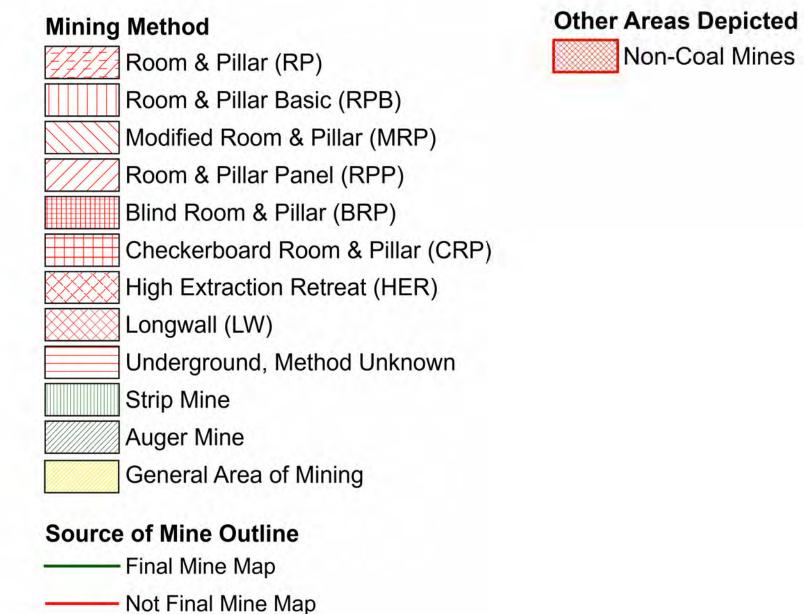


Coal Mines in Illinois Divernon Quadrangle Sangamon, Macoupin & Montgomery Counties, Illinois

This map accompanies the Coal Mines Directory for the Divernon Quadrangle. Consult the directory for a complete explanation of the information shown on this map.



Tipple, Shaft, Slope, Drift Locations

* Strip Mine Tipple - Active

Secondary Source Map

Undated Mine Map

----- Incomplete Mine Map

- Strip Mine Tipple Abandoned
- Mine Shaft Active
- Mine Shaft Abandoned
- Mine Slope Active
- Mine Slope Abandoned
- → Mine Drift Active

 Mi
- Mine Drift AbandonedAir Shaft
- Uncertain Location
- Uncertain Type of Opening

Mine Annotation

(space permitting)
Company
Mine Name
ISGS Index No., Years of Operation

Other Points Depicted

Non-Coal Mines



Disclaime

Please check the Coal Section at the Illinois State Geological Survey's web site at https://www.isgs.illinois.edu for the most up-to-date version of these products.

Note that each quadrangle scale mined-out area map requires the use of the associated text directory for full explanation of map features and mine attributes. Also note that some quadrangles have multiple seams of mining and therefore more than one map may be available for a particular quadrangle. Please take care to check for multiple maps, as extensive mining may exist in the other seams.

The maps and digital files used for these studies were compiled from data obtained from a variety of public and private sources and have varying degrees of completeness and accuracy. This compilation map presents reasonable interpretation of the geology of the area and is based on available data. Locations of some mine features may be offset by 500 feet or more due to errors in the original source maps, the compilation process, digitizing, or a combination of these factors. These data are not intended for use in site-specific screening or decision-making. Use of these documents does not eliminate the need for detailed studies to fully understand the geology of a specific site. The Illinois State Geological Survey, Prairie Research Institute, or the University of Illinois make no guarantee, expressed or implied, regarding the correctness of the interpretations presented in this data set and accept no liability for the consequences of decisions made by others on the basis of the information presented here.

These maps were designed for use at 1:24,000. Enlarging the map may reduce accuracy, as the original scale of the source maps used to compile the outlines shown varies from 1:400 to 1:150,000, and some mine locations are known only from text descriptions. See the accompanying mine directory for the original scale of the source map used for a specific mine to check accuracy of a given portion of the map. Areas with no mines shown may still be undermined; see the unlocated mines list at the back of each mine directory.

The image of the U.S.G.S. topographic base map was projected from the original UTM to Lambert Conformal Conic.

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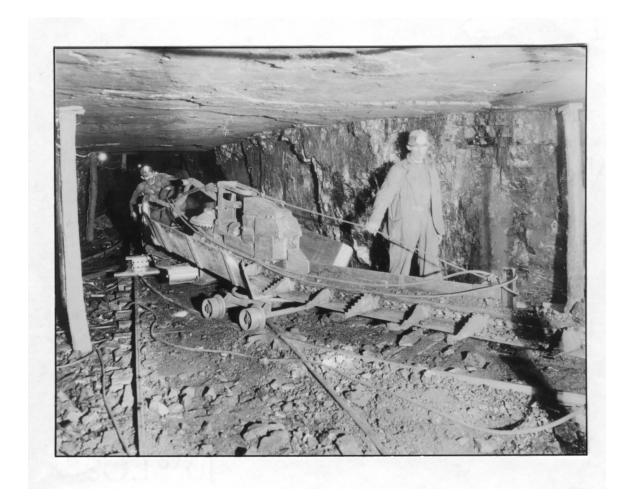
Prairie Research Institute Illinois State Geological Survey 615 E. Peabody Dr. Champaign, IL 61820

Mine Outlines Compiled by Jennifer M. Obrad

October 23, 2008

DIRECTORY OF COAL MINES IN ILLINOIS 7.5-MINUTE QUADRANGLE SERIES DIVERNON QUADRANGLE SANGAMON, MACOUPIN & MONTGOMERY COUNTIES

