

**GREEN RIVER REGION
TABLE OF CONTENTS**

Pronghorn

Sublette.....1
Uinta-Cedar Mountain.....5
South Rock Springs.....8
Bitter Creek..... 10
Carter Lease.....12
Baggs.....15

Mule Deer

Uinta.....17
South Rock Springs.....20
Baggs.....22

Elk

Uinta.....31
South Rock Springs.....34
Sierra Madre.....36
Steamboat.....39
West Green River.....42
Petition.....46

Moose

Uinta.....48
Lincoln.....51

2019 - JCR Evaluation Form

SPECIES: Pronghorn

PERIOD: 6/1/2019 - 5/31/2020

HERD: PR401 – SUBLETTE

HUNT AREAS: 85-93, 96, 101, 107

PREPARED BY: PATRICK BURKE

	<u>2014 - 2018 Average</u>	<u>2019</u>	<u>2020 Proposed</u>
Population:	34,960	35,100	36,100
Harvest:	3,079	2,916	2,840
Hunters:	3,215	2,974	2,900
Hunter Success:	96%	98%	98 %
Active Licenses:	3,625	3,395	3,300
Active License Success:	85%	86%	86 %
Recreation Days:	10,916	9,982	10,000
Days Per Animal:	3.5	3.4	3.5
Males per 100 Females	56	48	
Juveniles per 100 Females	63	56	

Population Objective (± 20%) : 48000 (38400 - 57600)

Management Strategy: Recreational

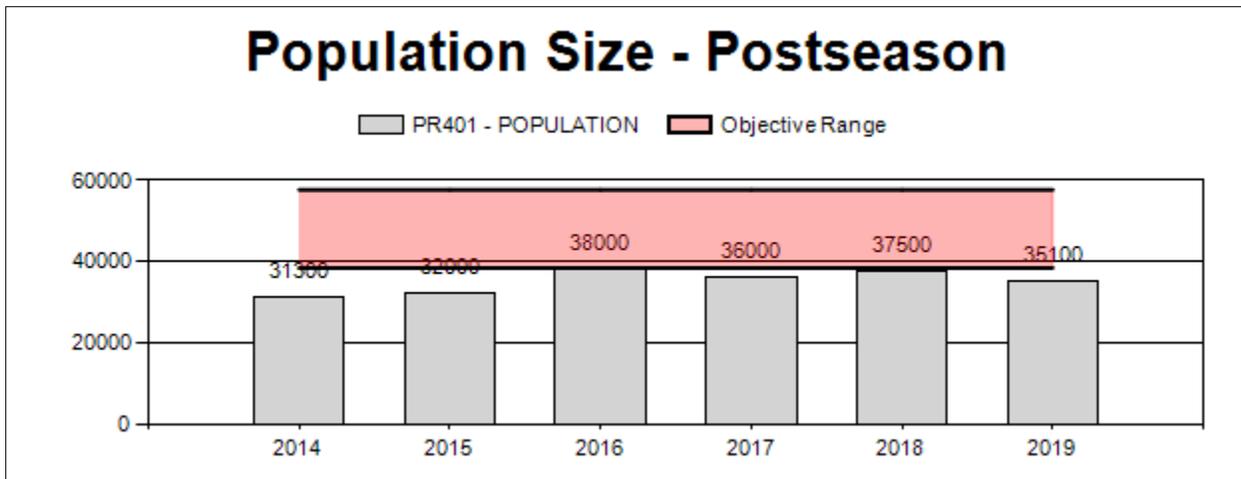
Percent population is above (+) or below (-) objective: -26.9%

Number of years population has been + or - objective in recent trend: 9

Model Date: 2/18/2020

Proposed harvest rates (percent of pre-season estimate for each sex/age group):

	<u>JCR Year</u>	<u>Proposed</u>
Females ≥ 1 year old:	6%	6%
Males ≥ 1 year old:	20%	20%
Total:	8%	7%
Proposed change in post-season population:	3%	3%



**2020 Hunting Seasons
Sublette Pronghorn Herd (PR401)**

Hunt Area	Type	Archery Dates		Season Dates		Quota	Limitations
		Opens	Closes	Opens	Closes		
85	1	Aug. 15	Sept. 9	Sept. 10	Oct. 31	20	Any antelope
86	1	Aug. 15	Sept. 9	Sept. 10	Oct. 31	50	Any antelope
86	6	Aug. 15	Sept. 9	Sept. 10	Oct. 31	25	Doe or fawn
87	1	Aug. 15	Sept. 9	Sept. 10	Oct. 31	175	Any antelope
87	2	Aug. 15	Sept. 9	Sept. 25	Oct. 31	125	Any antelope
87	6	Aug. 15	Sept. 9	Sept. 10	Oct. 31	100	Doe or fawn
87	7	Aug. 15	Sept. 9	Sept. 25	Oct. 31	100	Doe or fawn
88	1	Aug. 15	Sept. 9	Sept. 10	Oct. 31	275	Any antelope
88	6	Aug. 15	Sept. 9	Oct. 1	Oct. 31	300	Doe or fawn
89	1	Aug. 15	Sept. 9	Sept. 10	Oct. 31	175	Any antelope
89	2	Aug. 15	Sept. 9	Oct. 10	Oct. 31	125	Any antelope
89	6	Aug. 15	Sept. 9	Oct. 1	Oct. 31	325	Doe or fawn
89	6			Nov. 1	Nov. 15		Doe or fawn valid south of Middle Piney Creek and south of Wyoming Highway 351
89	7	Aug. 15	Sept. 9	Sept. 1	Nov. 15	75	Doe or fawn valid south of Middle Piney Creek and south of Wyoming Highway 351
90	1	Aug. 15	Sept. 9	Sept. 10	Oct. 31	150	Any antelope

90	6	Aug. 15	Sept. 9	Sept. 10	Oct. 31	50	Doe or fawn
90	8	Aug. 15	Sept. 9	Aug. 15	Sept. 9	50	Doe or fawn valid on private land
91	1	Aug. 15	Sept. 9	Sept. 10	Oct. 31	275	Any antelope
91	6	Aug. 15	Sept. 9	Sept. 10	Oct. 31	100	Doe or fawn
91	7	Aug. 15	Sept. 9	Aug. 15	Oct. 31	50	Doe or fawn valid on private land and Bureau of Reclamation land within Sweetwater County
92	1	Aug. 15	Sept. 9	Sept. 10	Oct. 31	200	Any antelope
92	7	Aug. 15	Sept. 9	Aug. 15	Nov. 30	150	Doe or fawn valid within the Farson-Eden Irrigation Project
93	1	Aug. 15	Sept. 9	Sept. 10	Oct. 31	400	Any antelope
93	6	Aug. 15	Sept. 9	Sept. 10	Oct. 31	25	Doe or fawn
93	7	Aug. 15	Sept. 9	Oct. 1	Nov. 30	100	Doe or fawn valid on private irrigated land
96	1	Aug. 15	Sept. 9	Sept. 10	Oct. 31	50	Any antelope
96	7	Aug. 15	Sept. 9	Sept. 10	Oct. 31	100	Doe or fawn valid within the Farson-Eden Irrigation Project or west of the Blue Rim (Sweetwater County Road 5) and Old Stauffer Roads (Sweetwater County Road 7) and south of the OCI Entrance Road (Sweetwater County Road 6) and

							east of the Green River; also valid in that portion of Area 101 within the Farson-Eden Irrigation Project
101	1	Aug. 15	Sept. 9	Sept. 10	Oct. 31	100	Any antelope
107	1	Aug. 15	Sept. 9	Sept. 10	Oct. 31	100	Any antelope
107	6	Aug. 15	Sept. 9	Sept. 10	Oct. 31	50	Doe or fawn
107	0	Aug. 15	Sept. 9	Aug. 20	Sept. 9	25	Any antelope, muzzleloading firearms and handguns only

2019 Hunter Satisfaction: 92.0% Satisfied, 5.4% Neutral, 2.6% Dissatisfied

2020 Management Summary

1.) Hunting Season Evaluation: The 2020 season is nearly identical to previous year’s structure. The only changes for 2020 are a slight reduction in both Type 1 and Type 6 licenses in HA90, a slight increase in HA92 Type 7 licenses, and a minor modification to the boundary of the HA96 Type 7 licenses. Area 107 seasons are also being aligned with the remainder of the herd unit. Changes to the HA92 and 96 Type 7 licenses are proposed to help better address numbers of pronghorn living in agricultural alfalfa fields, both in the Farson-Eden area and along the Green River.

The 2020 season should result in approximately 2,850 pronghorn being harvested (1,750 bucks, 1,000 does and 90 fawns), assuming similar success rates to previous seasons. This level of harvest, particularly doe harvest will keep this population under its objective of 48,000 pronghorn, but should allow for some minimal growth. Managers in the more productive portions of the herd are going to need to moderate harvest pressure in the future if the current objective is to be met, or managers are going to have to consider lowering the objective. The size of the herd, coupled with the need to address very localized damage concerns has impacted the ability of this herd to recover to former numbers and the objective.

2019 - JCR Evaluation Form

SPECIES: Pronghorn

PERIOD: 6/1/2019 - 5/31/2020

HERD: PR411 - UINTA-CEDAR MOUNTAIN

HUNT AREAS: 95, 99

PREPARED BY: JEFF SHORT

	<u>2014 - 2018 Average</u>	<u>2019</u>	<u>2020 Proposed</u>
Population:	6,647	5,945	5,629
Harvest:	871	825	745
Hunters:	913	1,015	950
Hunter Success:	95%	81%	78 %
Active Licenses:	1,005	1,148	1,000
Active License Success:	87%	72%	74 %
Recreation Days:	3,559	4,089	3,500
Days Per Animal:	4.1	5.0	4.7
Males per 100 Females	60	48	
Juveniles per 100 Females	53	31	

Population Objective (± 20%) : 10000 (8000 - 12000)

Management Strategy: Recreational

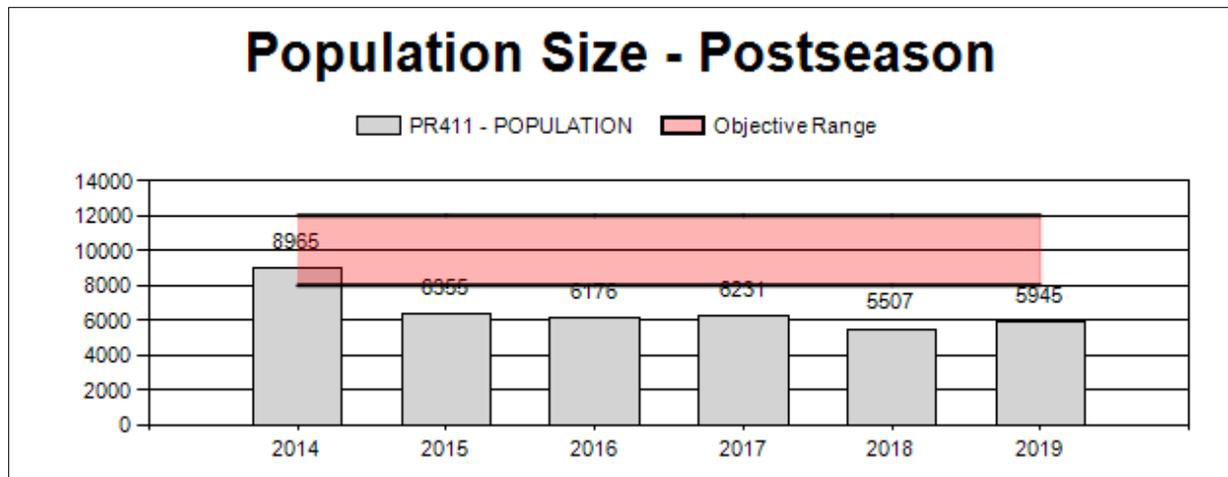
Percent population is above (+) or below (-) objective: -40.6%

Number of years population has been + or - objective in recent trend: 5

Model Date: 02/23/2020

Proposed harvest rates (percent of pre-season estimate for each sex/age group):

	<u>JCR Year</u>	<u>Proposed</u>
Females ≥ 1 year old:	6.2%	5.7%
Males ≥ 1 year old:	29%	33.7%
Total:	12%	11.6%
Proposed change in post-season population:	-12.2%	-5.3%



2020 HUNTING SEASONS

Uinta-Cedar Mountain Herd Unit (PR411)

Hunt Area	Hunt Type	Archery Dates		Season Dates		Quota	Limitations
		Opens	Closes	Opens	Closes		
95	1	Aug. 15	Sept. 9	Sep. 10	Oct. 31	325	Any antelope
95	7			Aug. 15	Oct. 31	75	Doe or fawn valid on irrigated land
99	1	Aug. 15	Sept. 9	Sep. 10	Oct. 31	200	Any antelope
99	2			Aug. 15	Nov. 30	125	Any antelope valid north and west of Wyoming Highway 410 and west of Uinta County Road 271
99	6	Aug. 15	Sept. 9	Sep. 10	Oct. 31	25	Doe or fawn
99	7			Aug. 15	Nov. 30	150	Doe or fawn valid north and west of Wyoming Highway 410 and west of Uinta County Road 271
99	8			Aug. 15	Oct. 31	50	Doe or fawn valid east of Cottonwood Creek on irrigated land
99	0			Sep. 1	Oct. 31	25	Any antelope, muzzle-loading firearms only

2019 Hunter Satisfaction: 80.5% Satisfied, 12.3% Neutral, 7.3% Dissatisfied

2020 Management Summary

1.) Hunting Season Evaluation:

Increasingly conservative seasons continue to be warranted in this herd due to reduced productivity and increased mortality. Recent pressure to alleviate damage, coupled with dry summers and difficult winters (and the corresponding reduction in production and increase in weather driven mortality) have resulted in dramatically reduced pronghorn numbers in this herd, well below objective. Where possible (outside of damage zones) we are moderating harvest. We will continue to maintain some pressure on antelope causing damage on private irrigated lands but will reduce those licenses in 2020 due to much lower landowner complaints and lower numbers of antelope in those areas.

