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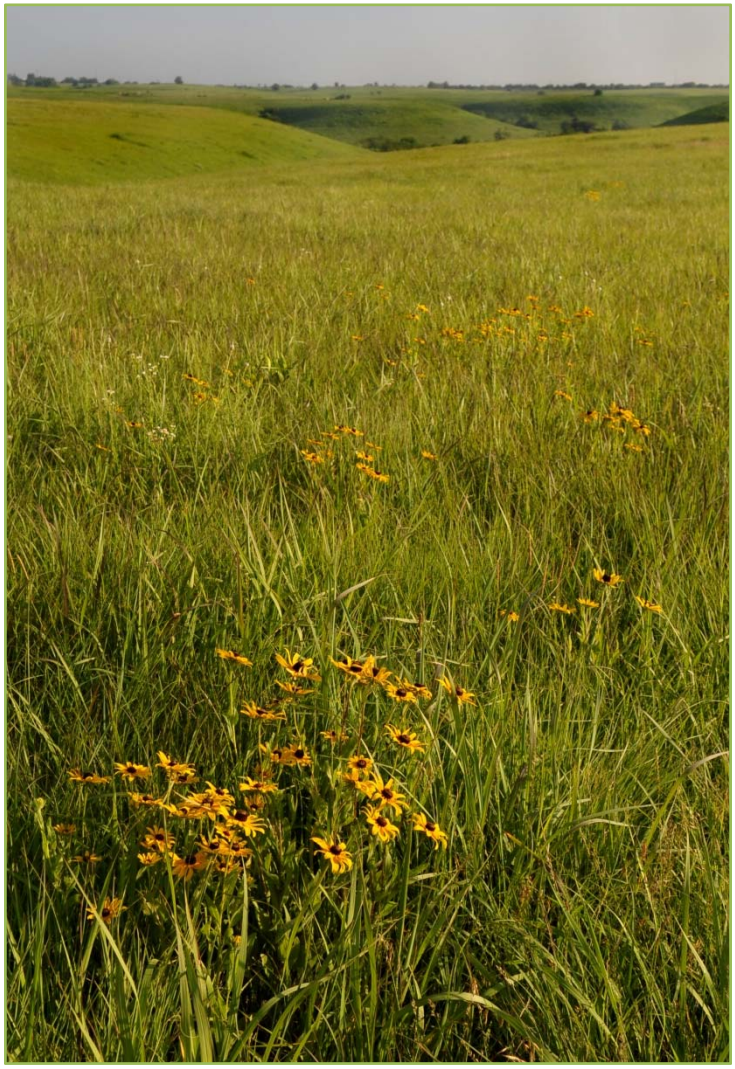

2014
Kansas County-Level Land Values for Cropland and Pasture

April 2015 (available at www.AgManager.info)
Revised July 2015

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The value of Kansas cropland and pasture land has been changing rapidly over the past several years. As a result, many people are interested in current estimates of the value of an average parcel of ground for their county. Since Kansas is a non-disclosure state, there is very little publicly available information people may use for determining county-average land values.

In an attempt to improve the amount of land value information available, the Kansas Property Valuation Department (PVD) provides K-State with data on agricultural land sales.[1] These data reflect agricultural land sales in Kansas from 2010 through 2014. To obtain estimates that reflect land sold for agricultural purposes in an "arm's-length" transaction, some observations were removed from the original dataset.[2] The sales data used in the analysis were limited to bare land (undeveloped) parcels of at least 40 acres in size. These filtered data were used in a regression analysis to estimate county-specific land (non-irrigated, irrigated, and pasture) values, referred to as KS-PVD. The land-value model used characteristics of the parcels sold to determine impacts on price. Characteristics such as parcel size, soil quality rating, percent of pasture and cropland within a parcel, and when a parcel was sold were all used to estimate county-level land values.

