
**2021 LEASE SURVEY
SUMMARY REPORT
K-State Research and Extension
Post Rock District
SMITH County**



2021 FARM LEASE ARRANGEMENT SURVEY SUMMARY FOR DRYLAND CROPS

K-STATE RESEARCH & EXTENSION



Post Rock District SMITH County



Number of survey responses: 32 (34% return rate)

Summary of Cash Rent Paid to Landlord

CROP ENTERPRISE	AVERAGE RENT/ACRE	CASH RENT RANGE
Cropland (dryland)	\$65.00	\$45 - \$85
Cropland (irrigated)	\$125.00	\$125.00

Other comments: Our irrigated land is flood irrigated, so more labor intensive than a pivot. 19% of respondents indicated no cash leases.

Estimated Trend for 2022 Dryland Crop/Pasture Leases in SMITH County

No change	56%
Higher	33%
Unsure of 2022 Trend	11%
Lower	No responses

Trend of Lease Arrangements for 2022

NO CHANGE	MORE CASH RENT	MORE CROP SHARE
92%	12%	No responses

Adjustments to Cash Rents due to rising input costs in 2021

NO ADJUSTMENTS	INCREASE	DECREASE
90%	10%	No responses

**Percentage of acres in the different Tillage Systems in 2021
(Number of responses)**

No -Till	Minimum Till	Conventional Till	Summer Fallow
8 - 100% 3 - 70% to 80%	1 - 100% 3 - 25% or less	1 - 10% or less	3 - 33% or less

**When were the cash rent payments made to the landlord for 2021?
(% of responses)**

All at once	Split payment	Dates	After Harvest
11% (Payments in October)	67%	March/Sept. March/Dec. May/Nov. May/Dec. July/Oct. July/Nov. August/Dec.	22% (Payments in July and November and also varies by landlord.)

Interest in Flexible Leasing Arrangements

No	Yes
91%	9%

Crop Share Summary

DRYLAND CROP ENTERPRISE	SHARE PAID TO LANDLORD	OTHER COMMENTS
Wheat	1/3 - 100%	
Grain Sorghum	1/3 - 100%	
Corn	1/3 - 100%	
Sunflowers	1/3 - 100%	
Soybeans	1/3 - 100%	
Alfalfa	1/3 - 50% 1/2 - 50%	-As renter, I get 100%
Other Dryland Crops (Brome Hay)	1/3 - 100%	
Landlord's Share of Government Payments	1/3 - 100%	
Landlord's Share of Crop Insurance Proceeds	1/3 - 100%	-Tenant has their own insurance. -Landowner has their own insurance.

Comment: 50% of respondents indicated no crop share leases.

**Percentage of Written and Oral Leases
For Pasture and Cropland (number of responses)**

Written Leases		Oral Leases		
5 – 95% to 100%	2 - 25% or less	3 - 100%	2 – 75% to 90%	2 – 5% or less

**Landlord Share of Input or Cost
(Percent of responses)**

EXPENSE OR INPUT	Landowners % Share of Crop Expenses	Other Comments
Fertilizer	1/3 – 100%	-Share on dryland only.
Fertilizer Application	None – 83% 1/3 – 17%	
Herbicide	1/3 - 67% None - 33%	
Herbicide Application	None - 83% 1/3 - 17%	
Insecticide	1/3 - 67% None - 33%	
Insecticide Application	1/3 - 50% None - 50%	
Harvesting Costs	None - 100%	
Hauling Grain	None - 100%	
Drying costs after harvest	1/3 - 67% None - 33%	
Crop Insurance	1/3 - 80% None - 20%	-Landowner has own insurance. -Landowner has own insurance for his 1/3 share. -Tenant has own insurance.
Other production costs (seed, fungicide, crop consulting, water, etc.)	None - 83% 1/3 – 17%	
Terrace/Conservation Structure Maintenance (annual upkeep costs)	None - 66% 100% - 17% 1/2 - 17%	
Terrace/Conservation Structure Construction (major land investments)	100% - 100%	-Landowner pays for all costs for long term improvements.