Area 95 is the least productive area in the herd, but tends to produce the largest bucks and is a favorite of local pronghorn hunters. We offer Hunt Area 95 type 7 (irrigated land only) licenses to alleviate damage issues on key parcels. We will maintain some pressure on antelope causing damage on private irrigated lands but will reduce those licenses in 2020 due to much lower landowner complaints and lower numbers of antelope in those areas.

Area 99 is much more productive but has significant damage complaints. In Hunt Area 99, we propose to reduce any antelope harvest slightly to account for low yearling buck:doe ratios

observed since 2017. This low recruitment will likely result in reduced overall buck:doe ratios in the future barring this reduction. We will continue to allow for lower doe/fawn harvest in the public land portions of area 99 to help that population segment rebound. We propose to continue to offer a type 7 doe/fawn hunt in a portion of Area 99 to target specific depredation problems on the west side of the hunt area. This is largely private land. We will decrease those permits in 2020 to address hunter crowding and due to reduced antelope numbers. We also have a type 2 hunt that correspond with the type 7s that directs harvest to bucks in the same area. We propose to reduce those to address hunter crowding and due to reduced antelope numbers

We are also continuing to provide additional doe/fawn licenses (Type 8) in Area 99 to address damage issues in the eastern portion of the area on irrigated lands. But will reduce these given reduced antelope numbers and reduced complaints. Doe/fawn license reductions should help us in our efforts to move this population toward objective. Reductions in any antelope licenses should maintain or improve buck:doe ratios.

2.) Management Objective: The Uinta-Cedar Mountain pronghorn herd objective is a post-season population objective of 10,000 and recreational management. This appears to be about the number of pronghorn that the area can support without significant damage concerns and without issues on limited winter ranges in Area 99. The Herd unit objective and management strategy were last revised in 2014. We went through an internal review of the objective and harvest strategy in early 2019.

3.) Winter Severity: We have had 3 severe winters in this herd in the last 4 years (2016-17, 2018-19, and 2019-20). Impacts to pronghorn (weather related) are less in this area than for mule deer. Pronghorn in this herd generally have the ability to migrate to lower elevation flats during severe winters, but this is increasingly challenging. We have had several large scale mortality events involving motor vehicles during the past few years. Movements of pronghorn in this area have become more difficult as human development and disturbance impedes movement corridors and annual migration.

4.) Line Transect Surveys: Population estimates with the Line Transect survey technique are very important for providing adequate data to model antelope herd populations. Without performing these surveys periodically, it is unlikely that the population models can perform reliably. We have not had the budget to conduct line transect surveys in this herd since 2014. This makes our current model estimates less reliable.

2019 - JCR Evaluation Form

SPECIES: Pronghorn

PERIOD: 6/1/2019 - 5/31/2020

HERD: PR412 - SOUTH ROCK SPRINGS

HUNT AREAS: 59, 112

PREPARED BY: PATRICK BURKE

	<u>2014 - 2018</u> <u>Average</u>	<u>2019</u>	<u>2020 Proposed</u>
Population:	7,475	5,050	4,800
Harvest:	362	435	388
Hunters:	391	474	425
Hunter Success:	93%	92%	91 %
Active Licenses:	406	496	450
Active License Success:	89%	88%	86 %
Recreation Days:	1,284	1,381	1,300
Days Per Animal:	3.5	3.2	3.4
Males per 100 Females	47	46	
Juveniles per 100 Females	53	20	

Population Objective ($\pm 20\%$) : 6500 (5200 - 7800)

Management Strategy: Recreational

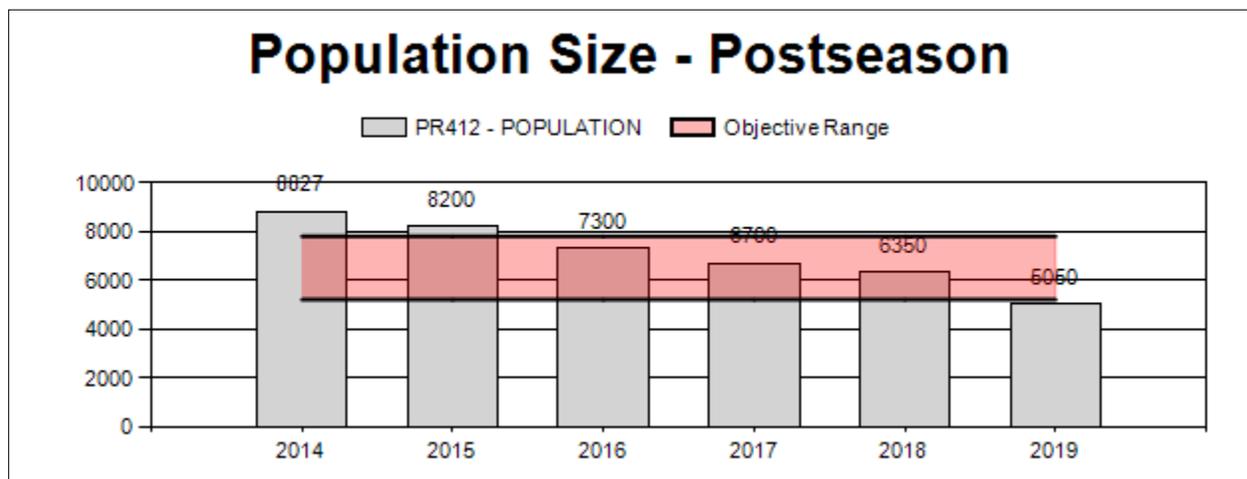
Percent population is above (+) or below (-) objective: -22.3%

Number of years population has been + or - objective in recent trend: 3

Model Date: 2/19/2020

Proposed harvest rates (percent of pre-season estimate for each sex/age group):

	<u>JCR Year</u>	<u>Proposed</u>
Females ≥ 1 year old:	3%	2%
Males ≥ 1 year old:	29%	40%
Total:	7%	7%
Proposed change in post-season population:	-7%	-8%



**2020 Hunting Seasons
South Rocks Springs Pronghorn Herd (PR412)**

Hunt Area	Type	Archery Dates		Season Dates		Quota	Limitations
		Opens	Closes	Opens	Closes		
59	1	Aug. 15	Sept. 19	Sept. 20	Oct. 31	300	Any antelope
59	6	Aug. 15	Sept. 19	Sept. 20	Oct. 31	25	Doe or fawn
112	1	Aug. 15	Sept. 19	Sept. 20	Oct. 31	100	Any antelope
112	6	Aug. 15	Sept. 19	Sept. 20	Oct. 31	25	Doe or fawn

2019 Hunter Satisfaction: 91.5% Satisfied, 4.9% Neutral, 3.5% Dissatisfied

2020 Management Summary

1.) Hunting Season Evaluation: The 2020 season is more conservative than has been offered in recent years in this herd unit. Following several years of increased productivity and the herd exceeding its population objective, poor fawn recruitment and increased doe harvest the last several years have resulted in intentional herd reduction since 2015. The model estimated post-season population size for the South Rock Springs pronghorn herd following the 2019 season is a little over 5,000 animals, which is approximately 20% below its population objective. This indicates reduced pronghorn harvest, especially for females, is warranted. Given recent observed fawn ratios and the expected harvest in 2020, the model predicts a slight continued decline in the post-season population following the 2020 season. Therefore, a reduction in doe harvest in 2020 should slow this decline, but may not be enough to move the herd back toward objective without increased fawn survival and recruitment.

2019 - JCR Evaluation Form

SPECIES: Pronghorn

PERIOD: 6/1/2019 - 5/31/2020

HERD: PR414 - BITTER CREEK

HUNT AREAS: 57-58

PREPARED BY: PHILIP DAMM

	<u>2014 - 2018 Average</u>	<u>2019</u>	<u>2020 Proposed</u>
Population:	12,664	11,076	12,000
Harvest:	402	531	500
Hunters:	410	572	550
Hunter Success:	98%	93%	91 %
Active Licenses:	442	609	575
Active License Success:	91%	87%	87 %
Recreation Days:	1,485	2,073	2,000
Days Per Animal:	3.7	3.9	4
Males per 100 Females	57	60	
Juveniles per 100 Females	43	32	

Population Objective ($\pm 20\%$) : 13000 (10400 - 15600)

Management Strategy: Special

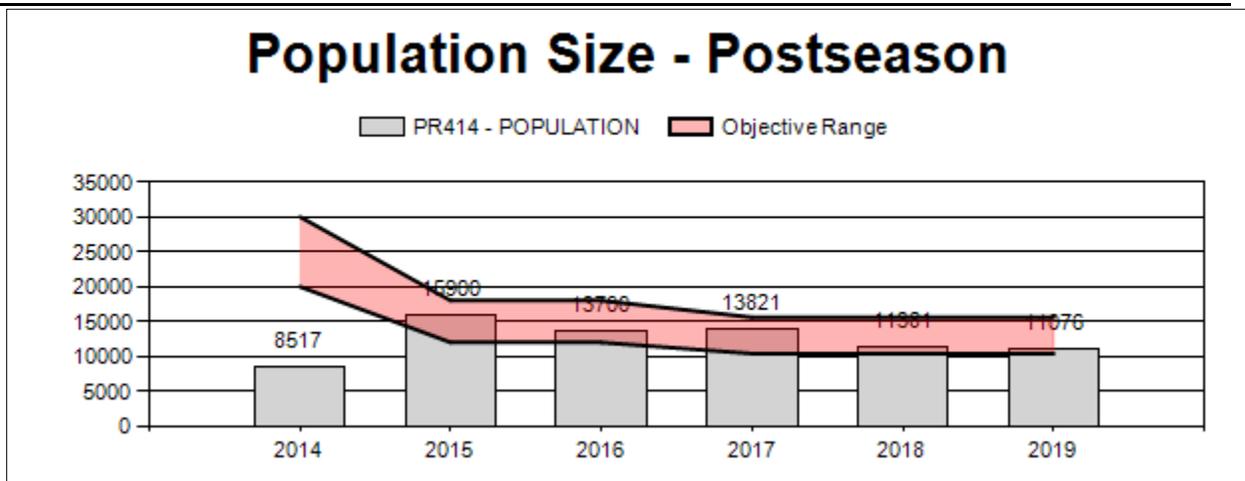
Percent population is above (+) or below (-) objective: -14.8%

Number of years population has been + or - objective in recent trend: 0

Model Date: 02/10/2020

Proposed harvest rates (percent of pre-season estimate for each sex/age group):

	<u>JCR Year</u>	<u>Proposed</u>
Females ≥ 1 year old:	0%	0%
Males ≥ 1 year old:	0%	0%
Total:	0%	0%
Proposed change in post-season population:	10%	10%



**2020 Hunting Seasons
Bitter Creek Antelope Herd Unit (PR414)**

Hunt Area	Type	Archery Dates		Season Dates		Quota	Limitations
		Opens	Closes	Opens	Closes		
57	1	Aug. 15	Sep. 19	Sep. 20	Oct. 31	400	Any antelope
57	2	Aug. 15	Sep. 19	Sep. 20	Oct. 31	25	Any antelope valid west of Sweetwater County Road 23S and BLM Road 3310, and north and east of BLM Roads 4411 and 4409.
57	6	Aug. 15	Sep. 19	Sep. 20	Oct. 31	50	Doe or fawn
57	7	Aug. 15	Aug. 31	Sep. 1	Oct. 31	25	Doe or fawn valid on private land within one (1) mile of Carbon County Road 603.
58	1	Aug. 15	Sep. 19	Sep. 20	Oct. 31	100	Any antelope

2019 Hunter Satisfaction: 90% Satisfied, 6% Neutral, 4% Dissatisfied

2020 Management Summary

1.) Hunting Season Evaluation: The Bitter Creek pronghorn herd was modeled within the objective range (set at 13,000 in 2015), although estimates were at the low end of the range in both 2018 and 2019. In the past 5 years, the herd experienced two severe winters, an extreme drought in 2018, and feral horse populations an order of magnitude over objective. These issues resulted in very poor fawn recruitment (25 and 32 fawns per 100 does, respectively, compared to a previous five year average of around 50) and possibly lower overall adult survival. Annual weather patterns, and limitations in availability and quality/quantity of habitat, have been limiting growth in this population for the last couple years, not minimal doe harvest. Buck ratios remained within objective, but at the low end of the range for the herd; however, disparity was apparent between the hunt areas. Buck ratios in western portions of the herd (HA58) were lower at 51 than the eastern portions (HA57) at 68. As a result of these issues outside of managers' influence, decreases to doe/fawn and HA58 license types were proposed for 2020. Seasons are likely to remain conservative in this herd unit until fawn production and recruitment return to higher levels.

