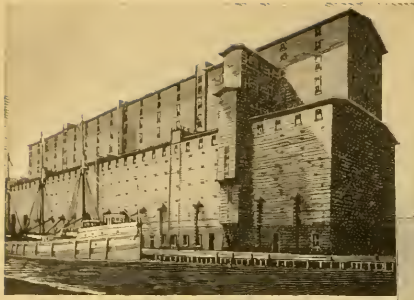
The following places are the county seats of their respective counties, and the chief interests of each are briefly mentioned: **Cynthiana,** Harrison county, agriculture and manufacturing. **Catlettsburg,** Boyd county, stock raising and coal mining. **Lebanon,** Marion county, agriculture, stock raising, and distilling. **Shelbyville,** Shelby county, tobacco, grain, and live stock.

Among other places of importance may be mentioned: **Earlington,** Hopkins county. **Harrodsburg,** Mercer county. **Hickman and Fulton,** Fulton county. **Morganfield,** Union county. **Russellville,** Logan county. **Princeton,** Caldwell county. **Nicholasville,** Jessamine county. **Versailles,** Woodford county. **Franklin,** Simpson county. **Corbin,** Whitely county.

POPULATION OF THE COUNTIES OF KENTUCKY, 1910.

Adair.....	16,503	Clark.....	17,987	Harrison.....	16,873	McCracken.....	35,064	Perry.....	11,255
Allen.....	14,882	Clay.....	17,789	Hart.....	18,173	McCreary.....	12,000	Pike.....	31,679
Anderson.....	10,146	Clinton.....	8,153	Henderson.....	29,352	MeLean.....	13,241	Powell.....	6,268
Ballard.....	12,690	Crittenden.....	13,296	Henry.....	13,716	Madison.....	29,951	Pulaski.....	*30,060
Barren.....	25,293	Cumberland.....	9,816	Hickman.....	11,759	Magoffin.....	13,651	Robertson.....	4,121
Bath.....	13,988	Daviess.....	41,020	Hopkins.....	34,291	Marion.....	16,339	Rockcastle.....	14,473
Bell.....	28,447	Edmonson.....	10,409	Jackson.....	10,734	Marshall.....	15,771	Rowan.....	9,438
Boone.....	9,420	Elliott.....	9,814	Jefferson.....	262,929	Martin.....	7,291	Russell.....	10,861
Bourbon.....	17,492	Estill.....	12,273	Jessamine.....	12,613	Mason.....	18,611	Scott.....	16,956
Boyd.....	23,444	Fayette.....	47,715	Johnson.....	17,482	Meade.....	9,783	Shelby.....	18,041
Boyle.....	14,698	Fleming.....	16,966	Kenton.....	70,355	Menifee.....	6,153	Simpson.....	11,469
Braeken.....	10,398	Floyd.....	18,623	Knott.....	10,791	Mercer.....	11,063	Spencer.....	7,567
Breathitt.....	17,540	Franklin.....	21,135	Knox.....	22,116	Metcalf.....	10,453	Taylor.....	11,961
Breckinridge.....	21,034	Fulton.....	14,111	Larue.....	10,701	Monroe.....	13,663	Todd.....	16,188
Bullitt.....	9,187	Gallatin.....	4,697	Laurel.....	19,872	Montgomery.....	12,868	Trigg.....	14,539
Butler.....	15,895	Garrard.....	11,891	Lawrence.....	20,067	Morgan.....	16,250	Trimble.....	6,512
Caldwell.....	14,063	Grant.....	10,581	Lee.....	9,531	Muhlenberg.....	28,598	Union.....	19,886
Calloway.....	19,897	Graves.....	33,539	Leslie.....	8,976	Nelson.....	16,330	Warren.....	30,579
Campbell.....	39,369	Grayson.....	19,958	Letcher.....	10,623	Nicholas.....	10,901	Washington.....	13,940
Carlisle.....	9,048	Green.....	11,871	Lewis.....	16,887	Ohio.....	27,642	Wayne.....	*15,000
Carroll.....	8,110	Greene.....	18,175	Lincoln.....	17,837	Oldham.....	7,248	Webster.....	20,974
Carter.....	21,693	Hancock.....	8,512	Livingston.....	10,627	Owen.....	11,248	Whitley.....	*28,000
Casey.....	15,179	Hardin.....	22,093	Lodging.....	21,977	Owsley.....	7,979	Wolfe.....	9,864
Christian.....	38,815	Harlan.....	16,569	Lyon.....	9,123	Pendleton.....	11,985	Woodford.....	12,571

* Population estimated.



