

2022-23 Kansas Elk Harvest Report

PERFORMANCE REPORT STATEWIDE WILDLIFE RESEARCH AND SURVEYS

A Contribution of Pittman-Robertson Funds
Federal Aid in Wildlife Restoration

Grant W-39-R-29

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July 2023



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Background – Elk were released onto Fort Riley Military Reservation in 1986, and a limited hunting season was initiated in 1990. The herd continued to increase until the elk began leaving the Fort and causing significant crop damage on neighboring landowners. The Department responded by allocating almost 200 permits in 1999 and 2000 resulting in the harvest of over 100 elk on and around the Fort and a significant reduction in the population.

As the herd rebounded, the Department's management philosophy changed to try and avoid those situations of conflict with landowners followed by rapid herd reduction. As a result, longer seasons and less restrictive permitting options were progressively authorized as new issues emerged except on Fort Riley and the Cimarron National Grasslands. This framework allows elk that may be causing crop damage or other conflicts on private land to be harvested in a timely manner, giving landowners the ability to control their own elk numbers. However, elk hunting opportunity serves as a big incentive for landowners to maintain some elk. And many have, as evidenced by the herds of elk that have sprung up on private lands around the state. Elk continue to increase under this management approach and now occur at least occasionally though often unpredictably throughout most of the state.

Elk hunting in Kansas is limited to Kansas residents. Any-elk permits valid on Fort Riley are once-in-a-lifetime, and antlerless-only elk permits valid on Fort Riley may only be obtained once every five years. Demand for these permits has really increased over the past several years. This season's total of 1431 applications or preference point purchases was the second highest total since 2005 (Figure 1). This includes an average over the past five years of 76 active-duty military personnel stationed at Fort Riley. These individuals are given a preferential draw opportunity for Fort Riley permits. Unit 3 permits are available over-the-counter (OTC) to general residents and landowner/tenants. Hunt-own-land permits are also available OTC in Units 2 and 3, with their advantage over the Unit 3 landowner/tenant permits being their availability to landowners in the buffer area outside of Fort Riley within Unit 2.

Hunters purchased 179 elk permits for the 2022 season (Figure 2). This is the most elk permits ever sold in Kansas, up from 171 and 172 the two previous seasons. The steady increase in the sale of over-the-counter permits for almost 10 years was indicative of an elk herd growing in number and distribution in the state, but sales have generally stabilized in the last several years with totals in the 170's over the last 3 years. It's also worth noting that regulatory changes in the early 2000s made elk progressively more accessible to more hunters, whereas regulations affecting permit availability have been stable now for over 10 years.

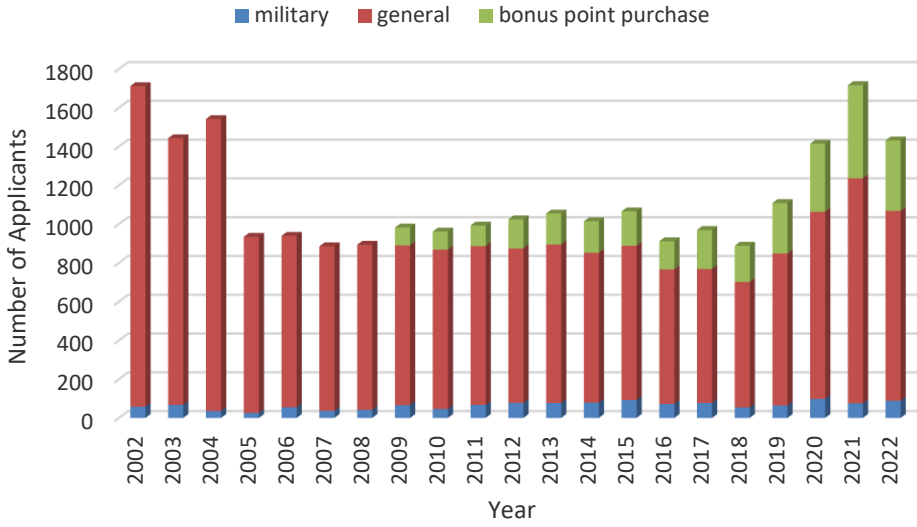


Figure 1. Fort Riley elk permit applications and bonus point purchases in Kansas since 2002. A \$5 bonus point fee was initiated in 2005 and increased to \$10 in 2016.