The county-level estimates and the average for each of the Crop Reporting Districts (CRD) are shown in Table 1, where the CRD average is a simple average of the counties that fall within the region. Table 2 provides a comparison between the 2013 estimates using PVD data and the 2014 land value estimates at the CRD level. Land values rose between 2013 and 2014 for all the CRDs in the state, with the largest dollar per acre increase in the Northwest district for irrigated land. Statewide, non-irrigated land increased by 6.2% between 2013 and 2014. Irrigated cropland across the state increased by 9.0% between 2013 and 2014, while pasture increased by 10.2% during the same period.

Irrigated cropland values are not reported for all counties. For statistical accuracy of the county-level estimates, a minimum number of land sales must be observed in a county. Counties

[1] The author would like to thank Leah Tsoodle (Kansas State University) and Mike Dahlman (Property Valuation Department) and others for their assistance with data collection and interpretation.
[2] "Arm's-length" refers to land sold through typical market channels and does not include intra-family transactions, court-ordered sales, or other transactions that may keep the sale from being considered a market-based transaction.

with less than 10 observed sales of irrigated land are not presented in the table. As a result, irrigated land values at the CRD level are only reported for the three Western regions and the South-Central region.

Another source of land value data are from the National Agricultural Statistics Service of the U.S. Department of Agriculture (USDA-NASS), who report state average values for irrigated, non-irrigated, and pasture land. These values are based upon an annual survey of agricultural producers and landowners asking for their estimate of the market value of cropland and pasture land they own or operate. Figure 1 displays the state-level estimates of land values from USDA-NASS versus the KS-PVD estimates for pasture, non-irrigated, and irrigated land between 2010 and 2014. The values shown in Figure 1 are listed in Table 3. The USDA-NASS land values estimates are consistently lower than the market-based KS-PVD estimates. The reason for this difference may be due to USDA-NASS survey respondents not being fully aware of how much land values have changed over the past several years.