Grain elevator.

MICHIGAN. What states and waters border Michigan? What lake and strait separate it into two parts? What two rivers traverse the southern peninsula? What range of hills is in the northern peninsula? What and where is the capital? What city is east of it; west of it; north of it?

The southern part is noted for its production of wheat, dairy products, apples, and wool; the central part, for lumber and salt; the northern part, for iron ore, copper, and lumber.

Detroit has unrivaled commercial facilities, and manufactures automobiles, machinery, packed meat, tobacco, and drugs. *Grand Rapids* manufactures furniture; *Saginaw*, beet sugar, lumber, and machinery.

WISCONSIN. What states and waters border Wisconsin? What two rivers traverse it? What lake and bay are in the east? What and where is the capital? What two cities are on Lake Michigan? What city is on Lake Superior?

Oats, barley, and tobacco are important crops in the southern half of the state. In the north are valuable pine forests and rich mines of iron ore.

Milwaukee is a shipping point for grain and lumber, and has extensive breweries, tanneries, foundries, and flour mills. *Superior* ships wheat, lumber, and iron ore, and has large shipyards. *Racine* manufactures automobiles, agricultural implements, and carriages and wagons.

TOPICS ON THE EAST CENTRAL STATES.

- I. STATES. Characteristic products and industries of each state.
- II. CITIES. Characteristics of one or more leading cities in each state.

The seven states of the Northern Section west of the Mississippi River lie wholly or partly in the Missouri basin. In the northeast and southeast are extensive forests, and the Black Hills, in the west, are forest clad. The rest of the group is mostly treeless, except along the streams. In the extreme western part of this group agriculture is of less importance than stock raising, for droughts are not infrequent.



Harvesting wheat.

MINNESOTA. What country, states, and waters border Minnesota? What rivers traverse it? Name three of its lakes. Name and locate the capital. What city is near it? What city is in the northeast?

Minnesota is one of the great wheat-producing states of the Union. Lumbering is a great industry in the northeast and southeast. The iron ore mines in the northeast are the most extensive in the world.

Minneapolis is the world's greatest flour-milling city and a great lumber center. *St. Paul* is a commercial city at the head of navigation on the Mississippi. *Duluth* ships wheat, flour, lumber, and iron ore.

IOWA. What states and waters border Iowa? What rivers cross it? Locate the capital; two cities in the east; one in the northwest.

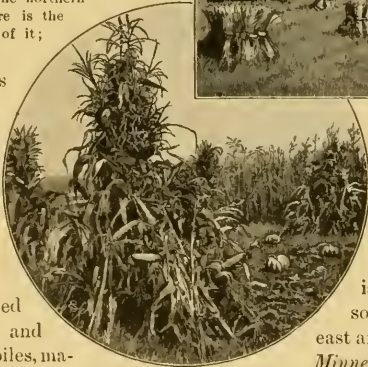
Iowa is a great corn- and hog-producing state, and is noted also for its cattle, dairy products, and coal.

Des Moines is in the mining region, and has a large trade. *Dubuque* and *Davenport* manufacture machinery and food products. *Sioux City* packs much meat.

MISSOURI. What states and waters border Missouri? What rivers cross it? What mountains are in the south? Locate the capital. What city is in the east? What two cities are in the west?

In northern Missouri farming, and in the south fruit and wool growing and lumbering, are leading industries. Much coal, lead, and zinc are mined.

St. Louis, the largest city in the Mississippi basin, has a great trade by rail and river. It manufactures



Corn.