Pasture Lease Summary

Physical Location of Pasture Land

Mitchell Co.	7%
Osborne Co.	7%
Phillips Co.	14%
Smith Co.	72%

Pasture Land Rental Rates

Average rent/acre	\$23.00/acre
Range/acre	\$6– \$30/acre

Trends for stocking rates for 2022

No Change	92%
Decrease	8%

Livestock Stocking Rate (Cow/Calf)

Average	7 acres/pair
Range	6-10 acres/pair

Mature Weight of Cow

Average	1,188 lbs.
Range	1,000-1,400 lbs.

Livestock Water Supply

Pond	48%
Well	30%
Stream	22%
Transport	No responses

Summary of Tenant/Landlord Responsibilities

Responsibility	Tenant	Landlord
Maintaining Water Supply	67%	33%
Maintaining Fences - Furnishing Materials	33%	67%
Maintaining Fences - Furnishing Labor	75%	25%
Controlling Weeds	42%	58%

Special arrangements for weed control in pastures:

No - 73% Yes - 27%

Comments:

- Landowner controls noxious weeds
- Sprays utilizing plane
- Allows hunting
- Aerial spray paid by landowner
- 19% of respondents indicated no pasture leases.

Grazing Period in 2021

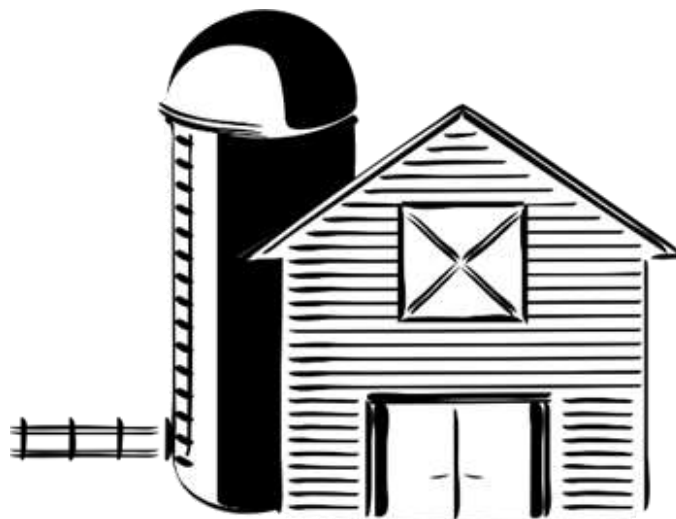
Pasture season length (months)	Month Started	Month Ended
6 mo. – 82%	Jan. – 18%	Oct. – 27%
12 mo. – 18%	Apr. – 9%	Nov. – 55%
	May – 73%	Dec. – 18%

Grazing Period in 2020 (previous year)

Pasture season length (months)	Month Started	Month Ended
6 mo. – 80%	Jan. – 20%	Oct. – 40%
12 mo. – 20%	Apr. – 20%	Nov. – 40%
	May – 60%	Dec. – 20%

Kinds of Pastureland - 2021

Upland	Lowland/River	Mixture
8– 100%		1– 100%
3– 55%-90%	3– 30% or less	1- 30% or less



Crop Residue Grazing Summary

*******Not enough responses for the 2021 Smith Co. survey data reporting. Refer to the Post Rock Extension District Leasing Summary Fact Sheet.**

Kansas has an abundance of crop residue available for grazing in late fall and winter. However, the location of fields in relation to cattle, the lack of shelter or appropriate fencing, and water availability often prevent grazing of many fields. Despite these limitations, crop residue grazing has become an integral part of many cattle operations, primarily as a feed resource for maintaining the breeding herd during winter or putting weight on cull cows.

Weather can be the most important factor in successfully grazing crop residue. Snow cover can reduce or eliminate access to crop residue. Mud may make grazing difficult and may result in decreased performance and greater waste of forage due to trampling. Corn stalk fields grazed shortly after harvest are higher in nutrient content than fields grazed 60 days after harvest. This indicates that there is some weathering loss of nutrients. The greatest nutrient loss appears in the husk and leaf and the loss is primarily a loss in energy content.

Cows grazing corn stalks will consume 25 to 30 percent of the available residue in 30 to 100 days, depending on stocking rate. This can leave enough material to prevent soil erosion. Cattle will select and eat the grain first, followed by the husk and leaf, and finally the cob and stalk. Also, as the stocking rate (number of cows per acre) is increased, the nutrient content of the remaining residue declines much quicker because the grain and husk are being removed at a much faster rate.

Salt, phosphorus, calcium, and vitamin A supplements are recommended for all cattle grazing dormant winter range and crop residues. These supplements can be supplied free-choice to the cattle.