Jennifer M. Obrad & C. Chenoweth



Institute of Natural Resources Sustainability ILLINOIS STATE GEOLOGICAL SURVEY 2008 Revised 2023

DIRECTORY OF COAL MINES IN ILLINOIS 7.5-MINUTE QUADRANGLE SERIES DIVERNON QUADRANGLE SANGAMON, MACOUPIN & MONTGOMERY COUNTIES

2008 Revised 2023

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Cover photo Track-mounted duckbill loading machine at a Peabody Coal Company mine, ca. 1915.
DISCLAIMER: The accuracy and completeness of mine maps and directories vary with the availability of reliable information. Maps and other information used to compile this mine map and directory were obtained from a variety of sources and the accuracy of some of the original information cannot be verified. Consequently, the Illinois State Geological Survey (ISGS) cannot guarantee the mine maps are free of errors and disclaims any responsibility for damages that may result from actions or decisions based on them.
The ISGS updates the maps and directories periodically, and welcomes any new information or corrections. Please contact the Coal Section of the ISGS at the address shown on the title page of this directory, or telephone (217) 244-4610.
Printed by authority of the State of Illinois/2008

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INTRODUCTION

Coal has been mined in 76 counties of Illinois. More than 7,400 coal mines have operated since commercial mining began in Illinois about 1810; fewer than 30 are currently active. To detail the extent and location of coal mining in Illinois, the Illinois State Geological Survey (ISGS) has compiled maps and directories of known coal mines. The ISGS offers maps at a scale of 1:100,000 and accompanying directories for each county in which coal mining is known to have occurred. Maps at a scale of 1:24,000 and accompanying directories, such as this, are available for selected quadrangles. Contact the ISGS for a list of these quadrangles.

These larger scale maps show the approximate positions of mines in relation to surface features such as roads and water bodies, and indicate the mining method used and the accuracy of the mine boundaries. The maps are useful for locating mine boundaries relative to specific properties and for assessing the potential for subsidence in an area. Mine boundaries compiled from final mine surveys are generally shown within 200 feet of their true position. As a result of poor cartographic quality and inaccuracies in the original mine surveys, boundaries of some older mines may be mislocated on the map by 500 feet or more. Original mine maps should be consulted in situations that require precise delineation of mine boundaries or internal workings of mined areas.

This directory serves as a key to the accompanying mine map and provides basic information on the coal mines in the quadrangle. The directory is composed of two parts. Part I explains the symbols and patterns used on the accompanying map and the summary data presented for each mine. Part II numerically lists the mines in the quadrangle and summarizes the geology and production history of each mine. Total production for the mine, not the portion in the quadrangle, is given.

MINING IN THE DIVERNON QUADRANGLE

All mining in the Divernon Quadrangle took place in the Herrin Coal, which was over 6 feet thick. Faults were rare in most of the mines (or at least caused few problems with mining), but sandstone over the coal did cause some problems with mining. In some cases, the coal was eroded under the sandstone, and in other cases, the sandstone contained water that seeped into the mine. Some mines had difficulties with the roof and left up top coal to support the roof and protect the shale from moisture that caused it to slake more readily.

The earliest mining began in 1881 at the Auburn Mine (mine index 441). All the mines in the Divernon Quadrangle operated for many years, ranging from 15 years for Panther Creek No. 1 Mine (mine index 193), which was idle from 1933 to 1942, up to 67 years for the Virden Mine (mine index 67). Mining ended in this area in August 2007, when Crown II Mine (mine index 933) closed.

PART I EXPLANATION OF MAP AND MINE SUMMARY SHEET

INTERPRETING THE MAP

The map accompanying this directory shows the location of coal mines known to be present in the quadrangle. The map, corresponding to a U.S. Geological Survey (USGS) 7.5-minute quadrangle, covers an area bounded by lines of latitude and longitude 7.5-minutes apart. In Illinois, a quadrangle is approximately 6.5 miles east to west and 8.5 miles north to south, an area of about 56 square miles. The ISGS generally offers one map of mines per quadrangle. In some areas where extensive mining occurred in two or more overlapping seams, separate maps are compiled for mines in each seam to maintain readability of the map.

Mine Type and Mining Method

The mine type is indicated on the map by pattern color: green represents surface mines; red and yellow represent underground mines. The red patterns are used for areas of underground mining that are documented by a primary or secondary source map. A yellow pattern is used for cases where no map of the mine workings is available, but a general area of mining can be inferred from property maps or production figures. The patterns indicate the main mining methods used in underground mines. The methods are (1) room and pillar and (2) high extraction. The method used gives some indication of the amount and pattern of coal extraction within each mined area, and has some influence on the timing and type of subsidence that can occur over a mine.

The following discussion and illustrations of mining methods are based on Guither et al. (1984).

In room-and-pillar mines, coal is removed from haulage-ways (entries) and selected areas called rooms. Pillars of unmined coal are left between the rooms to support the roof. Depending on the size of rooms and pillars, the amount of coal removed from the production areas will range from 40% to 70%.

Room and Pillar - mining is divided into six categories:

- room-and-pillar basic (RPB, fig. 1A), an early method that did not follow a preset mining plan and therefore
 resulted in very irregular designs;
- modified room and pillar (MRP, fig. 1B);
- room-and-pillar panel (RPP, fig. 1C);
- · blind room and pillar (BRP, fig. 1D);
- checkerboard room and pillar (CRP, fig. 1E);
- room and pillar (RP), a classification used when the specific type of room-and-pillar mining is unknown.

Blind and checkerboard are the most common types of room-and-pillar mining used in Illinois today. The knowledge of room-and-pillar mining methods gives a trained engineer information on the nature of subsidence that may occur. A more extensive discussion of subsidence can be found in Bauer et al. (1993).