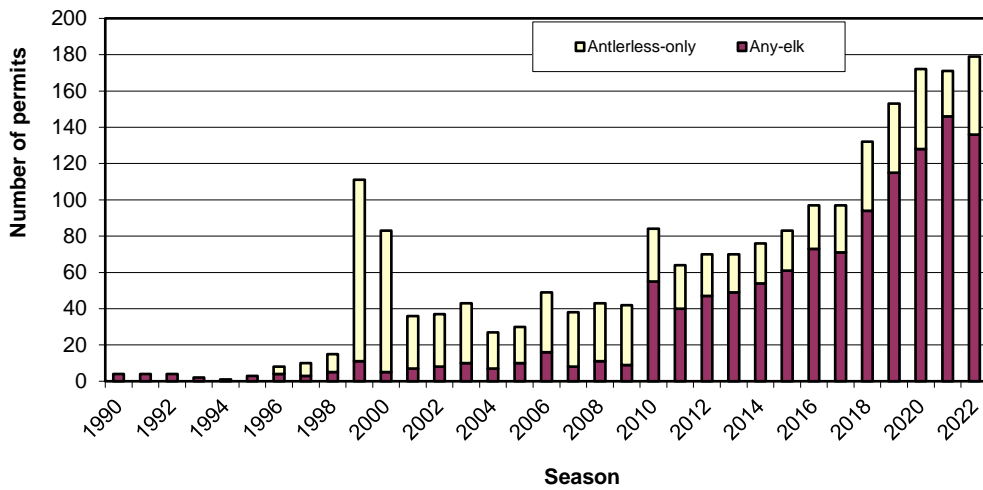


Figure 2. Antlerless-only and any-elk permit sales in Kansas since hunting seasons were initiated on Fort Riley in 1990.

Harvest – Elk harvest and hunter activities are monitored annually through harvest surveys sent to all elk hunters (see Appendix 1). Paper report cards and postage paid tooth envelopes are sent out at the beginning of the season, then paper and e-mail follow-ups are conducted at the end of the season. Fort Riley also has mandatory harvest registration that is incorporated into this report for applicable nonrespondents (i.e. those who reported their harvest to Fort Riley but not KDWP). The harvest survey response rate was 73% this season, which is the lowest response rate on record. The response rate 5-year average is 78%.

The reported harvest was 40 elk (Figure 3), including 25 elk taken on 136 any-elk permits (18%) and 15 taken on 43 antlerless-only elk permits (35%). This was down from a total of 45 elk harvested each of the last two seasons. Twenty-three of the 25 elk taken on any-elk permits were antlered. The number of antler points of 19 of these animals can be found in Table 1.

Total permit success was 22%. Ten of 12 hunters (83%) with Fort Riley any-elk permits and eleven of 18 hunters (61%) with Fort Riley antlerless-only elk permits harvested elk. Over the past five years, Fort Riley any-elk permit holders have averaged 80% success and Fort Riley antlerless-only permit holders have averaged 55% success. Only 1/3 of the antlerless-only permits are valid during each one-month segment of the any-weapon season on Fort Riley. Five-year average harvest success for the October, November and December segments for antlerless-only permits were 53%, 45% and 67%, respectively. Harvest success rates for these permits since 2013 can be found in Figure 4.

Harvest success rates for permits available over-the-counter (not valid on Fort Riley) are provided in Figure 5. General resident any-elk and antlerless-only elk permit success rates averaged 23 and 15%, respectively, over the past five years. Success rates for landowner permits including landowner/tenant and hunt-own-land permits averaged 21% and 36%, respectively, for any-elk and antlerless only elk permits over the past five years.

Reported harvest and success rates do not include a correction for nonrespondents because Fort Riley has traditionally accounted for most of the harvest, and they have mandatory harvest reporting. In addition, from 2006-2015, harvest reporting was mandatory statewide to facilitate testing for chronic wasting disease (CWD). Consequently, until recently, the number of harvested elk not reported to the Department was presumably very low. More recently, with high permit sales and success outside Fort Riley, nonrespondents potentially had a greater impact on harvest than ever before. Expanding respondent success rates to nonrespondents yields an additional harvest of 11 elk, 9 of which would have been antlered.

Elk harvest is spread out fairly evenly throughout the season (Figure 6), but there are a couple of notable points. One elk was killed during the August firearms season which was established in 2019 as an alternative to issuing depredation tags for damage to corn on private land. Archery and muzzleloader seasons on Fort Riley open September 1. Five elk were killed on Fort Riley and three on private land during that month. There were also just two elk killed outside of Fort Riley during the Nov. 30-Dec. 11 regular firearms season (concurrent with firearms deer). Another seven elk were killed on private lands during the late firearms season off Fort Riley, including three in January, two in February and two in March.