As long as cattle have grain to select in a cornstalk field, **they will consume a diet that is probably above 7 percent crude protein and as high as 70 percent TDN.** This will exceed the protein and energy needs of an 1100-pound cow in mid-gestation. Spring calving cows are at

mid-to-late gestation during fall and early winter; therefore, their nutrient requirements match well with a crop residue grazing program.

Lactating cows, such as fall calving cows grazing crop residue, need to be managed carefully. As long as lactating cows have grain to select in the field, their energy needs should be met. If the breed type has a high milk potential, protein supplementation is necessary even if the cattle have grain to eat.

Grazing livestock can cause soil compaction, **but generally the compaction is shallow and temporary.** Soil moisture and soil type are the two main factors which affect the severity of the compaction. Moist soils with significant clay content are most prone to compaction and are often referred to as "tight" soils. Completely saturated soils or dry soils do not compact. The winter freeze/thaw and spring tillage will eliminate most compaction created by livestock.

On average, the energy and protein in the leaves of **milo stubble** appear adequate for cows in mid-to-late gestation, but not for heifers in late gestation. Monitor body condition of mature, gestating cows grazing milo stubble. **If they appear to be losing condition, supplement protein.** Because of the milo grain's hard outer coat, it is not utilized as well as corn grain by the cow, but cows can still experience acidosis (founder in milo fields that have excess milo heads left in the field after harvest).

Average % composition of harvested crop residues - dry matter basis

		Protein %		IVDMD %	
CORN	DM %	Range	AVG	Range	AVG
Grain	73	9.5-11.2	10.2	88-95	90
Leaf	76	6.2-7.8	6.5	43-48	46
Husk	55	3.0-4.0	3.5	57-64	61
Cob	58	2.1-3.8	2.8	32-38	35
Stalk	31	3.4-4.9	4.1	43-50	45
MILO					
Grain	74	10.3-11.0	10.5	85-95	90
Leaf	66	6.0-11.0	8.0	51-59	56
Stalk	25	3.3-3.9	3.6	49-53	52
IVDMD-In vitro dry matter digestibility. IVDMD is about equal to TDN (total digestible nutrients).					

References:

- K-State Research and Extension Forage Facts Notebook
- Grazing Crop Residues with Beef Cattle, UNL Extension, EC278

Recreational Leasing Summary

Percentage of Written and Oral Leases

For recreational hunting:

Written	Oral
60%	40%

Years with same tenant:

1-10 years 100%

Leasing Arrangements for Hunting 2021:

Hunting Type	Acres	# Hunters	Length	Rental \$
Deer	490	Unlimited	Fall Season	No response
Turkey	490	Unlimited	Season	No response
Waterfowl	490	Unlimited	Season	No response

Rating of Hunting

Good 100%

Are users required to sign a waiver of liability or carry liability insurance?

No 100%

Is the property specifically managed to improve the wildlife or fish habitat?

No 100%

Other comments related to recreational hunting:

- No hunting leasing indicated (81% of respondents).
- Walk-in Hunting (Yes - 67%; No – 33%)



Information related to recreational hunting:

In many parts of Kansas, hunting leases for cropland and pasture offer an additional revenue source for land-owners. Whether or not to pursue this option is going to depend on a couple of factors: how much can I charge and what is my liability exposure?

Information on hunting leases and rental rates is challenging to find and, when it is available, interpret accurately. There is very little consistency across hunting leases and learning what other people pay and/or receive is only half of the equation. How much a hunter is willing to pay for a lease will depend on the amount of land, the quality of the habitat, the range of wildlife and seasons the land can be hunted, along with documented harvests of trophy animals on that land. Each of these factors can affect the rental rate, as well as how many years the land may be rented. Another aspect of hunting leases that affects the rental rate is the availability of additional services such as housing, meals, guide services, and even transportation from the nearest airport. Landowners who cater to more of the needs of hunters will be able to charge a higher rent for their land.

The question of liability is an important one because risk exposure depends on the type of lease that is negotiated. Agricultural land owners can avoid liability if they allow hunters on their land at no charge or if they charge a fee for hunting only. This means if any additional services are provided such as guiding, lodging, etc. the landowner may be liable. Another option for the landowner to rent their land and not have to deal with liability is by contracting with the State of Kansas through the Walk-In Hunting program.