High-extraction These mining methods are subdivided into high-extraction retreat (HER, Fig 1F) and longwall (LW, Fig 1G, 1H). In these methods, much of the coal is removed within well defined areas of the mine. Subsidence of the surface above these areas occurs within weeks. Once the subsidence activity ceases, the potential for further movement over these areas is low; however, subsidence may continue for several years after mining.

High-extraction retreat mining is a form of room-and-pillar mining that extracts most of the coal. Rooms and pillars are developed in the panels, and the pillars are then systematically removed (fig. 1F).

In early (pre-1960) longwall mines, mining advanced in multiple directions from a central shaft (fig. 1G). Large pillars of coal were left around the shaft, but all coal was removed beyond these pillars. Miners placed rock and wooden props and cribs in the mined-out areas to support the mine roof. The overlying rock gradually settled onto these supports, thus producing subsidence at the surface. In post-1959 longwall mines, room-and-pillar methods have been used to develop the main entries of the mine and panel areas. Modern longwall methods extract 100 percent of the coal in the panel areas (fig. 1H).

SOURCE MAPS

Mine outlines depicted on the map are, whenever possible, based on maps made from original mine surveys. The process of compiling and digitizing the quadrangle map may produce errors of less than 200 feet in the location of mine boundaries. Larger errors of 500 feet or more are possible for mines that have incomplete or inaccurate source maps.

Because of the extreme complexity of some mine maps, detailed features of mined areas have been omitted. The digitized mine boundary includes the exterior boundary of all rooms or entries that were at least 80 feet wide or protruded 500 feet from the main mining area. Unmined areas between mines are shown if they are at least 80 feet wide; unmined blocks of coal within mines are shown if they are at least 400 feet on each side. Original source maps should be consulted when precise information on mine boundaries or interior features is needed.

The mine summary sheet lists the source maps used to determine each mine outline. The completeness of map sources is indicated on the map by a line symbol at the mine boundary. Source maps are organized in five categories.

Final mine map The mine outline was digitized from an original map made from mine surveys conducted within a few months after production ceased. The date of the map and the last reported production are listed on the summary sheet.

Not a final map The mine is currently active or the mine outline was made from a map based on mine surveys conducted more than few months before production ceased. This implies the actual mined-out area is probably larger than the outline on the map. The mine summary sheet indicated the dates of source maps and the last reported production, as well as the approximate tonnage mined between these two dates (if the mine is abandoned). The summary sheet also lists the approximate acreage mined since the date of the map and, in some cases, indicates the area where additional mining may have taken place. This latter information is determined by locating on the map the active faces relative to probable boundaries of the mine property.

Undated map The source map was undated, so it may or may not be based on a final mine survey. When sufficient data are available, the probable acreage of the mined area is estimated from reported production, average seam thickness and a recovery rate comparable to other mines in the area. This information is listed in the summary sheet for the mine.

Incomplete map The source map did not show the entire mine. The summary sheet indicates the missing part of the mine map and the acreage of the unmapped area, which is estimated from the amount of coal known to have been produced from the mine.

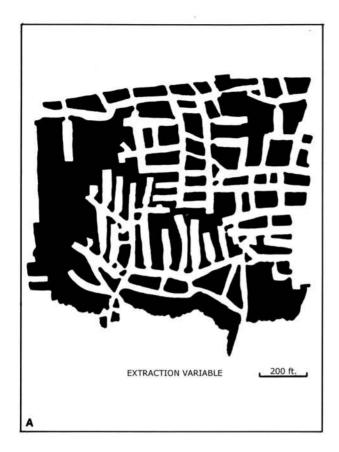
Secondary source map The original mine map was not found so the outline shown was determined from secondary sources (e.g., outlines from small-scale regional maps published in other reports). The summary sheet describes the secondary sources.

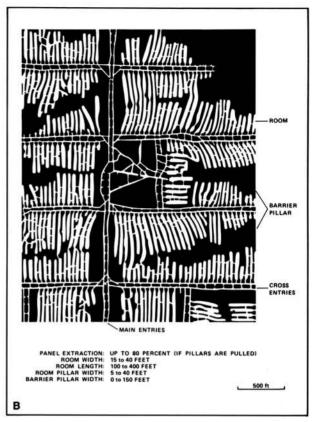
POINTS AND LABELS

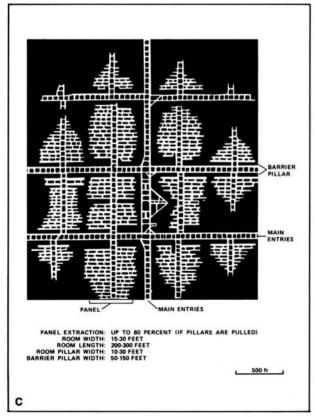
The locations of all known mine openings (shafts, slopes, and drifts) and surface mine tipples are plotted on the map. Tipples are areas where coal was cleaned, stockpiled, and loaded for shipping.

Only openings or tipples are plotted for mines without source maps. If the precise locations of these features are unknown, a special symbol is used to indicate the approximate location of the mine.

Each mine on the map is labeled with the names of the mine and operating company, ISGS mine index number, and years of operation (if known) if space permits. A seam designation is given on maps where more than one seam was mined. For a mine that operated under more than one name, only the most recent name is generally given. When a mine changed names or ownership shortly before closing, an earlier name is listed. All company and mine names are listed on the mine summary sheet in the directory, under the production history segment.