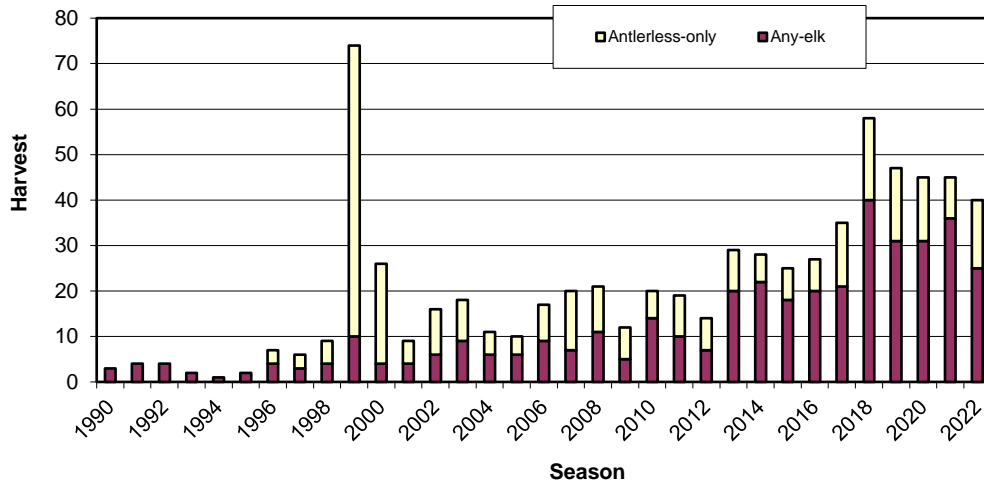


Figure 3. Elk harvest in Kansas by any-elk and antlerless-only elk permit holders since hunting seasons were initiated on Fort Riley in 1990.

Table 1. Antler points of bull elk harvested in Kansas during the 2022-23 season (n=19).

Antler Points	Number of Hunters
1x1	3
3x2	1
3x3	1
4x5	1
4x6	1
5x5	4
5x6	2
5x7	1
6x6	2
6x7	1
7x7	2

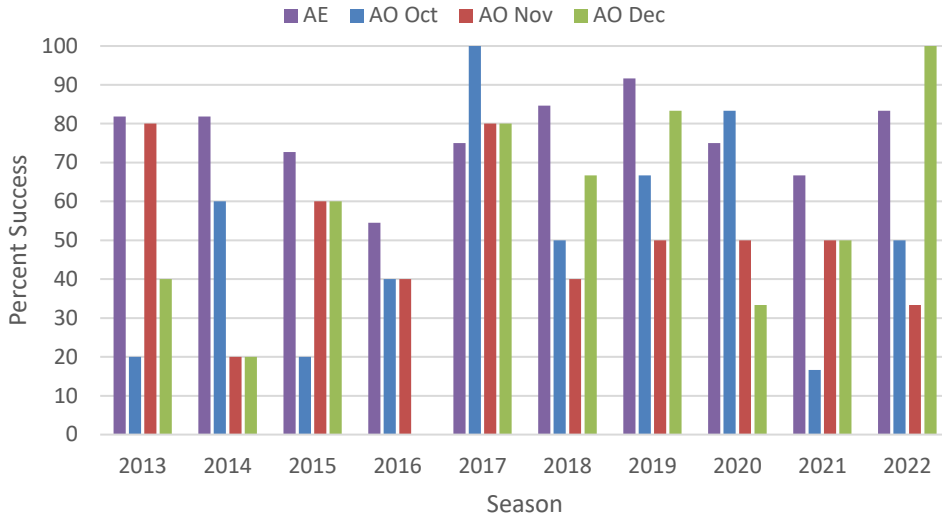


Figure 4. Harvest success rates for draw permit types valid on Fort Riley for elk in Kansas since 2013. (AE = any-elk, AO = antlerless-only)