2.) Management Objective Review: In 2020, population, weather, and habitat data were reviewed for the Bitter Creek pronghorn herd. After internal review, managers determined that issues with population performance were due to short-term weather trends that affected habitat quantity/quality and availability, i.e. drought and winter severity, respectively, and not any long-term changes. As a result of this assessment and the effectiveness of additional license types at addressing private land damage issues, managers did not propose any changes to existing objectives in 2020.

2019 - JCR Evaluation Form

SPECIES: Pronghorn

PERIOD: 6/1/2019 - 5/31/2020

HERD: PR419 - CARTER LEASE

HUNT AREAS: 94, 98, 100

PREPARED BY: JEFF SHORT

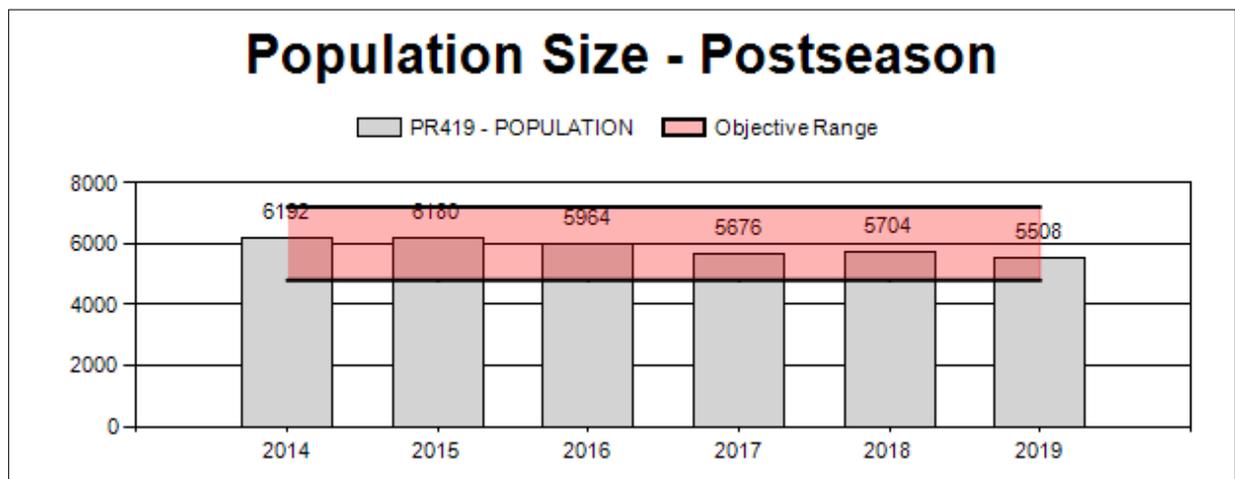
	<u>2014 - 2018 Average</u>	<u>2019</u>	<u>2020 Proposed</u>
Population:	5,943	5,508	5,512
Harvest:	1,419	1,479	1,350
Hunters:	1,463	1,670	1,400
Hunter Success:	97%	89%	96 %
Active Licenses:	1,656	1,848	1,500
Active License Success:	86%	80%	90 %
Recreation Days:	5,398	6,590	6,000
Days Per Animal:	3.8	4.5	4.4
Males per 100 Females	58	55	
Juveniles per 100 Females	66	52	

Population Objective (± 20%) : 6000 (4800 - 7200)

Management Strategy: Recreational
 Percent population is above (+) or below (-) objective: -8.2%
 Number of years population has been + or - objective in recent trend: 3
 Model Date: 02/23/2020

Proposed harvest rates (percent of pre-season estimate for each sex/age group):

	<u>JCR Year</u>	<u>Proposed</u>
Females ≥ 1 year old:	14.3%	14.3%
Males ≥ 1 year old:	28.7%	28.7%
Total:	13.2%	11.3%
Proposed change in post-season population:	-4.1%	.1%



2020 HUNTING SEASONS

Carter Lease Herd Unit (PR419)

Hunt Area	Hunt Type	Archery Dates		Season Dates		Quota	Limitations
		Opens	Closes	Opens	Closes		
94	1	Aug. 15	Sept. 9	Sept. 10	Oct. 31	500	Any antelope
94	6	Aug. 15	Sept. 9	Sept. 10	Oct. 31	100	Doe or fawn
94	7			Aug. 15	Oct. 31	200	Doe or fawn valid on or within one (1) mile of irrigated land
98	1	Aug. 15	Sept. 9	Sept. 10	Oct. 31	150	Any antelope
98	6	Aug. 15	Sept. 9	Sept. 10	Oct. 31	150	Doe or fawn
98	7	Aug. 15	Sept. 9	Nov. 1	Nov. 30	50	Doe or fawn valid within the Smiths Fork drainage
100	1	Aug. 15	Sept. 9	Sept. 10	Oct. 31	350	Any antelope
100	6	Aug. 15	Sept. 9	Sept. 10	Oct. 31	250	Doe or fawn

2019 Hunter Satisfaction: 80.7% Satisfied, 12.5% Neutral, 6.7% Dissatisfied

2020 Management Summary

1.) Hunting Season Evaluation: All areas in the herd unit have continued significant hunting opportunity. In all hunt areas, we propose to maintain similar numbers of type 1 licenses to maintain that opportunity. However, we propose quota changes in some doe/fawn license types issued in the herd unit to address increased mortality or reduced production. According to the model we are now slightly below objective in Hunt Area 94 but well within the 20% range. We propose to reduce Hunt Area 94 type 6 doe/fawn licenses to account for lower fawn production over the last 2 years. We are also reducing type 7 licenses to address hunter crowding and due to reduced antelope numbers on irrigated lands.

We are striving to maintain very low antelope densities in Areas 98 and 100 since this is a primary winter range for Wyoming Range mule deer. We hunt antelope very aggressively in these hunt areas to try to keep numbers low. We are seeing reduced hunter success on the type 6 hunts in those areas so we are reducing them to improve success and maintain good hunter satisfaction.

2.) Management Objective Review: The Carter Lease Herd Unit is up for objective review in 2020. After an internal review we are maintaining this herd at the current objective and management strategy. This is based on internal discussions and conversations with our constituents. We evaluated and considered population status and public opinion and a change is not warranted at this time. We will review this herd objective again in 2025.

3.) Winter Severity: We have had 3 severe winters in this herd in the last 4 years (2016-17, 2018-19, and 2019-20). Typically, pronghorn are less affected by winter conditions due to their ability to move and willingness to move to areas of more moderate conditions. Pronghorn in this herd generally have the ability to migrate to lower elevation flats during severe winters, but this is increasingly challenging. These crucial winter range movements become more difficult as human development and disturbance impedes those migration routes. Fencing and highways are particularly problematic for this population during more severe winters.

4.) Line Transect Surveys: Population estimates with the Line Transect survey technique are very important for providing adequate data to model antelope herd populations. Without performing these surveys periodically, it is unlikely that the population models can perform reliably. We have not had the budget to conduct line transect surveys in this herd since 2013. This makes our current model estimates questionable.

5.) Population Modeling: A total Herd Unit model is not feasible in this herd. This is due to much different population parameters in Hunt Areas 98 and 100 compared to Hunt Area 94. Additionally the line transect survey method does not fit with hunt areas 98 and 100. It makes sense to model Hunt Area 94 only. The HA 94 population model is used for JCR reporting. Herd unit population estimates are reported as the HA94 model plus 1,000 animals to account for the populations we are unable to model in HA 98 and 100. In the future it will be imperative that we obtain a reliable population estimate periodically through line transect surveys to check the status of the herd and anchor the model.

2019 - JCR Evaluation Form

SPECIES: Pronghorn

PERIOD: 6/1/2019 - 5/31/2020

HERD: PR438 - BAGGS

HUNT AREAS: 53, 55

PREPARED BY: PHILIP DAMM

	<u>2014 - 2018 Average</u>	<u>2019</u>	<u>2020 Proposed</u>
Population:	8,200	6,171	7,000
Harvest:	448	707	350
Hunters:	417	742	375
Hunter Success:	107%	95%	93%
Active Licenses:	492	832	400
Active License Success:	91%	85%	88%
Recreation Days:	1,210	2,276	1,100
Days Per Animal:	2.7	3.2	3.1
Males per 100 Females	59	50	
Juveniles per 100 Females	55	44	

Population Objective ($\pm 20\%$) : 9000 (7200 - 10800)

Management Strategy: Recreational

Percent population is above (+) or below (-) objective: -31.4%

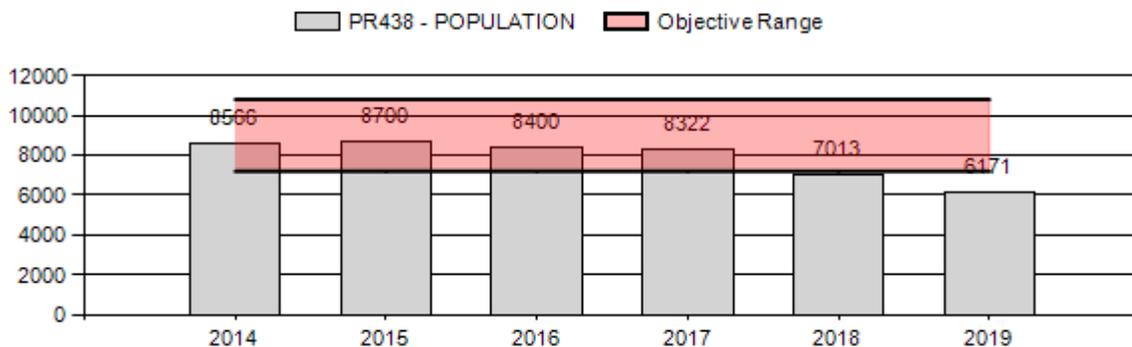
Number of years population has been + or - objective in recent trend: 2

Model Date: 02/28/2020

Proposed harvest rates (percent of pre-season estimate for each sex/age group):

	<u>JCR Year</u>	<u>Proposed</u>
Females ≥ 1 year old:	9%	3%
Males ≥ 1 year old:	22%	16%
Total:	10%	6%
Proposed change in post-season population:	0%	0%

Population Size - Postseason



**2020 Hunting Seasons
Baggs Pronghorn Herd Unit (PR438)**

Hunt Area	Type	Archery Dates		Season Dates		Quota	Limitations
		Opens	Closes	Opens	Closes		
53	1	Aug. 15	Sep. 19	Sep. 20	Oct. 31	150	Any antelope
53	6	Aug. 15	Sep. 19	Sep. 20	Oct. 31	25	Doe or fawn
53	7	Aug. 15	Aug. 31	Sep. 1	Oct. 31	50	Doe or fawn valid on private land
55	1	Aug. 15	Sep. 19	Sep. 20	Oct. 31	125	Any antelope

2019 Hunter Satisfaction: 90% Satisfied, 7% Neutral, 3% Dissatisfied

2020 Management Summary

1.) Hunting Season Evaluation: The Baggs pronghorn herd has modeled below the objective range for the past two years. The herd experienced two above average winters in terms of severity along with extreme drought in 2018 that resulted in fawn productivity significantly below past averages and likely lower overall adult survival. Though spring came fairly early, early-mid winter snow accumulation along Highway 789, where a significant portion of this herd winters, was extreme. As a result pronghorn also displayed some extreme movement behavior. Significant numbers were observed sharing juniper winter ranges with mule deer off Weber Mesa, using mule deer highway underpasses, and migrating south across the Little Snake River floodplain east of Baggs and into Colorado. Even at the end of the 2019 JCR year, some of these migrants into Colorado were still having difficulty returning to summer ranges in Wyoming due to woven wire fences and crossing Highway 70 and the floodplain.