Regardless of the type of lease that is pursued, it is important to remember that the hunting rights to a piece of rented farmland transfer to the tenant unless they are explicitly retained by the landowner in a written contract. This means both landowners and producers need to discuss how a hunting lease would work for them and how the costs and benefits will be split. Examples of questions to answer include: Who pays for any improvements that affect the hunting lease, i.e. permanent blinds? Will the presence of livestock on the land be affected by hunting?

Communication between the landowner and producer can make hunting leases a beneficial option.



General Lease Concepts

Rules & Regulations:

- Leases must be longer than two years to allow tenants to sublease.
- When a farm is sold, the new owner substitutes for the old.
- Leases are binding on executors and heirs.
- Written leases can cover any length of time.
- Oral leases are **unenforceable** if they are one year or more in length.

Test of a Good Lease:

- Is it written?
- Does it encourage proper amounts of yield increasing expenses?
- Does it plan for new or needed improvements?
- Does it promote conservation?
- Is the crop shared in the same percentage as the contribution?

Lease Termination Notice:

- In writing
- At least 30 days prior to March 1
- **Spring planted crops:** must fix termination date of tenancy to take place on March 1
- **Fall seeded crops:** will be terminated the day after harvest or August 1
- **Exception to above:** written lease providing otherwise

Crop Share Leases

A good crop share lease should follow five basic principles:

- Yield increasing inputs should be shared.
- Share arrangements should be re-evaluated as technology changes.
- Total returns divided in same proportion as resources contributed.
- Compensation for unused long-term investments at termination.
- Good landlord/tenant communications

Advantages of Crop Share Leases:

- Yield and price risks and opportunities are shared by tenant and landlord.
- Less operating capital needed by the tenant.
- Management skills may be shared by an experienced landlord and tenant.
- Tax management opportunities from timing of sales and input purchases.
- Material participation issues

Disadvantages of Crop Share Leases:

- The landlord's income is more variable.
- More record keeping is required.
- Landlords have marketing decisions to make.
- Joint management decisions must be made and disagreements may occur.
- Material participation/Social Security issues

Cash Rental Leases

Methods to Determine Cash Rental Rates:

- **Market going rate (if available)**
Local competitive rental rates
- **Landowner's cost**
Depreciation, Interest, Repairs, Taxes, Insurance - Based on the premise of landowner's continuing to receive comparable returns to what has been received in the past.
- **Crop share equivalent (adjusted for risk)**
Converts equitable crop share rent to an expected dollar amount per acre.
- **What Tenant Can Afford to Pay**
 $Revenue - Non-land Costs = Rent$
(The last three require yield, price, and government payment projections as well as cost information used for crop share.)



Advantages of Cash Leases:

- **For Landlords**
 - Less involvement in management.
 - No production costs to share.
 - No marketing decisions to make.
- **For Tenants**
 - More managerial control and freedom.
 - More income for above-average managers.
 - More potential for windfall profits in good years.

Disadvantages of Cash Leases:

- **For Landlords**
 - No potential for windfall profits in good years.
 - Less tax management flexibility from timing sales and expenses.
 - Risk of exploiting or “mining” of the farmland by a tenant.
- **For Tenants**
 - Bears all yield and price risk.
 - Crop production and expenses are higher.

Trends in Leases and Values of Agricultural Land in Kansas

by Robin Reid, K-State Research and Extension, Ag Economist

The agricultural industry in recent years has faced increased volatility in commodity prices and therefore uncertain profitability for farmers and ranchers. While 2021 offered higher commodity prices and profitability for most producers, the ongoing pandemic has created new challenges with supply chain disruptions and escalating input costs, adding stress to the bottom line for farmers and ranchers.