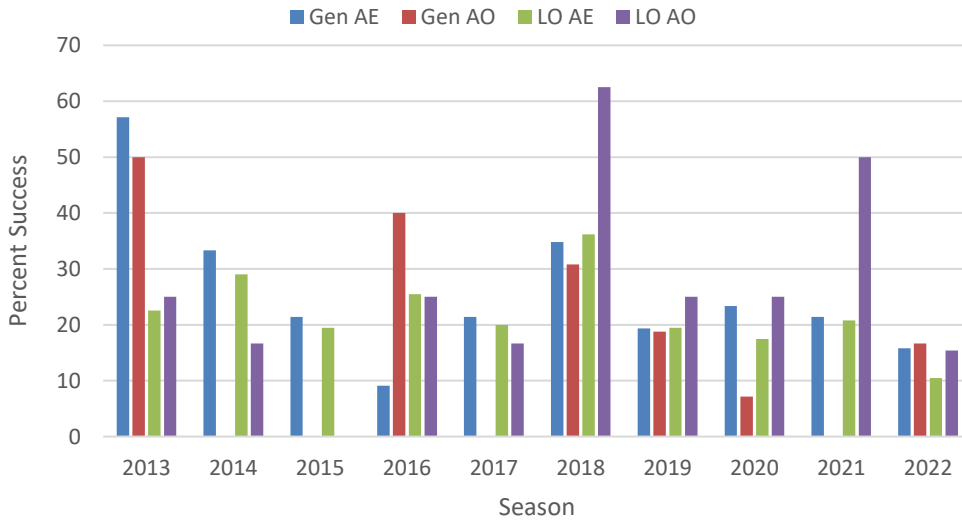


Figure 5. Harvest success rates for general resident (Gen) and landowner/tenant (LO) elk permits available in Kansas over-the-counter since 2013. (AE = any-elk, AO = antlerless-only)

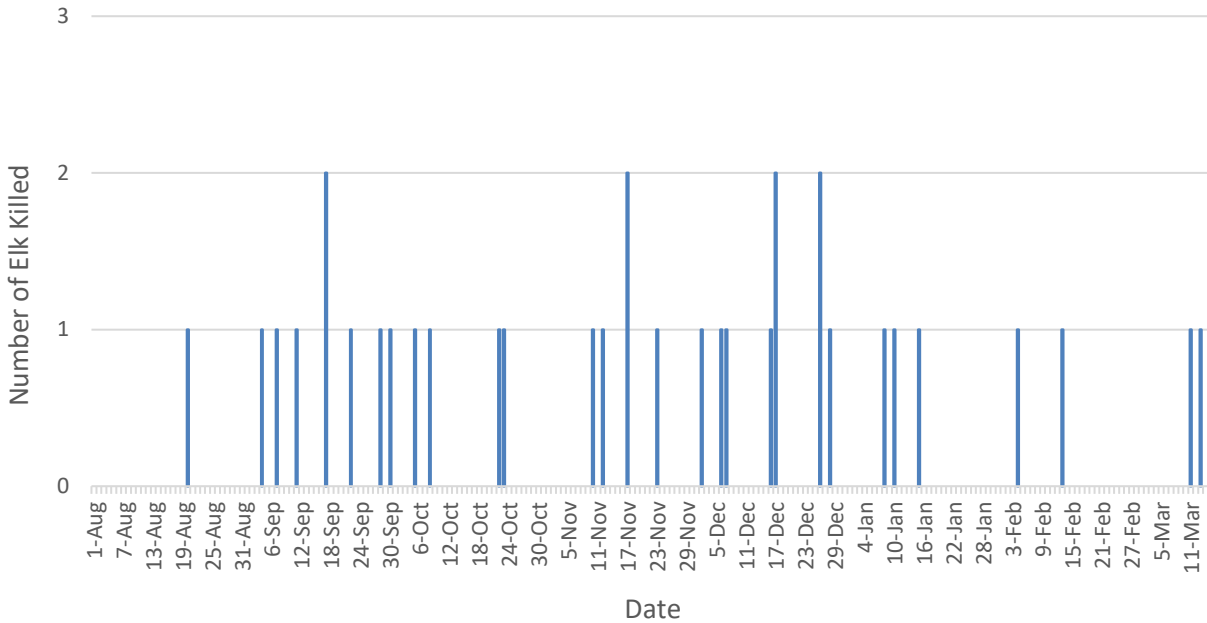


Figure 6. Reported date of harvest of elk taken during the 2022 season (n=34).

Equipment Use - Elk permits are valid during any season with equipment legal for that season. The percent of elk hunters using each equipment type in recent years is provided in Figure 7. Annual totals in this figure exceed 100% as quite a few hunters use more than one equipment type (26% in 2022). The percent of elk harvested with each equipment type is provided in Figure 8. Five-year harvest averages by equipment type are: firearms-71%, muzzleloader-11%, compound bow-14%, crossbow-4%, shotgun-0%, longbow-0%, and recurve bow-0%.