Slightly lower buck ratios than past averages were attributed to recent increases to “any antelope” license types, but current year’s ratios were still solidly within the recreational objective. Annual weather patterns, and limitations in availability and quality/quantity of habitat, have been driving this population for the last 3 years, not harvest. As a result of all previously mentioned issues with population performance, significant decreases to all license types were proposed for 2020. These decreases in hunting opportunity, coupled with a return to at least average fawn production and increased survival of all age classes should easily lead to populations returning to within the objective range. Relative to some adjacent herds, with significant amounts of higher elevation and more productive summer ranges, the Baggs herd has the propensity for excellent fawn productivity and is more resilient to issues with growing season drought.

2.) Management Objective Review: In 2020, population, weather, and habitat data were reviewed for Baggs pronghorn herd. After internal review, managers determined that issues with population performance were due to short-term weather trends that affected habitat quantity/quality and availability, i.e. drought and winter severity, and not long-term changes. As a result of this assessment and the effectiveness of additional license types at addressing private land damage issues, managers did not propose any changes to the existing objective in 2020.

2019 - JCR Evaluation Form

SPECIES: Mule Deer

PERIOD: 6/1/2019 - 5/31/2020

HERD: MD423 - UINTA

HUNT AREAS: 132-133, 168

PREPARED BY: JEFF SHORT

	<u>2014 - 2018 Average</u>	<u>2019</u>	<u>2020 Proposed</u>
Population:	14,664	13,260	12,937
Harvest:	1,086	611	600
Hunters:	2,409	2,040	1,900
Hunter Success:	45%	30%	32 %
Active Licenses:	2,425	2,055	1,925
Active License Success:	45%	30%	31 %
Recreation Days:	12,127	10,980	10,000
Days Per Animal:	11.2	18.0	16.7
Males per 100 Females	28	23	
Juveniles per 100 Females	57	61	

Population Objective (± 20%) : 20000 (16000 - 24000)

Management Strategy: Recreational

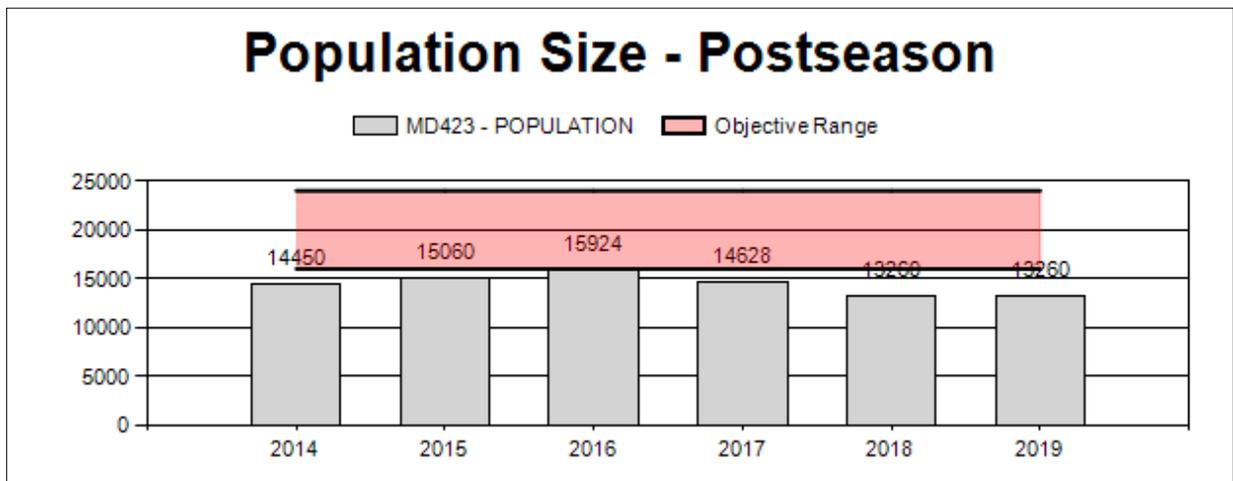
Percent population is above (+) or below (-) objective: -33.7%

Number of years population has been + or - objective in recent trend: 23

Model Date: 02/23/2020

Proposed harvest rates (percent of pre-season estimate for each sex/age group):

	<u>JCR Year</u>	<u>Proposed</u>
Females ≥ 1 year old:	.01%	.01%
Males ≥ 1 year old:	21%	21%
Total:	4.4%	4.4%
Proposed change in post-season population:	-004%	-.02%



2020 HUNTING SEASONS

Uinta Mule Deer Herd Unit (MD423)

Hunt Area	Hunt Type	Archery Dates		Season Dates		Quota	Limitations
		Opens	Closes	Opens	Closes		
132	Gen	Sept. 1	Sept. 30	Oct. 1	Oct. 11		Antlered mule deer three (3) points or more on either antler or any white-tailed deer
132, 133, 168	7	Sept. 1	Sept. 30	Oct. 1	Oct. 11	25	Doe or fawn valid on irrigated land
133	Gen	Sept. 1	Sept. 30	Oct. 1	Oct. 11		Antlered mule deer three (3) points or more on either antler or any white-tailed deer
168	Gen	Sept. 1	Sept. 30	Oct. 1	Oct. 11		Antlered mule deer three (3) points or more on either antler or any white-tailed deer

2020 Region K nonresident quota: 300 licenses

2019 Hunter Satisfaction: 34% Satisfied, 21.9% Neutral, 44.1% Dissatisfied

2020 Management Summary

1.) Hunting Season Evaluation: Due to public requests in Uinta and Lincoln counties, the Green River Region typically strives to offer a season that includes 2 weekends with 14 days of general deer hunting opportunity. We recognize this season is conservative and the population is not limited by this level of antlered deer hunting. Buck:doe ratios tend to remain within objective and there is no biological impact from the hunt. Continuing to offer hunting opportunity in light of having lower deer survival during recent winters is still biologically appropriate. A change in hunting season will not resurrect deer that died in past winters. This season will also not limit future growth of the herd. However, due to low deer numbers there is a push from the public for us to reduce the season length, a social issue rather than a biologic one. In response to that, we reduced the season from 14 days to 11 days and end the season on a Sunday. This season will still offer two weekends of hunting opportunity, despite the loss of three days. Antlerless hunting in this herd is restricted to a handful of Type 7 license and youth hunting, neither of which results in a harvest of any significance.

In addition to the reduction in season length, we have substantially reduced the nonresident license allocation for Region K. There is a history in this herd of significant public complaints about nonresident hunter numbers. It is very close to Utah and hunters from the Salt Lake City area hunt here repeatedly throughout the season when they draw a license. They often bring large family groups and leave their camps for the entire deer season. This is unpopular with local hunters. In spite of these complaints, we have maintained the previous nonresident quota of 500 for many years because it has not had a biological impact on the herd. In recent years several private ranches that allowed public hunting through the WGFDP LPW program have become leased by outfitters. This has reduced the amount of land we have for hunters to recreate in the herd unit. This along

with severe reductions in the deer population due to three bad winters in the last four years has led us to reduce the nonresident quota.

2.) Management Objective: The Herd unit objective and management strategy were last revised in 2014. We also went through an internal review of the objective and harvest strategy in 2019. The Uinta Mule Deer Herd management objective is a post-season population objective of 20,000 with recreational management. Relative to current population estimates 20,000 appears to be about the number of mule deer the area could support with very favorable weather conditions.

3.) Chronic Wasting Disease Surveillance: In 2019, the Uinta Deer Herd was targeted for intensive surveillance for CWD. The 2019 CWD prevalence rate was 0%. There were 88 usable samples collected from mule deer, lower than that requested, but at a personnel time cost of 300-400% of normal for this herd. No positives were collected and no CWD management actions were taken.

4.) Winter Severity: This herd commonly experiences difficult winter conditions for deer survival. Winter ranges are at high elevations and winters can be very detrimental to deer populations. This usually occurs once every three to five years. Prior to the 2016/17 winter, conditions were mild for six straight years in this herd unit creating a situation where fawn and adult survival was relatively high and populations were able to grow even with low fawn production. The winter of 2016/17 was severe in some areas and the population in the western part of the herd unit declined due to it. A mild winter followed in 2017/18. This helped the herd rebound slightly but in 2018/19 we had another very difficult winter. Now in the winter of 2019/20 we again had very tough winter conditions. Mortality surveys at the LeRoy winter range complex in spring have showed significant fawn and adult doe mortality. This is very harmful to the population to have three tough winters in the span of four years. However, in the winter of 2019/20 low initial deer numbers relative to habitat carrying capacity may stabilize survival percentages and make the winter less impactful than it could have been with a high starting population.

5.) Antler Point Restrictions: An antler point restriction has been used in Hunt Area 132 since 2007, and a 3-point or more antler restriction has been in place in the entire herd unit since 2014, at the request of the public. The use of this type of restriction for limited periods can be warranted in areas where buck security cover and fawn productivity is lacking, resulting in high rates of buck harvest mortality. However, many portions of this unit do not require this type of management based on observed buck ratios. Once weather conditions improve for deer survival in this herd, a more liberal hunting season is warranted. The need for an APR regulation in the entire herd needs to be critically evaluated..

6.) Modeling: The model predicts a post-season population of around 13,260 mule deer in 2019. This is a decrease in the modeled population from prior levels. This reduction is substantiated by Hunter comments, winter mortality surveys and field observations. This supporting information gives us some confidence in model results. However, the reduction modeled from pre-2016 levels is not totally realistic considering the severity of winter mortality observed on the western winter ranges where the vast majority of the deer herd winters. The reduction should have been greater than what is modeled.

2019 - JCR Evaluation Form

SPECIES: Mule Deer

PERIOD: 6/1/2019 - 5/31/2020

HERD: MD424 - SOUTH ROCK SPRINGS

HUNT AREAS: 101-102

PREPARED BY: PATRICK BURKE

	<u>2014 - 2018</u> <u>Average</u>	<u>2019</u>	<u>2020 Proposed</u>
Population:	4,465	3,650	3,600
Harvest:	194	217	215
Hunters:	244	279	275
Hunter Success:	80%	78%	78 %
Active Licenses:	244	279	275
Active License Success:	80%	78%	78 %
Recreation Days:	1,537	1,899	1,900
Days Per Animal:	7.9	8.8	8.8
Males per 100 Females	36	38	
Juveniles per 100 Females	53	38	

Population Objective ($\pm 20\%$) : 8500 (6800 - 10200)

Management Strategy: Special

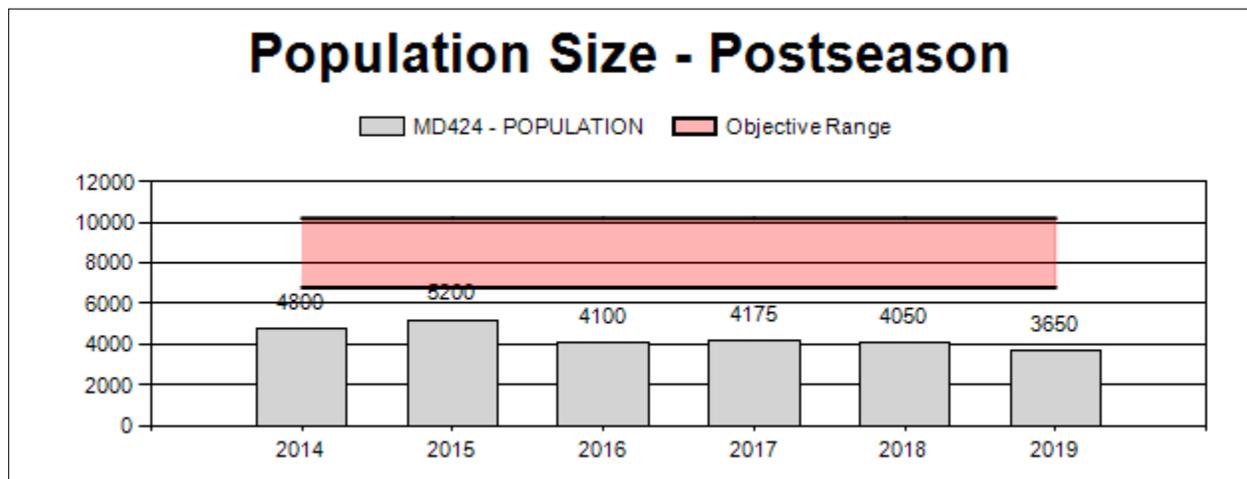
Percent population is above (+) or below (-) objective: -57.1%

Number of years population has been + or - objective in recent trend: 26

Model Date: 2/19/2020

Proposed harvest rates (percent of pre-season estimate for each sex/age group):

	<u>JCR Year</u>	<u>Proposed</u>
Females ≥ 1 year old:	0%	0%
Males ≥ 1 year old:	25%	25%
Total:	5%	6%
Proposed change in post-season population:	-3%	-1%



**2020 Hunting Seasons
South Rock Springs Mule Deer (MD424)**

Hunt Area	Type	Archery Dates		Season Dates		Quota	Limitations
		Opens	Closes	Opens	Closes		
101	1	Sept. 1	Sept. 30	Oct. 15	Oct. 31	25	Antlered deer
102	1	Sept. 1	Sept. 30	Oct. 15	Oct. 31	200	Any deer

2019 Hunter Satisfaction: 71.8% Satisfied, 12.7% Neutral, 15.5% Dissatisfied

2020 Management Summary

1.) Hunting Season Evaluation: The 2020 hunting season for the South Rock Springs mule deer herd is more conservative than what has been offered in recent years. This reduction in the number of licenses offered is due to the extremely low fawn production and survival observed during 3 of the past 4 years. The first of these low fawn ratio years was 2016. Buck fawns born during that year would be becoming 4 year-olds in 2020, a known selected harvest age class based on hunter submitted tooth samples. The observed fawn ratio in 2016 was about half of the normal fawn ratio for this population, and that pool of bucks hunters typically select for will be reduced beginning in 2020. The average of hunter harvest bucks, based on voluntary tooth submissions in 2019, was 4.9 years old.