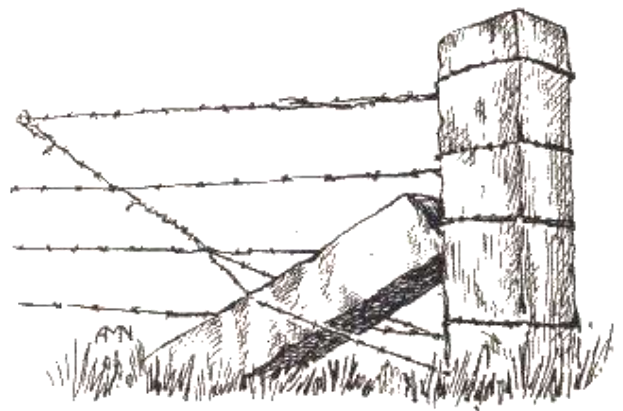
Amid these challenges, land prices have seen an unprecedented increase in value due to low interest rates, recent higher profitability in farming returns (due to government payments and higher commodity prices), historically high inflation rates, and increases in investment outside of agriculture. According to surveys by USDA-NASS, the statewide average land value for cropland in 2021 increased by 13.9% over the 2020 value, reaching an all-time high of

\$2,250 per acre. A similar pattern can be observed in pasture values. The state average of pasture was \$1,500 per acre in 2021; an increase of 9.5% over the 2020 value. Farm profitability is expected to drop from the historically high level it experienced in 2021 due to increasing input costs, which could slow the increases in the land market value in 2022.

For most producers, high volatility in commodity and input prices translates into higher risk exposure from rental rates. During periods of high profitability, such as has been seen in the last two years, rental rates will increase and competition for land can be fierce as producers try to expand their land base to capture more returns. However, a sudden decline in profitability in the sector will not necessarily translate into lower rents in the short run, which becomes a very risky situation for a farmer or rancher.

Rental rates tend to lag behind commodity prices and profitability because land contracts and cash rental rates are often set for 3-5 year periods to allow both producers and landowner to plan for expected costs and returns. As a result, producers can be locked into rents that are not aligned with the current market; either higher or lower. In addition, from a landowner's perspective, higher profitability in agriculture will eventually translate into higher real estate taxes, putting upward pressure on rental rates.

Regardless of the particular situation a producer faces, strong communication with their landowner can be very beneficial to the long-run economic viability of their operation. Tenants who take extra time to work with their landowners, answer questions, and keep them up to date on the farm's situation will find it easier to have those difficult conversations.



Flexible Cash Rents

Principles:

- Flexible cash rents simply refer to land rental arrangements where the amount of cash rent paid (received) can vary based upon some pre-determined formula (i.e. formalizes bonus rents).
- Methods of “flexing” rental rates, i.e., formulas are based on:
 - Yield (actual for producer, co avg., etc.)
 - Price (harvest, season average, actual)
 - Revenue (yield x price, crop insurance, residue)
 - Costs (i.e. fertilizer price)
 - Other

Advantages of Flexible Cash Rents:

- Method of allowing rents to vary year-to-year without having to renegotiate rents annually.
- Way of sharing/managing risks associated with volatile markets (without hassles of crop share lease).
- Somewhat “forces” a higher level of communication relative to fixed cash rent (poor/lack of communication is often an issue with problem lease arrangements).
- Trend in Kansas has been moving away from crop-share leases to more cash leases.
- Volatility of last few years has significantly increased the risk of **fixed** cash rents.

Disadvantages of Flexible Cash Rents:

- Complex!
- Theory and intuition guide conceptual design, but little help with specific details.
- Not needed if cash rents are renegotiated frequently or every year.
- Hard to think of everything, which means we might need to be “tweaking” the arrangements regularly.
- If designed wrong, might increase risk.
- Appealing for certain situations, but not appropriate in all cases (depends on why you are considering flexible cash rent).

How to determine Flexible cash rents:

- There is not a single right way to do this! (But there are plenty of wrong ways).
- Establish a base cash rent:
 - Budget-derived value (KSU-Lease.xls) Online KSU spreadsheet (Excel) tailors to a specific situation and an equitable crop share can be calibrated to the local area.
- **Questions to ask:**
 - Does cash rent flex up and down or only up?
 - What yields and prices are used to determine actual gross revenue?
 - What crops should be included in calculations?
 - Are crop insurance and government payments included/accounted for?
 - What about flexing cash rent based on costs of crop inputs?
 - What will final rent be under alternative potential outcomes?

Summary:

- Flexible cash leases are simply a way of sharing risks of unpredictable markets and yields without the hassles of crop ownership.
- Why not simply give landowner ad hoc “bonuses” when times are good?
- There are many types of flex leases – no one method is right or best in all cases.
- Communication, communication, communication! (Remember, it likely is a learning process for both parties.)
- The KSU website www.agmanager.info has more information on **Flexible Cash Rents**.

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