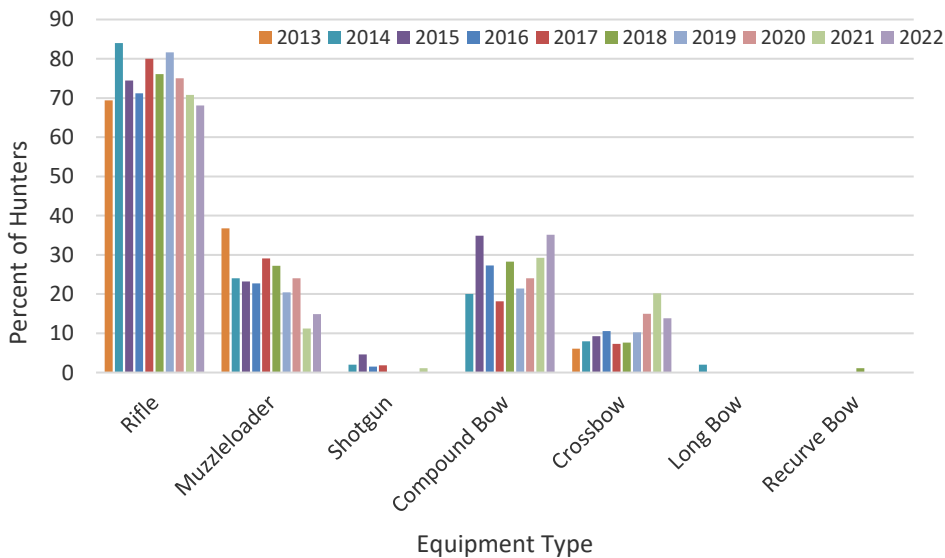


Figure 7. Percent of hunters using each equipment type to hunt elk in Kansas since 2013.

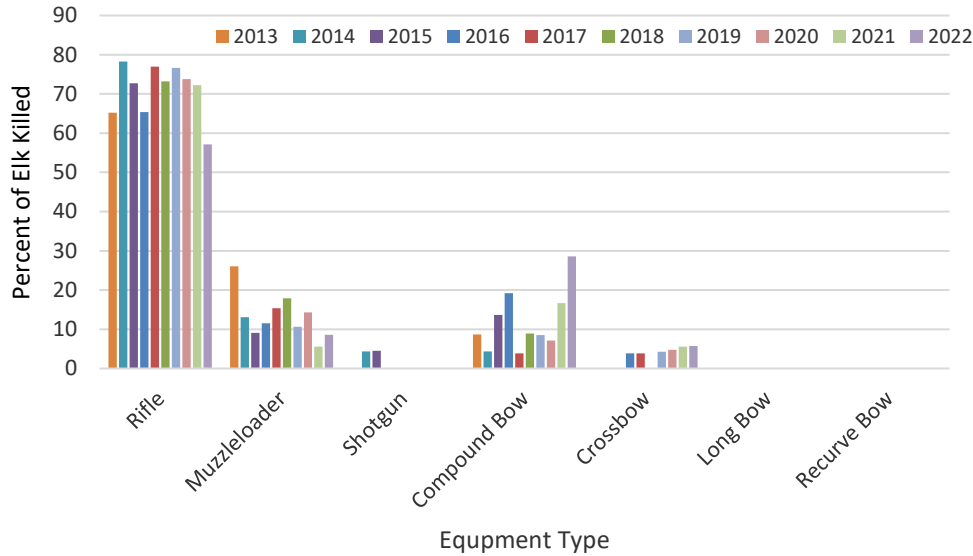


Figure 8. Percent of elk harvested in Kansas with each equipment type since 2013.

Harvest by Location – There are currently three elk management units in Kansas (see page 2 of Appendix 1) of which Units 2 and 3 are open to hunting. These units have been in place since 2011 except the boundary of Unit 2 was adjusted in 2018. Elk harvest in Kansas by management unit since 2013 can be found in Figure 9. Elk harvest by property type since 2013 can be found in Figure 10. Hunters provided county of harvest for 32 of 36 elk harvested. Harvest by county was as follows: Riley-20, Reno-3, Stafford-3, Geary-2, Jefferson-2, Barber-1, Gray-1, Marion-1, Marshall-1, Wallace-1, and Washington-1. In the last five years, elk have been harvested in over ¼ of the counties in Kansas (28 of 105).