Observed buck ratios following the 2019 season were still well within the prescribed range for a special management herd. However, given low fawn production, survival, and recruitment of the last several years, buck ratios will certainly decline, especially if license numbers are not reduced. Overall numbers of mule deer continue to decline in this herd as well, given abysmal fawn production and survival. Habitat and precipitation conditions present in the herd unit during the last several years have resulted in this dramatic decline in this herd. Currently, the model estimates the population size to be just over 3,600 deer with a declining trend, which is far below the objective for this population.

2019 - JCR Evaluation Form

SPECIES: Mule Deer

PERIOD: 6/1/2019 - 5/31/2020

HERD: MD427 – BAGGS

HUNT AREAS: 82, 84, 100

PREPARED BY: PHILIP DAMM

	<u>2014 - 2018 Average</u>	<u>2019</u>	<u>2020 Proposed</u>
Population:	21,162	18,026	19,000
Harvest:	1,689	2,126	1,950
Hunters:	2,890	3,568	3,300
Hunter Success:	58%	60%	59%
Active Licenses:	2,955	3,685	3,300
Active License Success:	57%	58%	59%
Recreation Days:	13,722	16,807	14,000
Days Per Animal:	8.1	7.9	7.2
Males per 100 Females	29	29	
Juveniles per 100 Females	58	60	

Population Objective ($\pm 20\%$): 19000 (15200 - 22800)

Management Strategy: Special

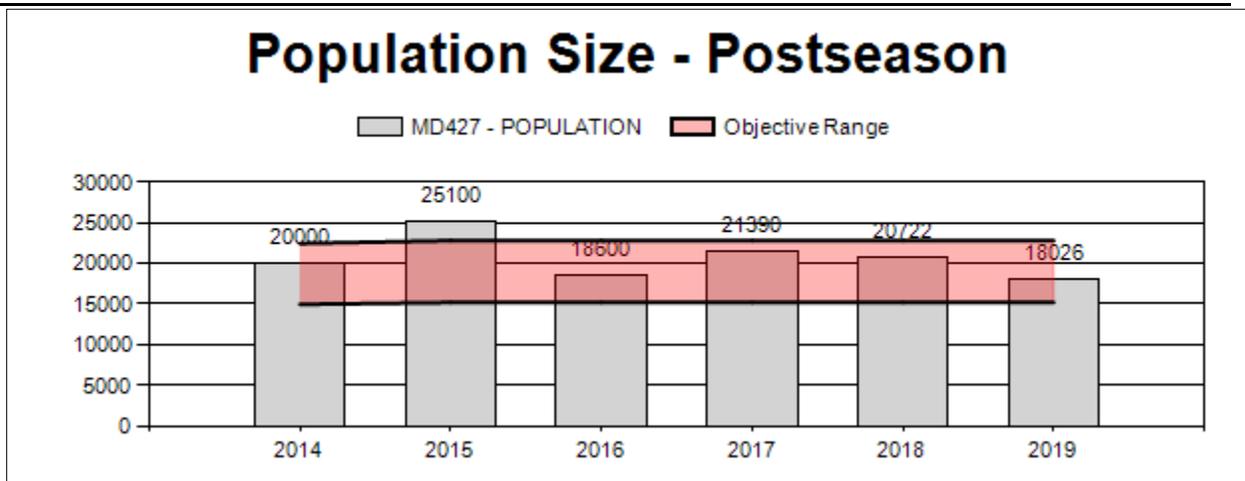
Percent population is above (+) or below (-) objective: -5.1%

Number of years population has been + or - objective in recent trend: 0

Model Date: 02/28/2020

Proposed harvest rates (percent of pre-season estimate for each sex/age group):

	<u>JCR Year</u>	<u>Proposed</u>
Females ≥ 1 year old:	2%	2%
Males ≥ 1 year old:	30%	30%
Total:	9%	9%
Proposed change in post-season population:	0%	0%



**2020 Hunting Seasons
Baggs Mule Deer Herd Unit (MD427)**

Hunt Area	Type	Archery Dates		Season Dates		Quota	Limitations
		Opens	Closes	Opens	Closes		
82		Sep. 1	Sep. 30	Oct. 1	Oct. 12	General	Antlered mule deer or any white-tailed deer
82		Sep. 1	Sep. 30	Oct. 1	Oct. 14	General youth license	Any deer
82	6	Sep. 1	Sep. 30	Oct. 1	Oct. 20	125	Doe or fawn
82	7	Sep. 1	Sep. 30	Oct. 1	Oct. 20	50	Doe or fawn valid south of Wyoming Highway 70 or east of Carbon County Road 503 and south of Carbon County Roads 752 and 754 (Savery Stock Drive)
82, 100	8	Sep. 1	Sep. 30	Nov. 1	Jan. 15	50	Doe or fawn white-tailed deer valid on private land
84	1	Sep. 1	Sep. 30	Oct. 1	Oct. 14	50	Antlered mule deer or any white-tailed deer
100		Sep. 1	Sep. 30	Oct. 1	Oct. 6	General	Antlered mule deer or any white-tailed deer
100		Sep. 1	Sep. 30	Oct. 1	Oct. 8	General youth license	Any deer

2020 Region W nonresident quota: 900 licenses

2019 Hunter Satisfaction: 61% Satisfied, 22% Neutral, 18% Dissatisfied

2020 Management Summary

1.) Hunting Season Evaluation: The Baggs mule deer herd was modeled at objective in 2019 and has been within the range for four consecutive years. Buck harvest increased in 2019 (1,804) as a result of returning to an “any buck” season, good success, and additional hunters and was higher than the 5-year average (1,524). Hunt Area 84 hunters continue to see good success and are on average more satisfied than general season hunters; however, license numbers were proposed to be reduced to address concerns of smaller overall antler size in the harvest. Additional hunters present during the general hunt were due to the antler point restriction (APR) being removed for the 2019 season, allowing for additional opportunity. This removal was consistent with past APR cycles (No APR to 4-point to 3-point to No APR). Harvest success (60%) dropped slightly from 2018, but trended along with the five-year average (58%). Effort per harvest was consistent with the last five years, except for years when a 4-point APR was in place.

Public comments concerning the herd and winter severity were common for winter of 2018-19 and continued into early 2020 for the winter of 2019-20. A common comment throughout the 2019 hunting season was that most of the mature bucks succumbed to the effects of winter, but

the data did not seem to support this hypothesis. Population and survival data should have alleviated both of these concerns. Even with higher levels of buck harvest and above average severity in the previous winter, buck ratios in post season classification (December 2019) were still 29 per 100 does, which was consistent with the five-year average. However, the ratio of Class II and III bucks was depressed compared to five-year averages, and the Class I ratio was significantly higher. Lower Class II/III ratios began in 2018 and were easily explained by two factors: 1) having an APR in place for several years led to “high-grading” of the buck population; and, 2) an early migration during the 2018 hunting season resulted in bucks becoming available for harvest that would typically be unavailable (harvest in 2018 with an APR was similar to 2019 without an APR). The higher Class I ratio was also easily explained. The APR that led to “high-grading” of the buck population spared harvest of smaller, older age class bucks. Additionally, almost double the five-year average for yearling buck ratio was observed in 2018, and nearly none were harvested in 2018 due to the APR. Thus, those yearlings (now 2.5 in 2019) along with smaller, older age class bucks resulting from the APR comprised the high proportion of Class I deer observed during the 2019 flight.

Since fawns are unable to build body fat to increase odds of surviving winter, they are an excellent indicator for the effects of a winter on the population. Mule deer were sampled in April 2019 in accessible migration corridors and winter ranges to assess over winter fawn loss (N=1,279; adequate sample size=1,200). Assuming no difference between over winter adult buck and doe mortality and based on buck ratios in December 2018, over winter fawn mortality was a minimum of 37%. While this magnitude of loss will not grow the herd, recent severe winters in other migratory herds in western Wyoming have resulted in nearly 100% fawn mortality. Another indication of fawn over winter survival is the following December’s yearling buck classification data. In 2019 after a hunting season with above average harvest and no antler point restriction, 8 yearling bucks per 100 does were observed, which was similar to the 5 year average of 9. Also, 75% of adult does in the Atlantic Rim Project Area survived winter of 2018-19, which is only minimally lower than what is typically observed. Snowpack in and around the Baggs area winter ranges were deeper than last winter. However, snow accumulated more quickly this year and a large portion of the herd abandoned these local ranges much earlier in favor of ranges in northern Colorado with less snow. Therefore we anticipated similar over winter mortality when compared to last year.

This assessment refuted the use of the APR for the purpose of increasing antler size in the harvest/population or buck ratios post-hunt, but supported the use of the APR for addressing hunter crowding. Overall, this assessment supported continuing a fairly liberal general season with a modest amount of doe harvest. Though, two days were removed from the end of the season to help address public concerns with proportionally lower numbers of Class II and III bucks.

2.) Management Objective Review: In 2020, population, weather, and general/RHA habitat data were reviewed for the Baggs mule deer herd. After an internal review, managers determined that although the herd is not without its issues, those issues are not limiting it on a population level. Specific issues included barriers to movement, poor quality/quantity winter ranges in a couple of specific areas, highway mortality, drought, winter severity, and disease. Managers will continue to assess these issues on an annual basis into the future.

Weather

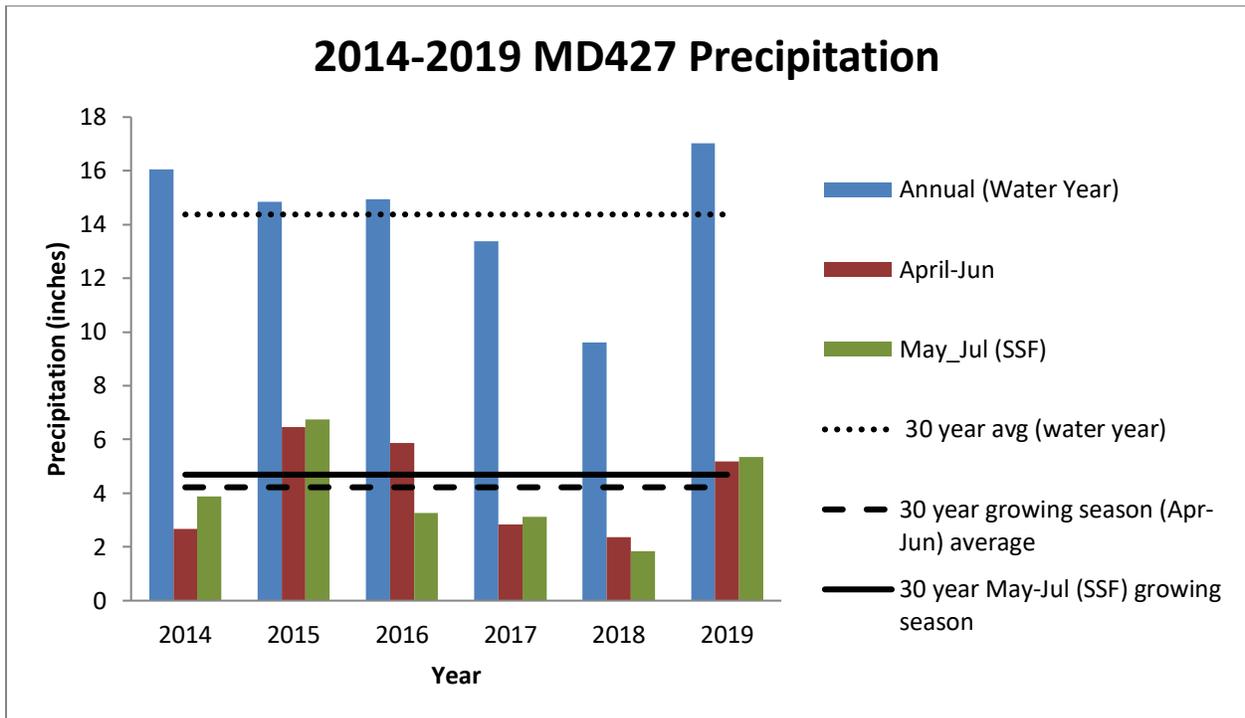


Figure 1. Parameter-Elevation Relationships on Independent Slopes Model (PRISM) was utilized to estimate precipitation by calculating climate-elevation regressions for each Digital Elevation Model grid cell (4 km resolution) for the Baggs mule deer herd unit in Carbon County, Wyoming.