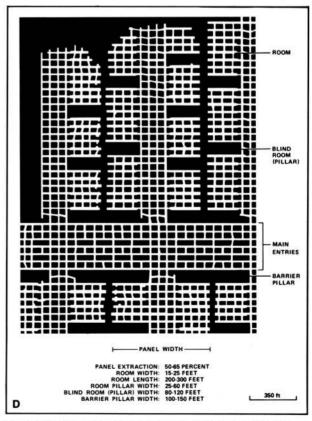
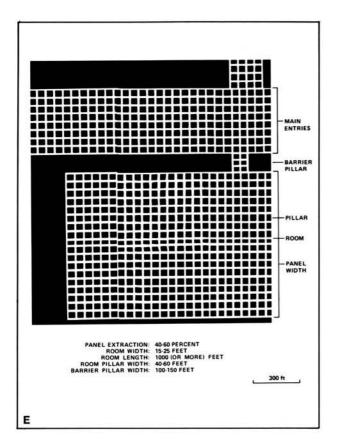
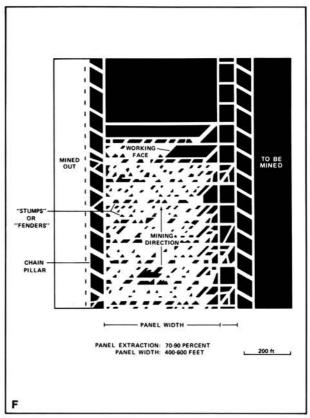
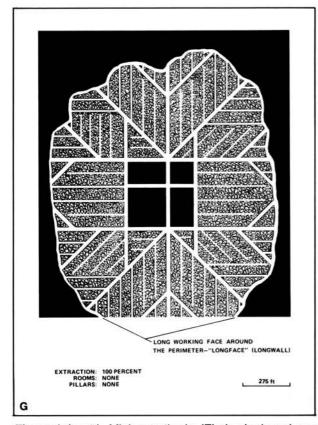


Figure 1 Mining methods: (A) room-and-pillar basic (RPB), (B) modified room and pillar (MRP), (C) room-and-pillar panel (RPP), (D) blind room and pillar (BRP).







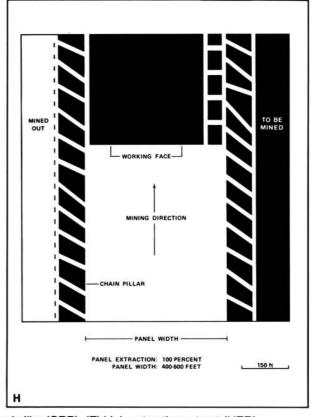


Figure 1 (cont.) Mining methods: (E) checkerboard room and pillar (CRP), (F) high extraction retreat (HER), (G) early (pre-1960) longwall, (H) post-1959 longwall

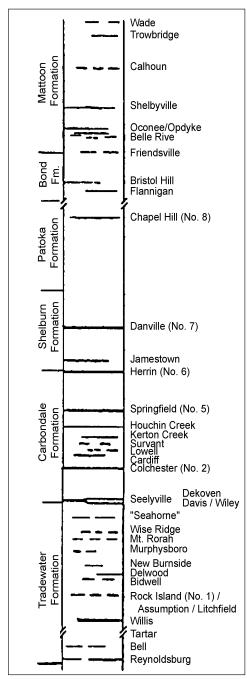


Figure 2 Generalized stratigraphic section, showing approximate vertical relations of coals in Illinois.

INTERPRETING A MINE SUMMARY SHEET

The mine summary sheet is arranged numerically by mine index number. Index numbers are shown on the map and in the mine listing. The mine summary sheet provides the following information (if available).

Company and mine name The last company or owner of the mine is used, unless no production was recorded for the last owner. In that case, the penultimate owner is listed. Mines often have no specific name; in these cases, the company name is also used as the mine name.

Type Underground denotes a subsurface mine in which the coal was reached through a shaft, slope, or a drift entry. Surface denotes a surface, open pit or strip mine.

Total mined-out acreage shown The total acreage of the mined area mapped, including any acreage mined on adjacent quadrangles, is calculated from the digitized outline of the mine. The acreage of large barrier pillars depicted on the map is excluded from the mined-out acreage. Small pillars not digitized are included in the acreage calculation. If the mine outline is not based on a final mine map, the acreage is followed by an estimate of additional acres that may have been mined. The estimate is determined from reported mine production, approximate thickness of the coal, and recovery rates calculated from nearby mines that used similar mining methods.

SHAFT, SLOPE, DRIFT OR TIPPLE LOCATIONS

Shaft, slope, drift, or tipple locations Locations of all known former entry points to underground mines or the location of coal cleaning. tipple, and shipping equipment used by the mine's facility are listed. The location is described in terms of county, township and range (Twp-Rge), section, and location within the section by quarters. NE SW NW, for instance, would describe the location in the northeast quarter of the southwest quarter of the northwest quarter. When sections are irregular in size, the guarters remain the same size and are oriented (or "registered") from the southeast corner of the section. Approximate footage from the section lines (FEL = from east line, FNL = from north line, for example) is given when that information is known; this indicates a surveyed location and is not derived from maps. Entry points are also plotted on the map and coded for the type of entry or tipple. A mine opening may have had many purposes during the life of the mine. Old hoist shafts are often later used for air and escape shafts: this information is included in the directory when known. The tipple for underground mines was generally located near the main shaft or slope. At surface mines, coal was sometimes hauled to a central tipple several miles from the mine pit.

GEOLOGY

Seam(s) mined The name of the coal seam(s) mined is listed, if known. If multiple seams were mined, they are all listed, although the mined-out area for each seam may be shown on separate maps. Figure 2 shows the stratigraphic section of the coal-bearing interval in Illinois, and the vertical relations among the coals.

