Institute of Natural Resource Sustainablity

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

Herrin Coal Chlorine LAWRENCE County

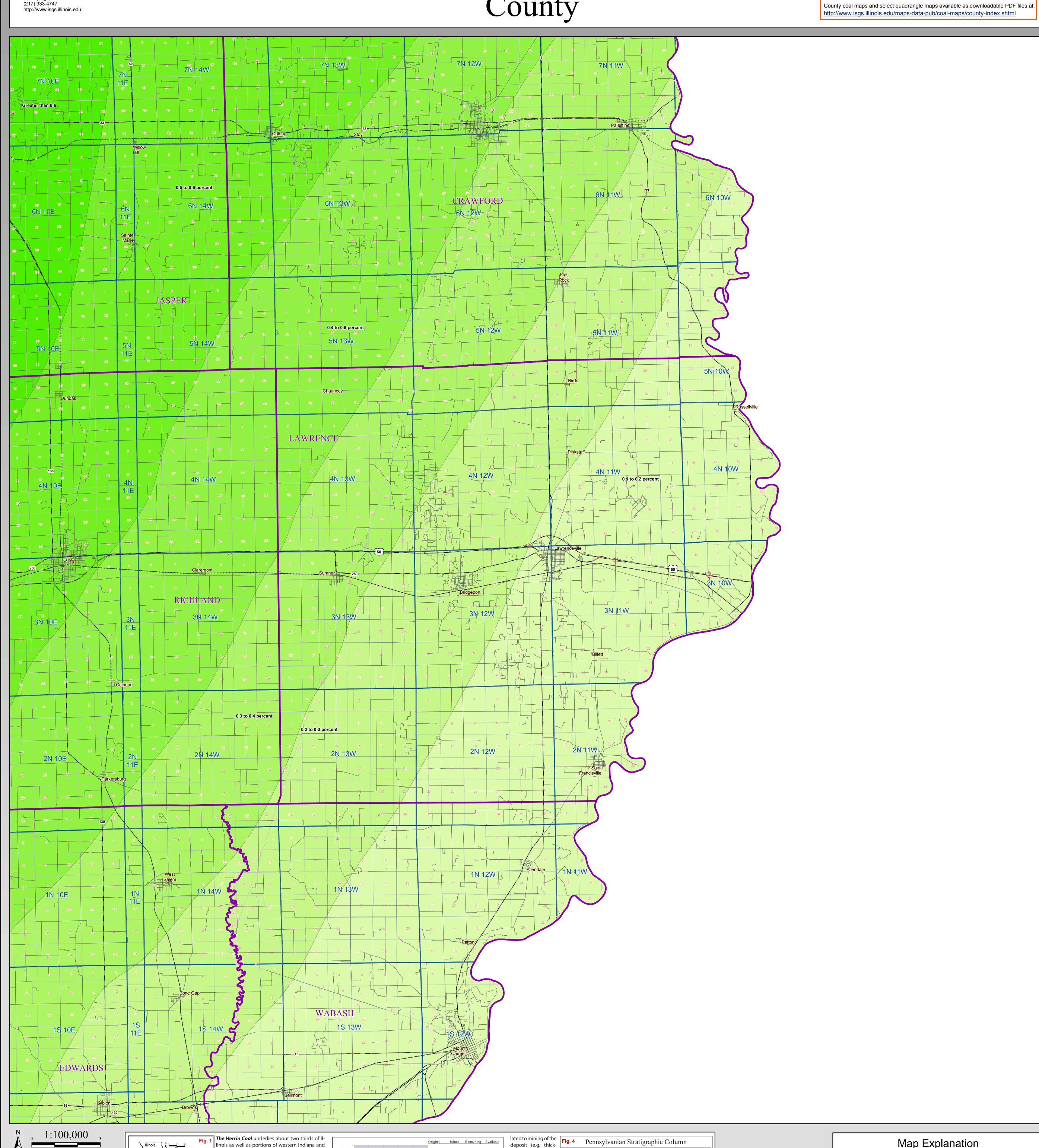
County Coal Map Series

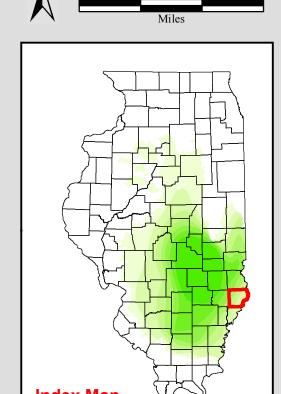
Andrew Louchios, Scott Elrick, Chris Korose, David Morse