Precipitation

Overall precipitation was above average when evaluated across the entire herd unit. Higher than average snow accumulations during the 2018-2019 winter paired with cold spring temperatures in 2019 in southcentral Wyoming resulted in persistent snowpack at high elevations within the Sierra Madre Mountain ranges. Although growing season (April through June) precipitation was above average for both lower (April-June) and higher (May-July) elevations the persistent cold temperatures into June effectively reduced the length of the growing season delaying forage production and availability, especially at higher elevations.

Winter Severity

The 2019-2020 winter began early with significant snow hitting the middle to higher elevations by mid-October and accumulated in all elevations consistently throughout the winter. These early snows likely pushed deer through transition and winter ranges earlier than usual, which is consistent with Baggs mule deer collar data showing early movement into Colorado. Although there were higher than average snow accumulations during the 2019-2020 winter, high winds and occasional warming trends cleared some areas making browse available on portions of the winter range in the southern part of the herd unit, particularly for the mule deer wintering up to 30 miles into Colorado. High winds and consistent

snow events in the northern portion of the herd unit caused significant drifting and may have had negative impacts to deer that remained to winter in those areas. Snotel Sites at higher elevations reported SWE values around 100% of normal in February 2020, while sites at lower elevations reported SWE values of 140% of normal.

Habitat

Higher than average snow accumulations during the 2018-2019 winter paired with cold spring temperatures in 2019 in southeast and southcentral Wyoming resulted in persistent snowpack at high elevations within the Sierra Madres. As such, although forage production was likely higher than average, the “late spring” created phenological delays for plants, especially at higher elevations and effectively shortened the growing season across the herd unit. The short growing season likely had an impact on leader production as well, especially at higher elevations. However, lower elevation transition ranges and winter ranges were in much better condition, production-wise, than past years. Overall, more than enough forage and browse across the herd unit should have resulted in positive impacts to deer as they headed into winter.

Habitat

Significant Events

The WGFD, Little Snake River Conservation District, and BLM continued to implement habitat projects across the There were no large wildfires within the herd unit in 2019. However, Snake fire that burned in 2016 continues to recover and provide good early successional habitat for mule deer.

Habitat Monitoring

In 2015, Department personnel initiated the Rapid Habitat Assessment methodology to survey important mule deer habitats. This method strives to capture large-scale habitat quality metrics to better understand how the habitat is providing for the current population of mule deer. The overall end result of this effort is to provide a standardized habitat component for discussions about how mule deer objectives should or should not be adjusted based on the general concept of carrying capacity. In 2019, 147 acres of riparian RHAs were completed by personnel in the Baggs mule deer herd unit. The Baggs Mule deer herd review was completed in 2020 and the past five years of RHA data were summarized to help inform the objective review process.

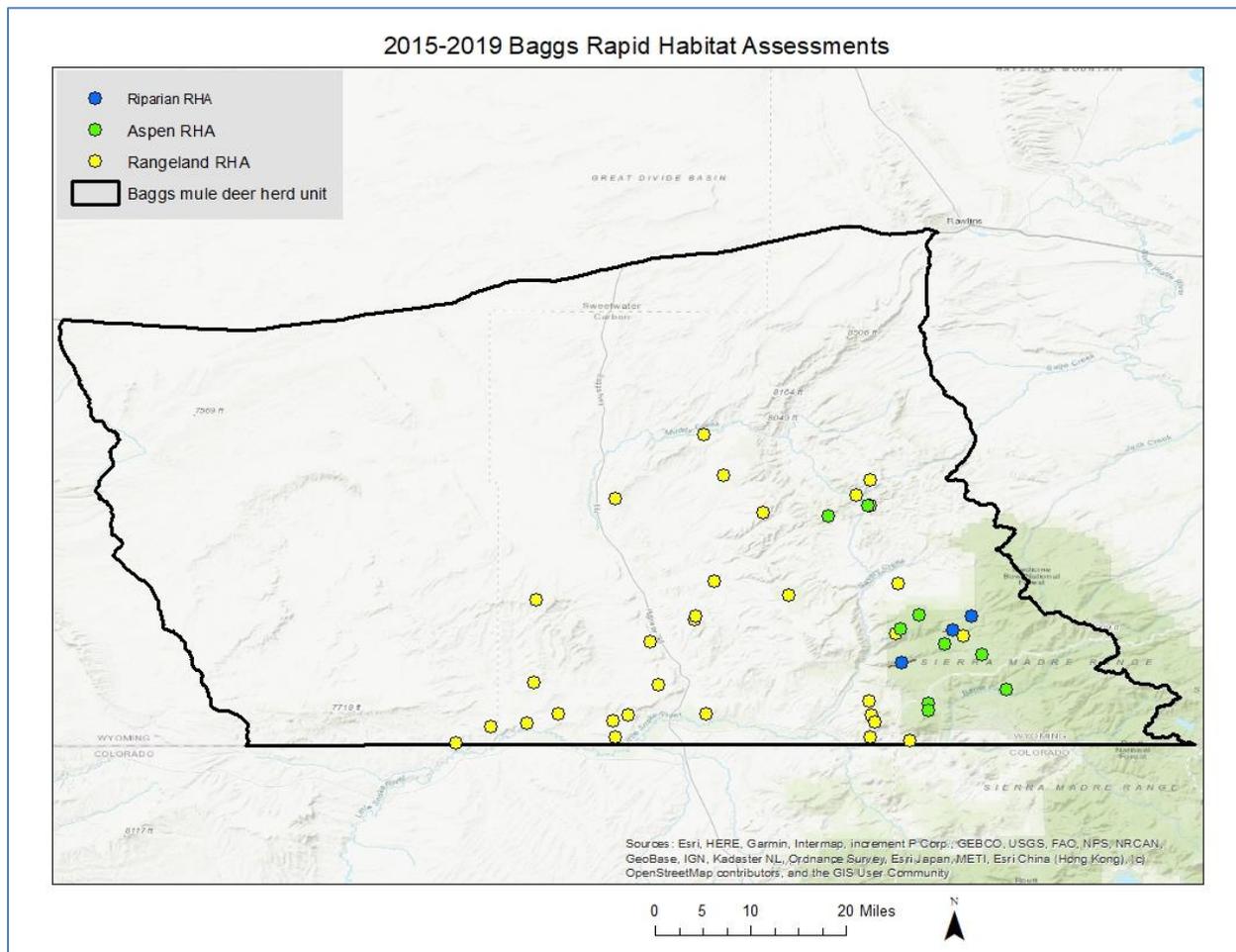
Baggs Mule Deer Objective Review Habitat Report

Overall Recommendation

Habitat data collected from 2015-2019 is presented below and results in the recommendation that the habitat resources are relatively in balance with the existing population objective of this herd.

Rapid Habitat Assessments

In 2015, Department personnel initiated the Rapid Habitat Assessment methodology to survey important mule deer habitats. This method strives to capture large-scale habitat quality metrics to better understand how the habitat is providing for the current population of mule deer. This effort provides a standardized habitat assessment to contribute to discussions on mule deer objectives and potential adjustments based on the general concept of carrying capacity.

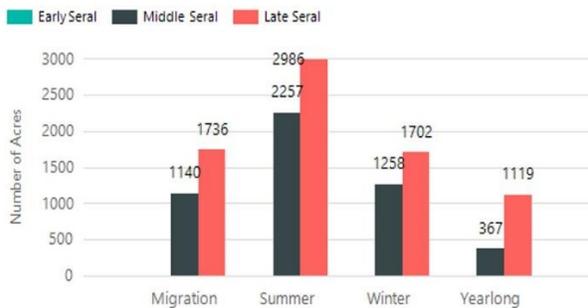


Data from 2015-2019 were summarized to inform discussions on the Baggs mule deer objective review. Some of the most significant findings include: 1) rangeland conditions largely either did not meet or only partially met objectives in the three seasonal ranges where assessments occurred; 2) invasive species

were documented on approximately 93% of the rangelands assessed, but were not a factor in aspen; and 3) aspen had a greater percentage of stands meeting objectives than the rangeland assessment areas. In general, rangeland sites were not meeting objectives due to a lack of shrub age class diversity, excessive hedging on key species, and the presence of cheatgrass.

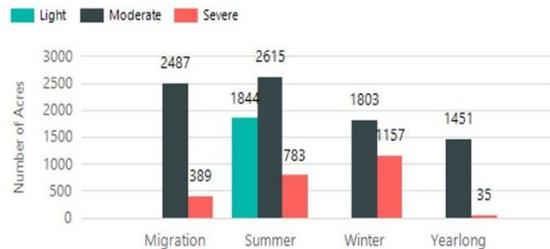
Rangeland RHA								
Migration/Transitional Range			Spring-Summer-Fall Range			Winter Range		
Acres		2,876	Acres		5,243	Acres		4,446
Seral State	Early	0%	Seral State	Early	0%	Seral State	Early	0%
	Middle	40%		Middle	43%		Middle	37%
	Late	60%		Late	57%		Late	63%
Herbivory	Light	0%	Herbivory	Light	35%	Herbivory	Light	0%
	Moderate	86%		Moderate	50%		Moderate	73%
	Severe	14%		Severe	15%		Severe	27%
Species Diversity	Low	77%	Species Diversity	Low	9%	Species Diversity	Low	12%
	Medium	23%		Medium	5%		Medium	73%
	High	0%		High	86%		High	15%
Invasives	None	0%	Invasives	None	7%	Invasives	None	11%
	Present	100%		Present	75%		Present	63%
	Mgmt Limiting	0%		Mgmt Limiting	18%		Mgmt Limiting	27%
Meet Objectives	Yes	2%	Meet Objectives	Yes	9%	Meet Objectives	Yes	4%
	Partial	37%		Partial	81%		Partial	8%
	No	60%		No	10%		No	88%

Baggs Rangeland RHA Seral State

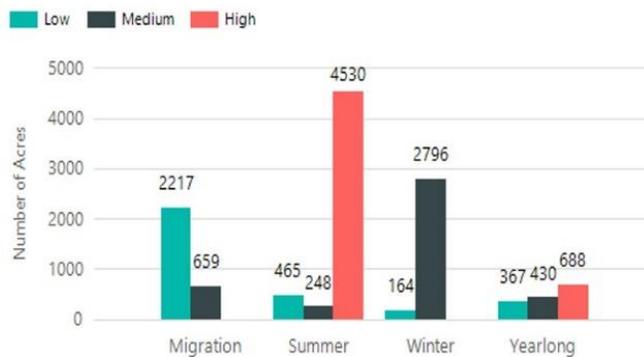


Baggs Rangeland RHA Herbivory

2015 to 2019 MD427 12565 Acres

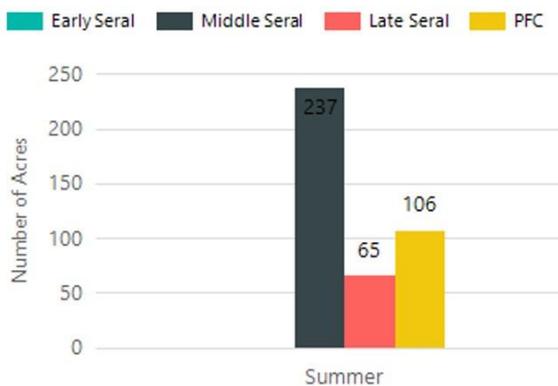


Baggs Rangeland RHA Species Diversity



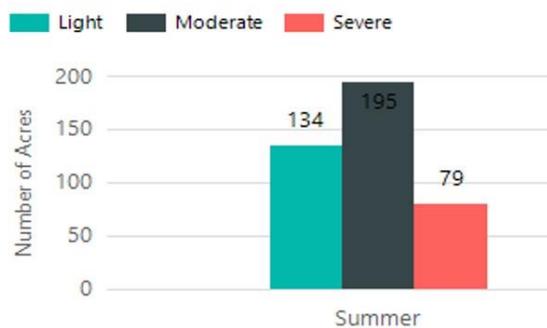
Aspen RHA		
Spring-Summer-Fall Range		
Acres		Acres
Seral State	Early	0%
	Middle	58%
	Late	16%
	PFC	26%
Herbivory	Light	33%
	Moderate	48%
	Severe	19%
Species Diversity	Low	17%
	Medium	49%
	High	34%
Invasives	None	100%
	Present	0%
Meet Objectives	Yes	44%
	Partial	54%
	No	2%

Baggs Aspen RHA Seral State



Baggs Aspen RHA Herbivory

2015 to 2019 MD427 408 Acres



Significant Events

Cooperative habitat treatments were conducted throughout the herd unit over the past five years by cooperating natural resource agencies and the Department. This includes 4,045 acres of aerial herbicide cheatgrass treatments, 1,218 acres of shrub enhancements, over 700 acres of aspen treatments 526 acres of juniper removal, and 277 acres of prescribed fire. Additionally, both the Poison Basin and Cottonwood Hills grazing allotments were rested for five years through a cooperative resource grazing agreement on the Grizzly Wildlife Habitat Management Area. Continued collaborative habitat efforts are planned for the future including wildlife-friendly fence conversions, large-scale cheatgrass treatments, and juniper removal.