Depth The depth to the top of the seam in the vicinity of the shaft is listed, if known. The depth is determined from notes made by geologists who visited the mine during its operation or from drill hole data in ISGS files. Depth generally varies little over the extent of a mine; however, reported depths for an individual mine may vary. Depth for surface-mined coals varies, and is usually represented as a range.

Thickness The approximate thickness of the mined seam is shown, if known. Thickness also comes from notes of geologists who visited the mine during its operation or from borehole data in ISGS files. Minimum, maximum, and average thicknesses are given when this information is available.

Mining method The principal mining method used at the mine (figs. 1A-H) is listed. See the mining methods section at the beginning of this directory for a discussion of this parameter.

Geologic problems reported Any known geologic problems, such as faults, water seepage, floor heaving, and unstable roof, encountered in the mine are reported. This information is from notes made by ISGS geologists who visited the mine, or from reports by mine inspectors published by the Illinois Department of Mines and Minerals, or from the source map(s). Geologic problems are not reported for active mines.

PRODUCTION HISTORY

Production history Tons of coal produced from the mine by each mine owner are totaled. When the source map used for the mine outline is not a final mine map, the tonnage produced since the date of the map is identified. For mines that extend into adjacent quadrangles, the tonnage reported includes areas mined in adjacent quadrangles.

SOURCE OF DATA

Source map This section lists information about the map(s) used to compile the mine outline and the locations of tipples and mine openings. In some cases more than one source map was used. For example, a map drawn before the mine closed may provide better information on original areas of the mine than a later map. When more than one map was used, the bibliography section explains what information was taken from each source.

Date The date of the most recent mine survey listed on the source map is reported.

Original scale The original scale of the source map is listed. Many maps are photo-reductions and are no longer at their original scale. The original scale gives some indication of the level of detail of the mine outline and the accuracy of the mine boundary relative to surface features. Generally, the larger the scale, the greater the accuracy and detail of the mine map. Mine outlines taken from source maps at scales smaller than 1:24,000 may be highly generalized and may well be inaccurately located with respect to surface features.

Digitized scale The scale of the digitized map is reported. The scale may be different from that of the original source map. In many cases the digitized map was made from a photo-reduction of the original source map, or the source map was not in a condition suitable for digitizing and the mine boundaries were transferred to another base map.

Map type Source maps are classified into five categories to indicate the probable completeness of the map. See discussion of source maps in the previous section.

Annotated bibliography Sources that provide information about the mine are listed, with the data taken from each source. Some commonly used sources are described below. Full bibliographic references are given for all other sources. Unless otherwise noted, all sources are available for public inspection at the ISGS.

Coal Reports Published since 1881, these reports contain tabular data on mine ownership, production, employment, and accidents. Some volumes include short descriptions made by mine inspectors of physical features and conditions in selected mines.

Directory of Illinois Coal Mines This source is a compilation of basic data about Illinois coal mines, originally gathered by ISGS staff in the early 1950s. Sources used for this directory are undocumented, but they are primarily Illinois Department of Mines and Minerals annual reports, ISGS mine notes, and coal company officials.

ENR Document 85/01, Guither, H. D., J. K. Hines, and R. A. Bauer, 1985 The Economic Effect of Underground Mining Upon Land Used for Illinois Agriculture: Illinois Department of Energy and Natural Resources Document 85/01, 185 p.

Microfilm map The U.S. Bureau of Mines maintains a microfilm archive of mine maps. A microfilm file for Illinois is available for public viewing at the ISGS.

Mine notes ISGS geologists have visited mines or contacted mine officials throughout the state since the early 1900s. Notes made during these visits range from brief descriptions of the mine location to long narratives (including sketches) of mining conditions and geology.

Federal Land Bank of St. Louis, Preliminary Reports on Subsidence Investigations Mining engineers working for the Federal Land Bank of St. Louis mapped areas of subsidence due to coal mining in the early 1930s. These reports often include county maps of mine properties with mined-out areas including shaft locations, as well as subsidence areas.

REFERENCES

Bauer, R. A., B. A. Trent, and P. B. Dumontelle, 1993, Mine Subsidence in Illinois: Facts for the Homeowner Considering Insurance, Illinois State Geological Survey, Environmental Geology Note 144, 16p.

Guither, H. D., J. K. Hines, and R. A. Bauer, 1985, The Economic Effects of Underground Mining Upon Land Used for Illinois Agriculture, Illinois Department of Energy and Natural Resources Document 85/01, 185p.

PART II DIRECTORY OF MINES IN THE DIVERNON QUADRANGLE

MINE SUMMARY SHEETS

A summary sheet on the geology and production history of each mine in the Divernon Quadrangle is provided. These summary sheets are arranged numerically by mine index number. Consult Part I for a complete explanation of the data listed in the summary sheet.

Mine Index 67 Virden Mining Company, Virden Mine

Type: Underground Total mined-out acreage shown: 1,866 Production indicates approximately 6 acres were mined after the map date.

SHAFT, SLOPE, DRIFT or TIPPLE LOCATIONS

Туре	County	Township-Range	Section	Quarters-Footage
Main shaft	Macoupin	12N 6W	9	NE NW NE
Air shaft	Macoupin	12N 6W	4	SE SW SE
"New" air shaft	Macoupin	12N 6W	3	SE SW NE

GEOLOGY

		I hid	ckness (1	ft)	Mining	
Seam(s) Mined	Depth (ft)	Min	Max	Ave	Method	
Herrin	320-330	4.0	8.0	6.0-7.0	RPP	

. .. .