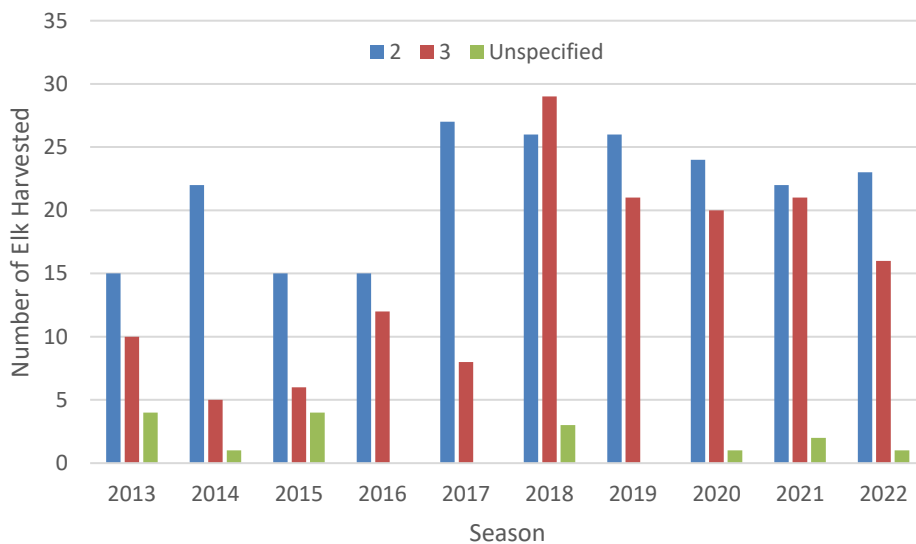


Figure 9. Elk harvest in Kansas by management unit since 2013.



Figure 10. Elk harvest in Kansas by property type since 2013.

Satisfaction - Elk hunters are asked to indicate their hunt satisfaction on a 7–point scale ranging from extremely dissatisfied to extremely satisfied. This serves as a general indicator of hunt quality likely reflecting harvest success, elk numbers, bull quality, access, crowding and various other factors of the hunt. Mean satisfaction by permit type since 2016 is found in Figure 11. Also an indication of satisfaction, elk hunter comments from the harvest survey are provided in Appendix 2.

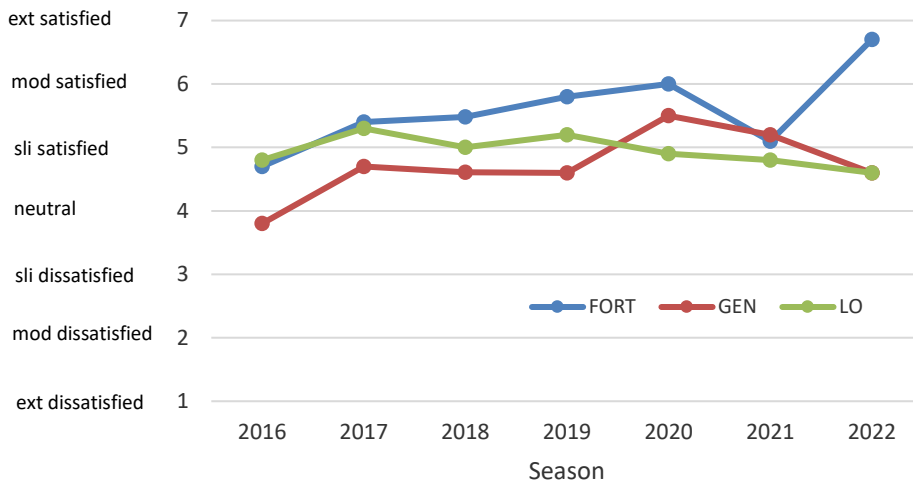


Figure 11. Mean elk hunter satisfaction by permit type in Kansas since 2016. (FORT=Fort Riley, GEN=general resident and LO=landowner/tenant)

EQUAL OPPORTUNITY STATEMENT

This program receives Federal financial assistance from the U.S. Fish and Wildlife Service. Under Title VI of the Civil Rights Act of 1964, Section 504 of the Rehabilitation Act of 1973, Title II of the Americans with Disabilities Act of 1990, the Age Discrimination Act of 1975, and Title IX of the Education Amendments of 1972, the U.S. Department of the Interior and its bureaus prohibit discrimination on the basis of race, color, national origin, age, disability or sex (in educational programs). If you believe that you have been discriminated against in any program, activity or facility, or if you desire further information, please write to:
 The U.S. Fish and Wildlife Service, Office of Diversity and Civil Rights Programs- External Programs, 4040 North Fairfax Drive, Suite 130, Arlington, VA 22203 |

Appendix 1.