In late September 2016, the Snake fire burned over 2,500 acres in the southwest Sierra Madre Range between the Roaring Fork and North Fork of the Little Snake River. Over the past three years, the burned areas have recovered well, initiating aspen regeneration and increasing age class diversity and forage production in the area.

2019 - JCR Evaluation Form

SPECIES: ELK

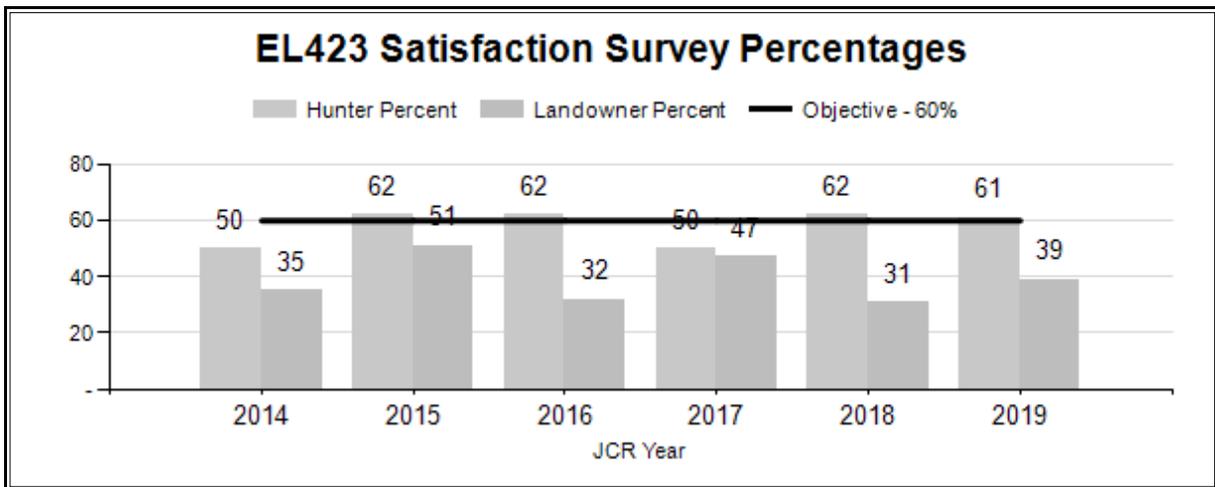
PERIOD: 6/1/2019 - 5/31/2020

HERD: EL423 - UINTA

HUNT AREAS: 106-107

PREPARED BY: JEFF SHORT

	<u>2014 - 2018 Average</u>	<u>2019</u>	<u>2020 Proposed</u>
Hunter Satisfaction Percent	57%	61%	60%
Landowner Satisfaction Percent	39%	39%	60%
Harvest:	607	529	650
Hunters:	1,694	1,531	1,600
Hunter Success:	36%	35%	41%
Active Licenses:	1,767	1,608	1,600
Active License Success:	34%	33%	41 %
Recreation Days:	11,953	10,621	12,000
Days Per Animal:	19.7	17.6	18.5
Males per 100 Females:	0	0	
Juveniles per 100 Females	0	0	
Satisfaction Based Objective			60%
Management Strategy:			Recreational
Percent population is above (+) or (-) objective:			-10%
Number of years population has been + or - objective in recent trend:			5



2020 HUNTING SEASON

Uinta Herd Unit (EL423)

Hunt Area	Hunt Type	Archery Dates		Season Dates		Quota	Limitations
		Opens	Closes	Opens	Closes		
106	Gen	Sept. 1	Sept. 30	Oct. 15	Oct. 31		Any elk
106	Gen			Nov. 1	Nov. 14		Antlerless elk
106	1	Sept. 1	Sept. 30	Nov. 15	Jan. 31	50	Any elk valid west of the Black's Fork River or north of Wyoming Highway 410; also valid in Area 105 west of the Bear River
106	4	Sept. 1	Sept. 30	Oct. 15	Dec. 31	100	Antlerless elk
106	4			Jan. 1	Jan. 31		Antlerless elk valid on private land or west of the Black's Fork River or north of Wyoming Highway 410
106	7			Aug. 15	Jan. 31	300	Cow or calf valid on private land or west of the Black's Fork River or north of Wyoming Highway 410
107	Gen	Sept. 1	Sept. 30	Oct. 15	Oct. 31		Any elk
107	Gen			Nov. 1	Nov. 14		Antlerless elk
107	4	Sept. 1	Sept. 30	Oct. 15	Dec. 31	150	Antlerless elk
107	4			Jan. 1	Jan. 31		Antlerless elk valid off national forest within the Henry's Fork River drainage
107	7			Aug. 15	Aug. 31	50	Cow or calf valid in Sweetwater County
107	7	Sept. 1	Sept. 30	Dec. 15	Jan. 31		Cow or calf valid off national forest within the Henry's Fork River drainage

2019 Hunter Satisfaction: 62.5% Satisfied, 22.2% Neutral, 15.3% Dissatisfied

2020 Management Summary

1.) Hunting Season Evaluation: In the sixth year of a satisfaction based objective, we are meeting the hunter satisfaction objective but not the landowner satisfaction objective. Hunter satisfaction is correlated to hunter harvest success, which correlates to weather conditions in the fall. Even though landowner satisfaction is below objective, the landowner survey shows 83.3% of landowners are either satisfied with the current season structure or would like us to be more conservative. We are meeting the secondary objective with 79% of the bull harvest being branch-antlered bulls.

Antlerless hunts are designed to reduce or maintain numbers and to target elk that have potential to cause depredation problems. Hunters would like to see more elk in accessible public land areas in HA 106 and 107, so late antlerless hunts are designed to avoid these areas. In 2020, we propose to continue aggressive hunt timing and license allocation to maximize elk harvest and target elk causing damage problems. It appears that these season structures are successfully reducing this elk population and are minimizing damage issues.

For 2020 we will continue aggressive hunt timing and license allocation to maximize elk harvest and target elk causing damage problems. It appears that these season structures are reducing this elk herd. The August 15 – 31 portion of the area 106 and 107 type 7 hunts is to address specific damage issues on private lands. The Hunt Area 106 Type 1 licenses are in place to help deal with late damage problems in the area for which they are valid. They are also valid in a far western portion of HA 105. This is to address a specific problem on years with hard winters where Utah elk are coming to Wyoming and damaging stored hay.

The HA 107 antlerless licenses are used to maintain pressure on elk on the Wyoming side of the state boundary during a hunt on the Utah side. Damage complaints on the HA 107 side of the herd unit are typically low even during severe winters. However, ranchers will complain about elk numbers. We will maintain license quotas in 2020 to address those complaints.

2.) Management Objective: The management objective is satisfaction based. This objective is to have a landowner satisfaction of $\geq 60\%$ and a hunter satisfaction of $\geq 60\%$. Landowner satisfaction is based on whether or not they felt there are too many elk in the herd unit. There is also a secondary objective of having $\geq 60\%$ branch-antlered bulls in the harvest. The objective and management strategy were last revised in 2014.

3.) Aerial Counts: Elk surveys are flown in conjunction with Utah DWR, most recently in January of 2019. No classification data is available with the way Utah conducts their surveys. The count numbers in Wyoming vary drastically with weather conditions. High count numbers are typically the result of severe winter weather and higher numbers of elk migration into Wyoming. The 2019 count showed a decrease in elk numbers. This is likely correct since both Utah and Wyoming have been running aggressive hunting seasons to increase cow elk harvest.

4.) Damage Concerns: This is an interstate herd shared with Utah. There are elk that summer in Wyoming but many elk that summer in the Uinta Mountains in Utah come to Wyoming to winter. Limited public land winter range is an issue for this herd. With winter range in short supply conflict with agriculture producers becomes an issue. Damage complaints occur on bad winters. Summer damage also occurs on crops in limited areas. Significant efforts have been made by field personnel to alleviate these problems. The strategy in this herd unit has been to minimize elk damage problems through harvest and hunting season structure.

2019 - JCR Evaluation Form

SPECIES: Elk

PERIOD: 6/1/2019 - 5/31/2020

HERD: EL424 - SOUTH ROCK SPRINGS

HUNT AREAS: 30-32

PREPARED BY: PATRICK BURKE

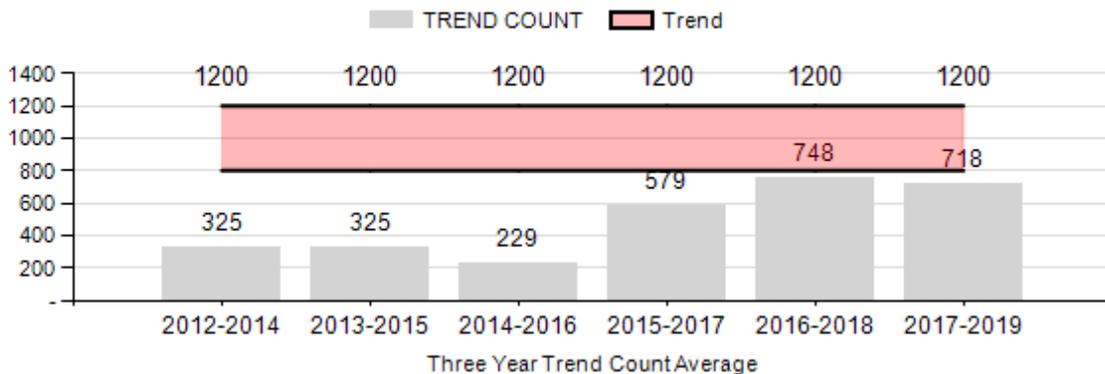
	<u>2014 - 2018 Average</u>	<u>2019</u>	<u>2020 Proposed</u>
Trend Count:	748	599	700
Harvest:	251	309	325
Hunters:	360	447	450
Hunter Success:	70%	69%	72 %
Active Licenses:	360	447	450
Active License Success	70%	69%	72 %
Recreation Days:	2,781	3,782	3,775
Days Per Animal:	11.1	12.2	11.6
Males per 100 Females:	41	30	
Juveniles per 100 Females	44	30	

Trend Based Objective (± 20%) 1,000 (800 - 1200)
 Management Strategy: Special
 Percent population is above (+) or (-) objective: -40.1%
 Number of years population has been + or - objective in recent trend: 5

Proposed harvest rates (percent of pre-season estimate for each sex/age group):

	<u>JCR Year</u>	<u>Proposed</u>
Females ≥ 1 year old:	0%	0%
Males ≥ 1 year old:	0%	0%
Juveniles (< 1 year old):	0%	0%
Total:	0%	0%
Proposed change in post-season population:	0%	0%

EL424 Trend Count



**2020 Hunting Seasons
South Rock Springs Elk Herd (EL424)**

Hunt Area	Type	Archery Dates		Season Dates		Quota	Limitations
		Opens	Closes	Opens	Closes		
30	1	Sept. 1	Sept. 30	Oct. 1	Oct. 31	50	Any elk
30	4	Sept. 1	Sept. 30	Oct. 8	Nov. 15	50	Antlerless elk
31	1	Sept. 1	Sept. 30	Oct. 1	Oct. 31	75	Any elk
31	4	Sept. 1	Sept. 30	Oct. 8	Nov. 15	150	Antlerless elk
32	1	Sept. 1	Sept. 30	Oct. 1	Oct. 31	50	Any elk
32	4	Sept. 1	Sept. 30	Oct. 8	Nov. 15	50	Antlerless elk
32	9	Sept. 1	Sept. 30			25	Antlerless elk, archery only

2019 Hunter Satisfaction: 77.4% Satisfied, 11.5% Neutral, 11.1% Dissatisfied

2020 Management Summary

- 1.) Hunting Season Evaluation:** The 2020 hunting season is very similar to recent years. The only changes for the 2020 season include moving the starting date for the Type 4 licenses from October 1st to the 8th. This change brings the season structure back into line with how it was historically run, providing Type 1 hunters about a week in the field before the antlerless season. This season structure reduces hunter crowding, especially when license numbers are higher; and increases hunter satisfaction for Type 1 license holders (these Type 1 licenses are often among the hardest elk licenses to draw in the state).