<u>Geologic Problems Reported</u>: Top coal (15 to 18 inches) was left to support the roof because of the clod between the coal and the limestone caprock. The northern part of the mine had a sandstone roof, which resulted in some wet areas. Rolls were present on the western side of the mine, which curtailed development in that direction. Pyrite bands and lenses were present throughout the seam and the mine. The floor heaved in some areas.

PRODUCTION HISTORY

			Production
Company	Mine Name	Years	(tons)
Chicago-Virden Coal Company	Chicago-Virden No. 1	1892-1904	2,796,067
Illinois Collieries Company	Illinois Collieries No. 1	1904-1909 *	1,141,110
Glenridge Coal Company	Glenridge No. 1	1909-1913	664,732
Montour Coal Company	Montour No. 402	1913-1918 **	646,361
Pittsburg Coal Company	Pitsburg No. 402	1918-1920	384,787
Illinois Coal & Coke Corporation	Illinois Coal & Coke No. 3	1920-1923	861,467
Illinois Coal Corporation	Empire No. 3	1923-1932 ***	569,768
Virden Coal Company	Virden	1932-1937	309,008
Lincoln Liquidating Company	Lincoln Liquidating	1937-1939	129,606
Virden Mining Company	Virden	1939-1959	2,879,381
Virden Mining Company	Virden	1959-1959	28,833 †
			10,411,120

^{*} Idle 1909

Last reported production: July 1960

^{**} Idle 1916

^{***} Idle 1926-1931

[†] Production after map date

SOURCES OF DATA

		Original	Digitized	
Source Map	Date	Scale	Scale	Map Type
Microfilm, document 352558	4-1959	1:2400	1:4966	Not final
Microfilm, document 352541	2-28-1938	1:2400	1:4138	Not final
State archive, IL_1131_03	7-1-1923	1:2400	1:2400	Secondary source
Federal Land Bank Report	4-1934	1:126720	1:126720	Secondary source

Annotated Bibliography (data source, brief description of information)

Coal Reports - Production, ownership, years of operation, depth.

Mine notes (Macoupin County) - Mine type, shaft location, seam, depth, thickness, geologic problems.

Microfilm map, document 352558, reel 03139, frames 307-314 - Shaft locations, mine outline, mining method.

Microfilm map, document 352541, reel 03139, frames 272-274 - Partial mine outline (west side).

State archive, IL 1103 03, map of Royal Colliery Mine (mine index 185) - Partial mine outline (southwest part of

Federal Land Bank Report (Macoupin County) - General area of mining.

ISGS map library, 4103.M34 i5.1-1 - Geologic problems.

Madison Coal Corporation, Madison No. 6 Mine

Type: Underground Total mined-out acreage shown: 1,818

SHAFT, SLOPE, DRIFT or TIPPLE LOCATIONS

Туре	County	Township-Range	Section	Quarters-Footage
Main shaft (9x18)	Sangamon	13N 5W	21	SE NE SW
Air shaft (9x18)	Sangamon	13N 5W	21	SE NE SW

GEOLOGY

		Thickness (ft)		Mining		
Seam(s) Mined	Depth (ft)	Min	Max	Avg	Method	
Herrin	312-367	7.0	10.0	7.8-7.9	RPP	

<u>Geologic Problems Reported</u>: The mine had a good roof composed of black shale. Some sandstone cut-outs were present in the mine. The coal contained lenses of pyrite. The fireclay floor heaved badly.

PRODUCTION HISTORY

			Production	
Company	Mine Name	Years	(tons)	
Madison Coal Corporation	Madison No. 6	1899-1925	<u>10,957,132</u>	
			10,957,132	

Last reported production: May 1925

SOURCES OF DATA

		Original	Digitized		
Source Map	Date	Scale	Scale	Map Type	
Company, 4103.S33 i5.1-55	5-4-1925	1:2400	1:2400	Final	

Annotated Bibliography (data source, brief description of information)

Coal Reports - Production, ownership, years of operation.

Directory of Illinois Coal Mines (Sangamon County) - Mine names, mine index, ownership, years of operation. ENR Document 85/01 - Mining method.

Mine notes (Sangamon County) - Mine type, shaft location, seam, depth, thickness, geologic problems.

Company map, ISGS map library, 4103.S33 i5.1-55, sheets 1-4 - Shaft locations, mine outline, mining method.

Mine Index 75 Peabody Coal Company, Peabody No. 54 Mine

Type: Underground Total mined-out acreage shown: 1,120

SHAFT, SLOPE, DRIFT or TIPPLE LOCATIONS

Туре	County	Township-Range	Section	Quarters-Footage
Main shaft (8.5 x14)	Sangamon	13N 6W	15	SE NE SW
Air shaft (8.5 x15.8)	Sangamon	13N 6W	15	SE NE SW

GEOLOGY

		Thickness (ft)			Mining	
Seam(s) Mined	Depth (ft)	Min	Max	Avg	Method	
Herrin	301-308	4.5	11.0	7.0-7.5	RPP	

<u>Geologic Problems Reported</u>: An overlying sandstone bed cut into the coal in some areas of the mine, but the roof over most of the mine was black shale. Top coal was left to support the roof. Small rolls and slips were also present in the coal. Pyrite balls were found in masses in the coal. The fireclay floor heaved in wet areas of the mine.

PRODUCTION HISTORY

			Production
Company	Mine Name	Years	(tons)
Black Diamond Coal Company *	Black Diamond	1904-1915	2,739,895
Springfield District Coal Mining Company	Springfield District No. 4	1915-1918	1,248,341
Springfield District Coal Mining Company	Springfield District No. 54	1918-1924 **	1,896,704
Peabody Coal Company	Peabody No. 54	1924-1926	<u>498,624</u>
			6,383,564

Last reported production: December 1926

SOURCES OF DATA

		Original	Digitized		
Source Map	Date	Scale	Scale	Map Type	
State archive II 359 03	1-1-1931	1.2400	1:2400	Final	

Annotated Bibliography (data source, brief description of information)

Coal Reports - Production, ownership, years of operation.