2022-23 Elk Hunter Report Card

2022-23 ELK HUNTER REPORT CARD



Please complete this report as soon as you are finished elk hunting for the season. It should be returned in the enclosed tooth envelope. All "b" sections pertain only to those who harvested an elk.

1a. Check the one item that best describes your elk season.

- I harvested an adult bull
- I harvested an adult cow
- I harvested a male calf
- I harvested a female calf
- I hunted but did not harvest an elk
- I did not hunt (If you did not hunt, please check here, sign and return this form.)

b. If you harvested a bull, how many points did it have, for example 5x6?

2a. Describe your elk hunting during each month?

	Days Hunted	Largest Number of Elk Seen in a Day
August	_____	_____
September	_____	_____
October	_____	_____
November	_____	_____
December	_____	_____
January	_____	_____
February	_____	_____
March	_____	_____

b. If you killed an elk, what was the date? _____ (see calendar on back of page)

3a. Check each land ownership type that you used while hunting for elk.

- Fort Riley
- Public Hunting Areas (i.e. Milford Wildlife Area)
- Walk-In Hunting Area (WIHA) Lands
- Your Property (you own or lease for ag)
- Private Hunting Lease
- Other Private Property

b. Circle the land ownership above that shows where you killed your elk. (see map on back of page).




County: _____ **Elk Unit (2 or 3):** _____

4a. Check each type of hunting equipment you used while hunting elk.

- Centerfire Rifle
- Muzzleloader
- Shotgun
- Compound Bow
- Crossbow
- Long Bow
- Recurve Bow
- Other (list below): _____

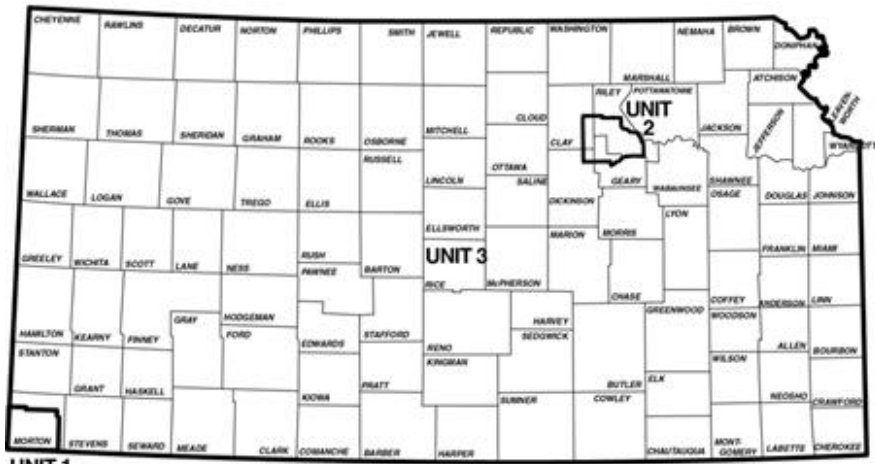
b. Circle the equipment type above that you used to kill your elk.

5. Check the selection that best describes your satisfaction with your elk hunt.

- | | | | | | | |
|---|---|---|--------------------------|--------------------------|--------------------------|--------------------------|
|  |  |  | | | | |
| Extremely Dissatisfied | Moderately Dissatisfied | Slightly Dissatisfied | Neutral | Slightly Satisfied | Moderately Satisfied | Extremely Satisfied |
| <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

6. Name: _____

Elk Units



UNIT 1 Unit 1 is closed to elk [hunting](#)



SEASONS OUTSIDE FORT RILEY (STATEWIDE EXCEPT MORTON COUNTY)

Muzzleloader Season: Sept 1 – 30, 2022
Archery Season: Sept 12 – Dec 31, 2022
Firearm Season: Aug 1 – 31, 2022 and Nov 30 – Dec 11, 2022 and Jan 1 – Mar 15, 2023

SEASONS ON FORT RILEY

Muzzleloader & Archery Season: Sept 1 – 30, 2022
Season for Any-Elk Permit Holders: Dec 31, 2022
Antlerless Only Segments: First Segment Oct 1-31, 2022
 Second Segment Nov 1-30, 2022
 Third Segment Dec 1-31, 2022

