Illinois State Geological Survey 615 East Peabody Drive Champaign, Illinois 61820-6964

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Herrin Coal Chlorine **EDGAR** County

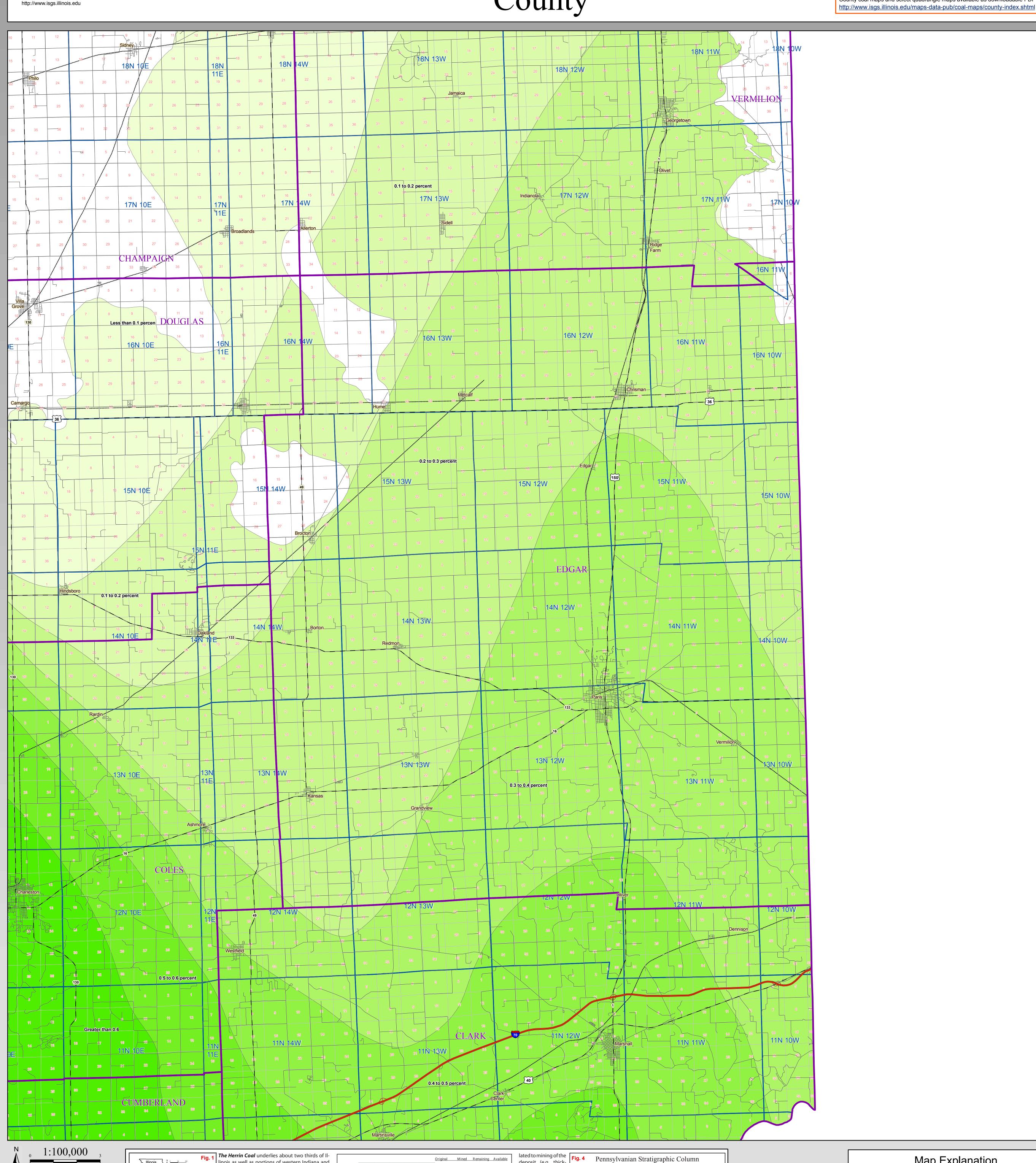
County Coal Map Series Andrew Louchios, Scott Elrick,

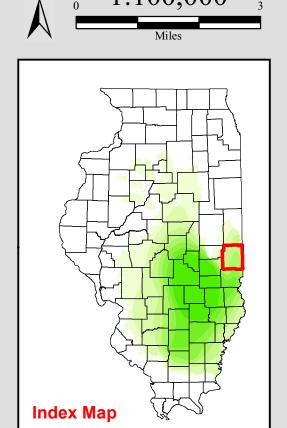
Chris Korose, David Morse

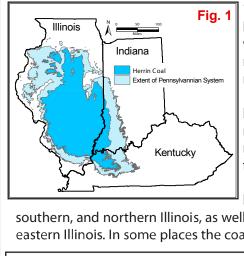
Map construction: October 29, 2009

This product is under review and may not meet the standards of the Illinois State Geological Survey.