Directory of Illinois Coal Mines (Sangamon County) - Mine names, mine index, ownership, years of operation. Mine notes (Sangamon County) - Mine type, shaft location, seam, depth, thickness, geologic problems. State archive, IL_359_03 - Shaft locations, mine outline, mining method.

^{*} Owned & operated by Robert Solomon & Sons

^{**} Idle 1922

Panther Creek Mining Company, Panther Creek No. 1 Mine

Type: Underground Total mined-out acreage shown: 1,411

SHAFT, SLOPE, DRIFT or TIPPLE LOCATIONS

Type	County	Township-Range	Section	Quarters-Footage
Main shaft	Sangamon	14N 6W	35	NE NW NE
Air shaft	Sangamon	14N 6W	35	SE NW NE

GEOLOGY

		Thi	ckness (f	t)	Mining	
Seam(s) Mined	Depth (ft)	Min	Max	Ave	Method	
Herrin	258-270	4.0	10.0	7.0	RPP	

Geologic Problems Reported: One fault was noted, with a displacement of 18 inches. The roof was a black fissile shale under a light gray massive shale. These shales ranged up to 6 feet thick, and made a very bad roof. The coal was deposited on an undulating surface. The thickest coal was in the swags. Pyrite bands and lenses existed in the coal, as well as abundant calcite facings. The blue band was present in this mine as a dark gray shale, generally 2 feet above the floor.

PRODUCTION HISTORY

			Production
Company	Mine Name	Years	(tons)
Panther Creek Mining Company	Panther Creek No. 1	1918-1944	7,428,309 * 7,428,309

^{*} Idle 1933-1942

Last reported production: July 1944

SOURCES OF DATA

		Original	Digitized		
Source Map	Date	Scale	Scale	Map Type	
State archive, IL_339_03	4-1-1945	1:2400	1:2400	Final	

Annotated Bibliography (data source, brief description of information)

Coal Reports - Production, ownership, years of operation.

Directory of Illinois Coal Mines (Sangamon County) - Mine names, mine index, ownership, years of operation. Mine notes (Sangamon County) - Mine type, shaft location, seam, depth, thickness, geologic problems. State archive, IL_339_03 - Shaft locations, mine outline, mining method.

Chicago, Wilmington & Franklin Coal Company, Chicago, Wilmington & Franklin No. 1 Mine

Type: Underground Total mined-out acreage shown: 1,835

SHAFT, SLOPE, DRIFT or TIPPLE LOCATIONS

Туре	County	Township-Range	Section	Quarters-Footage
Main shaft (13.3 x 8.5)	Sangamon	13N 6W	34	NW SW NW
Air shaft (10.7 x 10.7)	Sangamon	13N 6W	34	SW NW NW

GEOLOGY

		Thickness (ft)			Mining	
Seam(s) Mined	Depth (ft)	Min	Max	Avg	Method	
Herrin	292-300	_		7.5-7.8	RPP	_

Geologic Problems Reported: Top coal (15 inches) was left to support the roof where the black shale was thick. The top coal was reported to have been drawn when abandoning the room. In other places, where the shale was thinner, only 4 to 8 inches of top coal was left, and this top coal was not always recovered. Numerous horizontal pyrite bands were present in the coal, but few pyrite balls were observed. The blue band was about 30 inches above the floor, and consisted of a hard, pyrite-rich clay. The fireclay floor did not heave.

PRODUCTION HISTORY

Company	Mine Name	Years	Production (tons)
Chicago, Wilmington & Vermilion Coal Co.	C., W. & V. No. 1	1900-1914	5,214,370
Chicago, Wilmington & Franklin Coal Co.	C., W. & F. No. 1	1914-1924	4,668,235
			9 882 605

Last reported production: March 1924

SOURCES OF DATA

		Original	Digitized	
Source Map	Date	Scale	Scale	Мар Туре
State archive, IL_370_07	3-31-1924	1:2400	1:2400	Final

Annotated Bibliography (data source, brief description of information)

Coal Reports - Production, ownership, years of operation.

Directory of Illinois Coal Mines (Sangamon County) - Mine names, mine index, ownership, years of operation, seam. Mine notes (Sangamon County) - Mine type, seam, depth, thickness, geologic problems.

State archive, IL_3700_07 - Shaft locations, mine outline, mining method.

Mine Index 441 Union Fuel Coal Company, Union Fuel No. 3 Mine

Type: Underground Total mined-out acreage shown: 517 Production indicates approximately 28 acres were mined after the map date. Portions of the eastern part of the mine have an added general area of mining on the accompanying map to indicate where mining may have taken place after the map date.

SHAFT, SLOPE, DRIFT or TIPPLE LOCATIONS

Type	County	Township-Range	Section	Quarters-Footage	
Main shaft	Sangamon	13N 6W	10	NW NE NE	
Air shaft	Sangamon	13N 6W	10	NW NE NE	
GEOLOGY					
		Thicknes	s (ft)	Mining	
Seam(s) Mined	Depth (ft)	Min Ma	x Avg	Method	
Herrin	263-285		6.75	MRP	

<u>Geologic Problems Reported</u>: The roof varied in the mine, consisting of sandstone in some areas, with shale in others. The black shale roof ranged from 5 inches to 8 feet, and often had an overlying limestone up to 5 feet thick. Some top coal (10 inches or more) was left to protect the black shale roof, which did not stay up if it was exposed to air. The coal contained shale and pyrite in streaks and bands. The fireclay floor was 3 to 8 feet thick.