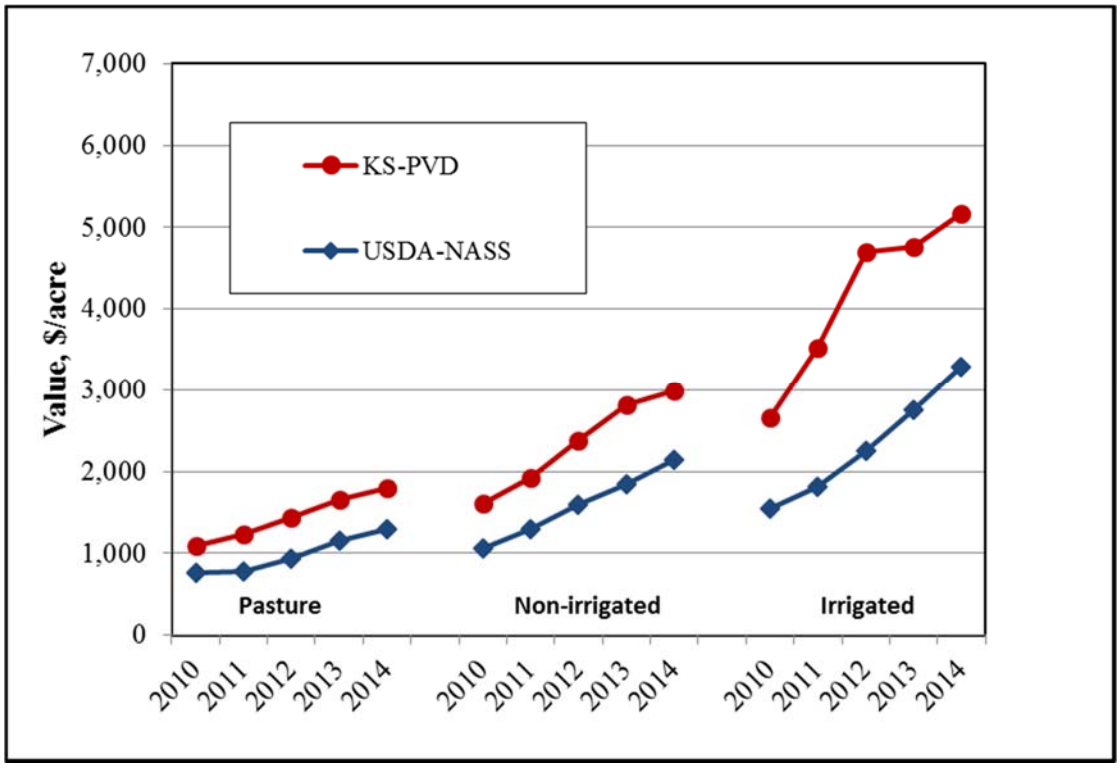

Figure 1. Average Kansas Land Values and Percent Differences between KS-PVD Estimates and USDA-NASS Estimates (2010 – 2014)

Table 1. Estimated Agricultural Land Values for 2014 using PVD Land Sales Data

CRD	County	Non-Irrigated, $/ac	Irrigated, $/ac	Pasture, $/ac
Northwest	Cheyenne	1,752	--	1,056
	Decatur	2,433	--	1,467
	Graham	1,645	--	992
	Norton	2,547	--	1,535
	Rawlins	2,088	--	1,259
	Sheridan	2,596	--	1,565
	Sherman	2,130	4,790	1,284
	Thomas	3,180	7,151	1,917
	Average:	**2,296**	**5,970**	**1,385**
West Central	Gove	1,862	--	1,123
	Greeley	2,051	--	1,236
	Lane	2,088	--	1,259
	Logan	2,177	--	1,312
	Ness	1,780	--	1,073
	Scott	2,773	--	1,672
	Trego	1,862	--	1,123
	Wallace	1,544	--	931
	Wichita	2,407	5,413	1,451
	Average:	**2,060**	**5,413**	**1,242**
Southwest	Clark	1,941	--	1,170
	Finney	1,719	3,866	1,037
	Ford	2,386	5,367	1,439
	Grant	1,268	2,852	765
	Gray	1,806	4,062	1,089
	Hamilton	1,218	--	734
	Haskell	1,555	3,496	937
	Hodgeman	1,526	--	920
	Kearny	1,313	--	792
	Meade	1,491	--	899
	Morton	1,057	--	637
	Seward	1,270	2,855	765
	Stanton	1,000	2,248	603
	Stevens	1,052	2,366	634
	Average:	**1,472**	**3,389**	**887**

CRD	County	Non-Irrigated, $/ac	Irrigated, $/ac	Pasture, $/ac
North Central	Clay	4,741	--	2,858
	Cloud	4,445	--	2,680
	Jewell	3,449	--	2,080
	Mitchell	2,610	--	1,573
	Osborne	2,248	--	1,356
	Ottawa	2,859	--	1,724
	Phillips	2,002	--	1,207
	Republic	4,846	--	2,922
	Rooks	1,640	--	989
	Smith	2,662	--	1,605
	Washington	4,131	--	2,491
	Average:	**3,239**		**1,953**
Central	Barton	2,766	--	1,668
	Dickinson	3,695	--	2,228
	Ellis	2,999	--	1,808
	Ellsworth	1,281	--	772
	Lincoln	2,403	--	1,449
	Marian	3,399	--	2,050
	McPherson	3,527	--	2,126
	Rice	2,659	--	1,603
	Rush	1,497	--	903
	Russell	2,427	--	1,464
	Saline	4,418	--	2,664
	Average:	**2,825**		**1,703**
South Central	Barber	3,192	--	1,924
	Comanche	2,124	--	1,281
	Edwards	2,515	5,655	1,516
	Harper	2,900	--	1,749
	Harvey	3,787	8,517	2,284
	Kingman	2,717	--	1,638
	Kiowa	1,937	--	1,168
	Pawnee	2,420	5,443	1,459
	Pratt	2,219	4,990	1,338
	Reno	2,745	6,173	1,655
	Sedgwick	5,270	--	3,178
	Stafford	2,342	5,266	1,412
	Sumner	2,909	--	1,754
	Average:	**2,852**	**6,008**	**1,720**