County coal maps and select quadrangle maps available as downloadable PDF files at:







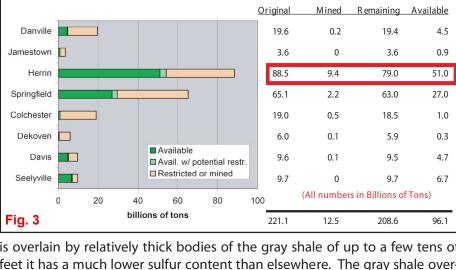
orth-south cross section of the Pennsylvanian System in Illinois

linois as well as portions of western Indiana and western Kentucky. The coal crops out along the margins of the Illinois Basin and reaches a maximum depth in Illinois of about 1,300 feet. (See Fig and Fig 2.) The Herrin Coal is a normal brightbanded coal. Its lower portion contains a prominent claystone parting (the "blue band") that normally is 1-3 inches thick. It averages more than 6 feet thick in extensive areas and locally reaches 15 feet. It is thin in much of central Illinois but has been extensively mined in western, west-central,

contemporaneous with the

coal. In areas where the coal

southern, and northern Illinois, as well as in the southern part of the Danville region of eastern Illinois. In some places the coal is cut out by channels filled with the Anvil Rock Sandstone Member. In parts is of Illinois, silty gray shale as fee much as 100 feet thick over- lie lies the Herrin Coal. Associ- St. ated with this shale is a channel sandstone commonly as Bre much as a mile wide and 60-80 feet thick mapped as Anvil Rock Sandstone and may be



overlain by relatively thick bodies of the gray shale of up to a few tens of eet it has a much lower sulfur content than elsewhere. The gray shale overees the coal principally in parts of Williamson, Franklin, Jefferson, Madison, t. Clair, eastern Macoupin, and S. Vermilion. Generally, however the Herrin oal is overlain by either the Anna Shale Member (black fissile shale) or the rereton Limestone Member. (Hopkins, 1968 - B95, See Fig 4.)	Fig. 3	221.1	12.5	208.6	96.1
	eet it has a much lower sulfur content the es the coal principally in parts of Williar t. Clair, eastern Macoupin, and S. Vermil oal is overlain by either the Anna Shale	an elsewh mson, Fra ion. Gene Member	nere. The inklin, Jef erally, how (black fis	gray sha ferson, M wever the sile shale	le over- adison, Herrin

The original resource of Herrin Coal in the State of Illino	is totals 88.5 billion
tons, of which 9.4 billion have been mined. Approximately	y 58% of the original
Herrin Coal resources, 51 billion tons, are considered available.	able for mining. (See
Fig 3.) Available means that the surface land-use and ged	ologic conditions re-

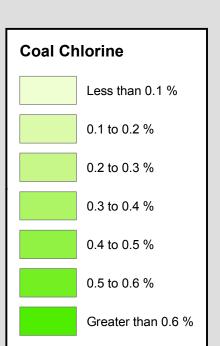
den) are comparable	esi		Bankston Fork Limestone		Bankston Fork Limestone
to other coals cur-	Desmoinesi	Shelbu	Anvil Rock Sandstone	Copperas Creek Sandstone Lawson Shale	Anvil Rock Sandstone
rently being mined	est		Conant Limestone Jamestown Coal		Conant Limestone Jamestown Coal
, ,			Brereton Limestone	Brereton Limestone	Brereton Limestone
in the state. Of these			Anna Shale Energy Shale	Anna Shale	Anna Shale
resources, 21 billion tons occur in coal	eries	******	Herrin Coal	Herrin Coal Spring Lake Coal Bed Big Creek Sandstone Vermillionville Sandstone	Herrin Coal
42 to 66 inches thick	N	XXXXXXXX	Briar Hill Coal		Briar Hill Coal
	lan		Canton Shale	Canton Shale	Canton Shale
and 30 billion tons	smoinesian	B	St. David Limestone Turner Mine Shale	St. David Limestone Turner Mine Shale	St. David Limestone Turner Mine Shale
occur in thicknesses	oir	9	— Dykersburg Shale	Turner wine share	Turner winie Shale
	lus	Carbondal	Springfield Coal	Springfield Coal	Springfield Coal
greater than 66 inch-	Des		Hanover Limestone	Covel Conglomerate Hanover Limestone	
es. (Modified from			Excello Shale	Excello Shale	Excello Shale
•		XXXXXXXXXX	Houchin Creek Coal	Houchin Creek Coal	Houchin Creek Coal
ISGS Pub. IM 120,			Roodhouse Coal Pleasantview Sandstone	Breezy Hill Limestone Kerton Creek Coal Pleasantview Sandstore	Pleasantview Sandstone
Treworgy, et al)			Pleasantview Sandstone	Pleasantview Sandstore	Pleasantview Sandstone
3,, ,		-			
References:					

ness, depth, in-place tonnage, stability

of bedrock overbur-

| Central and Southern | Northern and Western | Eastern and Southern | Members and Beds | Members and Beds | Danville Coal | D

## - Handbook of Illinois Stratigraphy, 1975, Illinois State Geological Survey Bulletin 95, 261p. - Treworgy, C.G., C.P. Korose, C.A. Chenoweth, and D.L. North, 1999a, Availability of the Herrin Coal for mining in Illinois: Illinois State Geological Survey Illinois Minerals 120, 54 p.



## **Map Explanation**

The maps and digital files of this study were compiled from data from a variety of public and private sources and have varying degrees of completeness and accuracy. They present interpretations of the geology of the area and are based on available data. However, these interpretations are based on data that may vary with respect to accuracy of geographic location, type, quantity, and reliability, as they were supplied to the Illinois State Geological Survey. Consequently, the accuracy of the interpreted features shown in these files is subject to the limitations of the data and varies from place to place.

Contoured features less than 7 million square feet (about 1/2 mile square) in area may not be accurately portrayed or resolved. This data set provides a large-scale conceptual model of the geology of the area on which to base further work. These data are not intended for use in site-specific screening or decision-making.

## **Disclaimer**

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