August						
Su	M	Tu	W	Th	F	Sa
	1	2	3	4	5	6
7	8	9	10	11	12	13
14	15	16	17	18	19	20
21	22	23	24	25	26	27
28	29	30	31			

September						
Su	M	Tu	W	Th	F	Sa
				1	2	3
4	5	6	7	8	9	10
11	12	13	14	15	16	17
18	19	20	21	22	23	24
25	26	27	28	29	30	

October						
Su	M	Tu	W	Th	F	Sa
						1
2	3	4	5	6	7	8
9	10	11	12	13	14	15
16	17	18	19	20	21	22
23	24	25	26	27	28	29
30	31					

November						
Su	M	Tu	W	Th	F	Sa
					1	2
3	4	5	6	7	8	9
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28	29	30

December						
Su	M	Tu	W	Th	F	Sa
					1	2
3	4	5	6	7	8	9
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28	29	30
31						

January						
Su	M	Tu	W	Th	F	Sa
1	2	3	4	5	6	7
8	9	10	11	12	13	14
15	16	17	18	19	20	21
22	23	24	25	26	27	28
29	30	31				

February						
Su	M	Tu	W	Th	F	Sa
			1	2	3	4
5	6	7	8	9	10	11
12	13	14	15	16	17	18
19	20	21	22	23	24	25
26	27	28				

March						
Su	M	Tu	W	Th	F	Sa
			1	2	3	4
5	6	7	8	9	10	11
12	13	14	15	16	17	18
19	20	21	22	23	24	25
26	27	28	29	30	31	

Appendix 2.

Elk Hunter Comments from the
2022-23 Elk Hunter Harvest Survey

COMMENTS

Between the neighbors dogs, trespassers, and poachers, I did not see a single Elk on my property even on trail cameras. I don't know if I'll even buy a tag next year unless things improve.

Bull Elk was tearing my corn bad. Using corn to rub off velvet. I didn't see him after I bought a tag. I should have been able to kill immediately. It did approximately \$1000.00 damage to my property.

Elk are becoming pests in my area. They destroy feeders & cameras any chance they get. Push deer out. Over \$15m in damages.

Great year. We have a good herd of elk. My son had 11 bulls and 30-40 cows under and around him hunting deer one day.

I got a young bull on my trail cam in Oct but never actually saw him.

I have plenty of elk that pass through my property. They are just never there when I am and vice-versa.

In order for the elk numbers in (withheld) County to increase I would like to see that there be no season on them even for landowners for a 2 - 3 year period.

I feel that the numbers have declined in the past two years over what I was seeing in 2018 - 2020.

It is great to be able to hunt elk in Kansas. Would love to see more opportunities - let the herds grow a bit. I understand the challenge with farms and highways, but other states seem to manage this issue. Thanks for all you do!

"Keeps getting better each year. Continue to try to grow the herd. Possibly go 2 years with no cow kills allowed?"

Mailed teeth and tissue sample. Forgot to include report card so submitting online. Weather this weekend was unseasonably warm so not a lot of movement — elk or deer. If I had more time to hunt would have waited for a bull. However, still very happy with result. She weighed ~300lbs field dressed.

Maybe a calf, it wasn't that big.

No real comment. It was an awesome opportunity! I shot my elk on my second trip out to Fort Riley. He was bugling like crazy. It all happened so fast that I didn't get more of a chance to see more of the Fort while I was out there! Forever grateful! Thank you

Saw 1 elk right at dark for about 10 seconds. Bought a tag, never saw her again, lol!

Saw a 4x4 bull on property I hunt in (withheld) County for about a week in November. I got a shot at him but unfortunately missed. After the miss I did not and have not seen him again.

Saw one cow on deer camera tried to hunt it only showed up during night non shooting hours

So sorry I am unable to supply teeth or DNA

Trail cameras I had set on our property recorded elk 25 days from April 15 through December 10. I identified 5 individual bulls, approximately 6 or 7 cows I think, and 3 different calves. Only 7 days had daytime photographs. I primarily bowhunted deer but purchased an elk tag in case elk ever approached within range. I never personally observed elk while hunting. I first obtained photographs of elk in this pasture in 2016 and getting pictures every year since then. Numbers have increased every year. Great treat to see them.

We had cattle on our farm all winter. Probably ruined the hunting this year.