CRD	County	Non-Irrigated, $/ac	Irrigated, $/ac	Pasture, $/ac
Northeast	Atchison	4,883	--	2,944
	Brown	6,600	--	3,980
	Doniphan	6,300	--	3,798
	Jackson	4,089	--	2,465
	Jefferson	4,578	--	2,760
	Leavenworth	5,716	--	3,446
	Marshall	5,399	--	3,255
	Nemaha	5,259	--	3,170
	Pottawatomie	3,823	--	2,305
	Riley	4,687	--	2,826
	Wyandotte	--	--	--
	Average:	**5,133**		**3,095**
East Central	Anderson	2,953	--	1,780
	Chase	2,522	--	1,520
	Coffey	3,143	--	1,895
	Douglas	6,640	--	4,003
	Franklin	4,480	--	2,701
	Geary	2,739	--	1,651
	Johnson	--	--	--
	Linn	3,424	--	2,064
	Lyon	2,989	--	1,802
	Miami	7,319	--	4,413
	Morris	2,617	--	1,578
	Osage	3,358	--	2,025
	Shawnee	4,856	--	2,928
	Wabaunsee	3,509	--	2,116
	Average:	**3,888**		**2,344**
Southeast	Allen	4,419	--	2,665
	Bourbon	2,971	--	1,791
	Butler	4,308	--	2,597
	Chautauqua	2,622	--	1,581
	Cherokee	3,105	--	1,872
	Cowley	2,758	--	1,663
	Crawford	2,722	--	1,641
	Elk	2,793	--	1,684
	Greenwood	3,149	--	1,899
	Labette	3,247	--	1,958
	Mongtomery	2,795	--	1,685
	Neosho	3,098	--	1,868
	Wilson	2,802	--	1,689
	Woodson	3,168	--	1,910
	Average:	**3,140**		**1,893**

Note: Missing estimates for land value are due to insufficient observations of land sales.

Table 2. Estimated Average Land Values by Crop Reporting District, 2013-2014

	Crop Reporting District									
	Northwest	West Central	Southwest	North Central	Central	South Central	Northeast	East Central	Southeast	State
Non-Irrigated										
2013	2,168	1,945	1,389	3,058	2,667	2,693	4,847	3,671	2,964	2,822
2014	2,296	2,060	1,472	3,239	2,825	2,852	5,133	3,888	3,140	2,990
Difference, $/ac	128	115	82	181	158	159	287	217	175	167
Difference, %	5.9	5.9	5.9	5.9	5.9	5.9	5.9	5.9	5.9	5.9
Irrigated										
2013	5,500	4,987	3,025	--	--	5,534	--	--	--	4,761
2014	5,970	5,413	3,284	--	--	6,008	--	--	--	5,169
Difference, $/ac	471	427	259	--	--	474	--	--	--	407
Difference, %	8.6	8.6	8.6	--	--	8.6	--	--	--	8.6
Pasture										
2013	1,274	1,143	816	1,797	1,567	1,582	2,848	2,157	1,742	1,658
2014	1,385	1,242	887	1,953	1,703	1,720	3,095	2,344	1,893	1,802
Difference, $/ac	111	99	71	156	136	137	247	187	151	144
Difference, %	8.7	8.7	8.7	8.7	8.7	8.7	8.7	8.7	8.7	8.7

Table 3. Estimated Average Land Values by Type for Kansas, 2010-2014

Year	Non-Irrigated Cropland	Irrigated Cropland	Pastureland	All Agricultural Land
2010	1,608	2,660	1,092	1,787
2011	1,920	3,526	1,238	2,228
2012	2,381	4,706	1,437	2,841
2013	2,822	4,761	1,658	3,080
2014	2,990	5,169	1,802	3,320