PRODUCTION HISTORY

C	Min a Nama	V	Production
Company	Mine Name	Years	(tons)
Dawson, Poley & Company	Auburn	1881-1883 *	15,392
Auburn Coal & Tile Company	Auburn	1883-1887	47,510
Dennis Noonan	Auburn	1887-1888	11,933
Auburn Cooperative Coal Company	Auburn	1888-1890	21,985
Auburn Coal Company	Auburn	1890-1899	192,579
Chicago-Auburn Coal Company	Chicago-Auburn	1899-1900	18,224
Auburn & Alton Coal Company	Auburn & Alton	1900-1919	1,921,456
Union Fuel Company	Union Fuel No. 3	1919-1922	466,877
Union Fuel Company	Union Fuel No. 3	1922-1924	<u>143,759</u> **
			2,839,715

Last reported production: February 1924

SOURCES OF DATA

		Original	Digitized	
Source Map	Date	Scale	Scale	Мар Туре
State archive, IL_390_03	4-1-1922	1:2400	1:2400	Not final
WPA, T13N-R6W	1-25-1924	1:52800	1:52800	Secondary source

Annotated Bibliography (data source, brief description of information)

Coal Reports - Production, ownership, years of operation.

Directory of Illinois Coal Mines (Sangamon County) - Mine names, mine index, ownership, years of operation, seam. Mine notes (Sangamon County) - Mine type, seam, depth, thickness, geologic problems.

ISGS field notes (Sangamon County) - Depth.

State archive, IL 390 03 - Shaft locations, mine outline, mining method.

WPA map, T13N-R6W - General area of mining (northern and eastern parts of the mine).

^{*} Idle 1883

^{**} Production after map date

Freeman United Coal Mining Company, Crown II Mine

Type: Underground Total mined-out acreage shown: 8,244

SHAFT, SLOPE, DRIFT or TIPPLE LOCATIONS

Туре	County	Township-Range	Section	Quarters-Footage
Shaft	Macoupin	12N 6W	23	NW NE NW
Slope	Macoupin	12N 6W	23	SE NE NW
Air shaft	Macoupin	12N 5W	8	NW NE SE

GEOLOGY

		Thick	ness (f	t)	Mining	
Seam(s) Mined	Depth (ft)	Min	Max	Ave	Method	
Herrin	330			6.0-6.67	RPP	

<u>Geologic Problems Reported</u>: This mine had a variety of problems. There were numerous slickensides, clay dikes, faults and channels throughout the mine. These features, along with a shale roof that lacked competency and allowed for water seepage, created roof problems. Roof falls were reported.

PRODUCTION HISTORY

			Production	
Company	Mine Name	Years	(tons)	
Freeman United Coal Mining Company	Crown II	1974-2007	41,644,282 *	
			41,644,282	

Last reported production: August 2007

SOURCES OF DATA

		Original	Digitized		
Source Map	Date	Scale	Scale	Map Type	
Company, Coal Section digital files	9-4-2007	1:12000	1:12000	Final	

Annotated Bibliography (data source, brief description of information)

Coal Reports - Production, ownership, years of operation, depth, thickness.

Directory of Illinois Coal Mines (Macoupin County) - Mine names, mine index, ownership, years of operation.

Mine notes (Macoupin County) - Mine type, shaft location, seam, mining method, geologic problems.

Company map, Coal Section digital files, 6-380 final - Slope and shaft locations, mine outline, mining method.

Illinois Coal & Coke Corporation, Empire No. 2 Mine

Type: Underground Total mined-out acreage shown: 504

SHAFT, SLOPE, DRIFT or TIPPLE LOCATIONS

Туре	County	Township-Range	Section	Quarters-Footage
Main shaft	Sangamon	13N 6W	2	NW NE NW
Air shaft	Sangamon	13N 6W	2	SW NE NW

GEOLOGY

		Thi	ckness (f	ft)	Mining	
Seam(s) Mined	Depth (ft)	Min	Max	Avg	Method	
Herrin	280			8.0	MRP	

Geologic Problems Reported:

PRODUCTION HISTORY

O	Min - Name	V	Production
Company	Mine Name	Years	(tons)
Sugar Creek Coal Mining Company	Sugar Creek	1893-1895	48,868
Chicago-Virden Coal Company	Chicago-Virden No. 2	1895-1904	1,725,146
Illinois Collieries Company	Illinois No. 2	1904-1910 *	586,539
Lefton Coal Company	Lefton	1910-1913	271,901
Montour Coal Company	Montour	1913-1920 **	65,185
Illinois Coal & Coke Company	Empire No. 2	1920-1923	<u>72,772</u>
			2,770,411

^{*} Idle 1909 & 1910

Last reported production: 1923

SOURCES OF DATA

		Original	Digitized	
Source Map	Date	Scale	Scale	Мар Туре
State archive, IL_334_01	4-1914	1:2400	1:2400	Not final
WPA, T13N-R6 \overline{W} & T14N-R6W	2-19-1926	1:52800	1:52800	Secondary source

Annotated Bibliography (data source, brief description of information)

Coal Reports - Production, ownership, years of operation.

Directory of Illinois Coal Mines (Sangamon County) - Mine names, mine index, ownership, years of operation, seam. Mine notes (Sangamon County) - Mine type, shaft location, seam, depth, thickness.

State archive, IL_334_01 - Shaft locations, mine outline, mining method.

WPA map, T13N-R6W & T14N-R6W - Partial outline (southwest part of mine).

^{**} Idle or abandoned 1914-1920

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