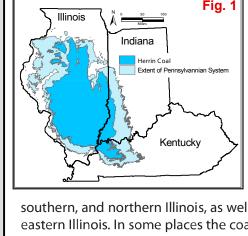
Map construction: October 29, 2009

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,

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 of Illinois, silty gray shale as much as 100 feet thick overlies the Herrin Coal. Associated with this shale is a channel sandstone commonly as much as a mile wide and 60-Rock Sandstone and may be tons, of which 9.4 billion have been mined. Approximately 58% of the original

					<u>Origi</u>	inal	Mined	R emaining	Available
Danville					19	9.6	0.2	19.4	4.5
Jamestown						3.6	0	3.6	0.9
Herrin					8	8.5	9.4	79.0	51.0
Springfield					6	5.1	2.2	63.0	27.0
Colchester					19	9.0	0.5	18.5	1.0
Dekoven						6.0	0.1	5.9	0.3
Davis			■ Available ■ Avail. w/ potential restr.			9.6	0.1	9.5	4.7
Seelyville			■ Restricted o	r mined		9.7	0	9.7	6.7
	0 20	40	60	80	100		(All numbe	rs in Billions of	f Tons)
Fig. 3		billio	ns of tons		22	1.1	12.5	208.6	96.1
	n by relativ				_			•	

Fig. 3		221.1	12.5	208.6	96.1
is overlain by	relatively thick bodies of t	ne gray sh	ale of up	to a few	tens of
feet it has a m	uch lower sulfur content tl	nan elsewl	here. The	gray shal	e over-
lies the coal p	rincipally in parts of Willia	ımson, Fra	anklin, Jef	fferson, M	adison,
St. Clair, easte	rn Macoupin, and S. Verm	ilion. Gene	erally, ho	wever the	Herrin
Coal is overlai	n by either the Anna Shale	Member	(black fis	sile shale)	or the
Brereton Lime	stone Member. (Hopkins, 1	968 - B95,	See Fig 4	·.)	

contemporaneous with the Herrin Coal resources, 51 billion tons, are considered available for mining. (See

coal. In areas where the coal Fig 3.) Available means that the surface land-use and geologic conditions re-

1.0	rently being mined
0.3	in the state. Of these
4.7	resources, 21 billion
6.7	tons occur in coal
ons)	42 to 66 inches thick and 30 billion tons
96.1	occur in thicknesses
tens of le over- ladison, Herrin) or the	greater than 66 inches. (Modified from ISGS Pub. IM 120, Treworgy, et al)

ness, depth, in-place

tonnage, stability

of bedrock overbur-

den) are comparable

to other coals cur-

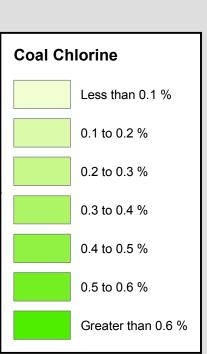
References:
- Handbook of Illinois Stratigraphy, 1975, Illinois State Geological Survey Bulletin 95, 261p.
- Treworgy, C.G., C.P. Korose, C.A. Chenoweth, and D.L. North, 1999a, Availability of the Herrin
Coal for mining in Illinois: Illinois State Geological Survey Illinois Minerals 120, 54 p.

Central and Southern Northern and Western Eastern and Southern Members and Beds Members and Beds Members and Beds

St. David Limestone Turner Mine Shale

Anvil Rock Sandston

Brereton Limesto Anna Shale



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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