The observed calf ratio after the 2019 hunting season was 30 calves per 100 cows, significantly lower when compared to the last several years, and suggests the current license issuance rate should be sufficient to hold this population stable. The observed bull to cow ratio in 2019 was also 30 bulls per 100 cows, which is lower than desired for this special management herd, although a small classification sample size in 2019 could account for the majority of this observed ratio. However, the average age of harvest bulls, based on hunter submitted teeth in 2019, was 5.2 years old. This average age of harvest bulls seen in 2019 was the lowest observed in this herd in over 10 years, which is usually around 6 years of age. Potentially lower bull ratios, lower age of harvest bulls, and hunter complaints in 2019 about bull quality suggest Type 1 licenses in this herd should be reduced slightly.

2019 - JCR Evaluation Form

SPECIES: Elk

PERIOD: 6/1/2019 - 5/31/2020

HERD: EL425 - SIERRA MADRE

HUNT AREAS: 13, 15, 21, 108, 130

PREPARED BY: PHILIP DAMM

	<u>2014 - 2018 Average</u>	<u>2019</u>	<u>2020 Proposed</u>
Population:		N/A	N/A
Harvest:	2,100	1,766	1,800
Hunters:	5,660	4,876	5,000
Hunter Success:	37%	36%	36%
Active Licenses:	5,925	5,063	5,100
Active License Success:	35%	35%	35%
Recreation Days:	41,754	34,413	35,000
Days Per Animal:	19.9	19.6	19.4
Males per 100 Females	32	0	
Juveniles per 100 Females	40	0	

Population Objective (± 20%) : 5000 (4000 - 6000)

Management Strategy: Recreational
 Percent population is above (+) or below (-) objective: N/A%
 Number of years population has been + or - objective in recent trend: 0
 Model Date: None

Proposed harvest rates (percent of pre-season estimate for each sex/age group):

	<u>JCR Year</u>	<u>Proposed</u>
Females ≥ 1 year old:	0%	0%
Males ≥ 1 year old:	0%	0%
Total:	0%	0%
Proposed change in post-season population:	0%	0%

2013 - 2018 Postseason Classification Summary

for Elk Herd EL425 - SIERRA MADRE

Year	Post Pop	MALES				FEMALES		JUVENILES		Tot CIs	CIs Obj	Males to 100 Females				Young to		
		Ylg	Adult	Total	%	Total	%	Total	%			Ying	Adult	Total	Conf Int	100 Fem	Conf Int	100 Adult
2013	11,000	156	124	282	17%	985	58%	430	25%	1,697	0	16	13	29	±2	44	±3	34
2014	8,850	432	554	986	17%	3,546	60%	1,407	24%	5,939	0	12	16	28	±1	40	±1	31
2015	8,295	20	9	29	8%	222	65%	93	27%	344	0	9	4	13	±3	42	±6	37
2016	6,700	480	610	1,090	21%	2,835	56%	1,149	23%	5,074	0	17	22	38	±1	41	±1	29
2017	9,644	0	0	0	0%	0	0%	0	0%	0	0	0	0	0	±0	0	±0	0
2018	7,000	551	572	1,123	19%	3,456	58%	1,352	23%	5,931	0	16	17	32	±1	39	±1	30

**2020 Hunting Seasons
Sierra Madre Elk Herd Unit (EL425)**

Hunt Area	Type	Archery Dates		Season Dates		Quota	Limitations
		Opens	Closes	Opens	Closes		
13		Sep. 1	Sep. 30	Oct. 15	Oct. 31	General	Any elk
13	6	Sep. 1	Sep. 30	Oct. 1	Nov. 14	100	Cow or calf
15		Sep. 1	Sep. 30	Oct. 15	Oct. 31	General	Any elk
15	6	Sep. 1	Sep. 30	Oct. 1	Nov. 14	100	Cow or calf
12, 13, 15, 110	7	Sep. 1	Sep. 30	Aug. 15	Jan. 31	225	Cow or calf valid on private land
21		Sep. 1	Sep. 30	Oct. 13	Oct. 31	General youth license	Any elk
21		Sep. 1	Sep. 30	Oct. 15	Oct. 19	General	Antlered elk
21		Sep. 1	Sep. 30	Oct. 20	Oct. 31	General	Any elk
21	6	Sep. 1	Sep. 30	Oct. 15	Nov. 15	250	Cow or calf
21	7	Sep. 1	Sep. 30				Cow or calf valid in entire area
21	7			Aug. 15	Dec. 31	25	Cow or calf valid on private land
108	1	Sep. 1	Sep. 30	Oct. 11	Oct. 31	75	Any elk
108	1	Sep. 1	Sep. 30	Nov. 1	Jan. 31		Antlerless elk
108	4	Sep. 1	Sep. 30	Oct. 11	Jan. 31	50	Antlerless elk
108	6	Sep. 1	Sep. 30	Oct. 11	Dec. 31	200	Cow or calf
108	6	Sep. 1	Sep. 30	Jan. 1	Jan. 31		Cow or calf valid west of the Twentymile Road (Carbon County Rd 605 N)
130		Sep. 1	Sep. 30	Oct. 1	Oct. 23	General	Any elk

2019 Hunter Satisfaction: 63% Satisfied, 20% Neutral, 17% Dissatisfied

2020 Management Summary

1.) Hunting Season Evaluation: The mid-winter trend count objective for Sierra Madre Elk Herd was unable to be assessed in February 2020 due to the timing of the objective change and flight budget constraints. Managers only reviewed hunter comments, harvest statistics, and anecdotal information collected through winter to assess seasons for 2020. Bull and cow harvest both declined slightly in 2019, but follow the trend from the last 3 years when a similar season structure was used. Harvest success (36%) dropped from 2018, but trended along with the five-year average (37%). Effort per harvest increased from 2018 by 2 days (19.6), but is consistent with the five-year average (19.9). Fewer hunters than 2018 explains some of the lower harvest, as does significant snow closing access early to certain areas of general units within the herd, including Battle Pass along Highway 70. Harvest statistics seemed to otherwise suggest a stable to slightly increasing population.

With consistent harvest data, good bull-cow and calf-cow ratios maintained as of mid-winter 2018, and no significant mortalities (other than harvest) occurring since then, the population is likely on at least a slight growth track. Therefore, a modest increase in HA21 Type 6 licenses was proposed, and the general antlered elk only portion of the season in 21 was decreased by three days. Both adjustments were to allow for additional opportunity to harvest cow elk to keep the herd from exceeding objective. Increases to the Area 12,13, 15, 110 Type 7 licenses are proposed to address private land damage and are less likely to impact HAs 13 and 15 than HAs 12 and 110, which are outside of the herd unit boundary.

Elk continued to be observed in lower elevation winter ranges at higher densities than in past years. Specifically, more and larger groups were present along the Highway 789 corridor and immediately adjacent to the town of Rawlins. Higher incidences of vehicle-elk interactions along 789 were noted compared to previous years. These elk (re)distributions were attributed at least partially to higher snow depths in more traditional winter ranges, but could also result in a longer-term behavioral change. A few calf elk mortalities were observed due to failed fence crossings, but were likely insignificant on the population level.

2019 - JCR Evaluation Form

SPECIES: Elk

PERIOD: 6/1/2019 - 5/31/2020

HERD: EL426 - STEAMBOAT

HUNT AREAS: 100

PREPARED BY: PATRICK BURKE

	<u>2014 - 2018</u> <u>Average</u>	<u>2019</u>	<u>2020 Proposed</u>
Population:	1,604	1,800	1,200
Harvest:	346	623	635
Hunters:	418	623	800
Hunter Success:	83%	100%	79 %
Active Licenses:	431	805	800
Active License Success:	80%	77%	79 %
Recreation Days:	1,696	3,163	3,200
Days Per Animal:	4.9	5.1	5.0
Males per 100 Females	56	52	
Juveniles per 100 Females	43	25	

Population Objective ($\pm 20\%$) : 1200 (960 - 1440)

Management Strategy: Special

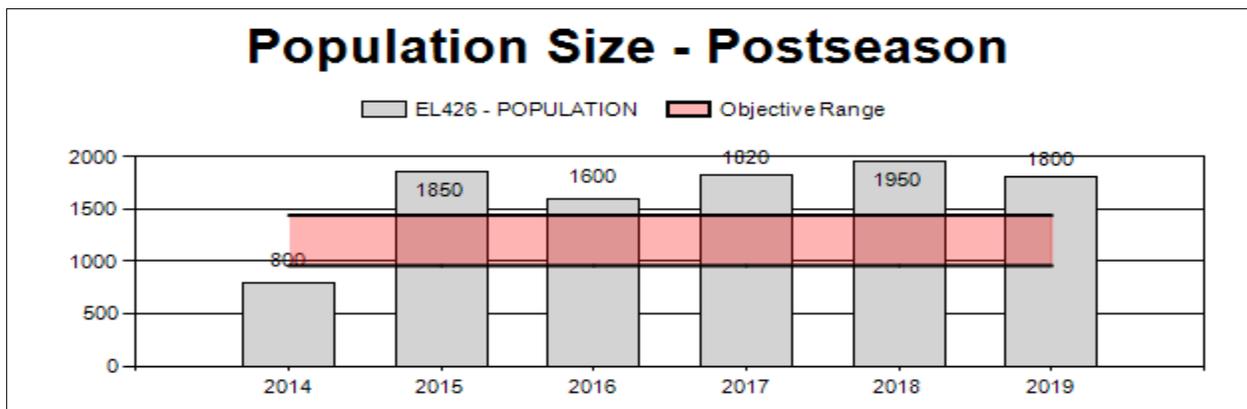
Percent population is above (+) or below (-) objective: 50%

Number of years population has been + or - objective in recent trend: 5

Model Date: 2/19/2020

Proposed harvest rates (percent of pre-season estimate for each sex/age group):

	<u>JCR Year</u>	<u>Proposed</u>
Females ≥ 1 year old:	40%	44%
Males ≥ 1 year old:	32%	32%
Total:	30%	33%
Proposed change in post-season population:	-30%	-33%



**2020 Hunting Seasons
Steamboat Elk Herd (EL426)**

Hunt Area	Type	Archery Dates		Season Dates		Quota	Limitations
		Opens	Closes	Opens	Closes		
100	1			Aug. 15	Oct. 7	200	Any elk valid within the Farson-Eden Irrigation Project or on or within 1 mile of irrigated land east of U.S. Highway 191
100	1	Sept. 1	Sept. 30	Oct. 8	Oct. 31		Any elk
100	2	Sept. 1	Sept. 30	Oct. 15	Dec. 1	50	Spike elk
100	4	Sept. 1	Sept. 30	Oct. 15	Oct. 31	200	Antlerless elk
100	5	Sept. 1	Sept. 30	Nov. 8	Dec. 1	200	Antlerless elk
100	6	Sept. 1	Sept. 30	Oct. 15	Dec. 1	100	Cow or calf valid east of Sweetwater County Road 19, south of Sweetwater County Road 82, east of Sweetwater County Road 21, and south of Sweetwater County Road 20
100	7	Sept. 1	Sept. 30	Oct. 1	Oct. 31	100	Cow or calf valid east of U.S. Highway 191, south of Sweetwater County Road 17, and Sweetwater County Road 15, and west of Sweetwater County Road 19
100	8			Aug. 15	Sept. 30	25	Cow or calf valid-west of the Blue Rim Road (Sweetwater County Road 5) and the Lower Farson Cutoff Road (Sweetwater County Road 8)

2019 Hunter Satisfaction: 85.0% Satisfied, 7.3% Neutral, 7.7% Dissatisfied

2020 Management Summary

1.) Hunting Season Evaluation: The 2020 hunting season is similar to 2019's season structure. The purpose of the August 15 season in the Farson-Eden Irrigation Project area is to address damage issues involving primarily young branch-antlered bulls damaging alfalfa hay fields. In 2019, Type 1 license holders were allowed to harvest these elk beginning in mid-August to help reduce this group of elk residing in the project area. There were some minor concerns about Type 1 license holders being reluctant to harvest smaller bulls living in the agricultural fields, who tended to opt instead for a chance at a larger bull during the regular season, but the season did result in hunters chasing bulls from these fields and did result in some harvest. It is hoped that a repeat of that season will result in elk dispersing from these fields.

The other major damage concern area in the herd unit is the alfalfa fields in the western portion of the herd unit along the Green River. In 2019, few elk visited those fields, which resulted in limited damage issues. Consequently, there was a very low success for Type 8 hunters. Because of this, the number of Type 8 licenses are being reduced for 2020.

While the herd is still above its population objective, the low calf ratio of 25 calves per 100 cows and continued increased cow licenses should continue to move this herd towards its established population objective.

2019 - JCR Evaluation Form

SPECIES: Elk

PERIOD: 6/1/2019 - 5/31/2020

HERD: EL428 - WEST GREEN RIVER

HUNT AREAS: 102-105

PREPARED BY: JEFF SHORT

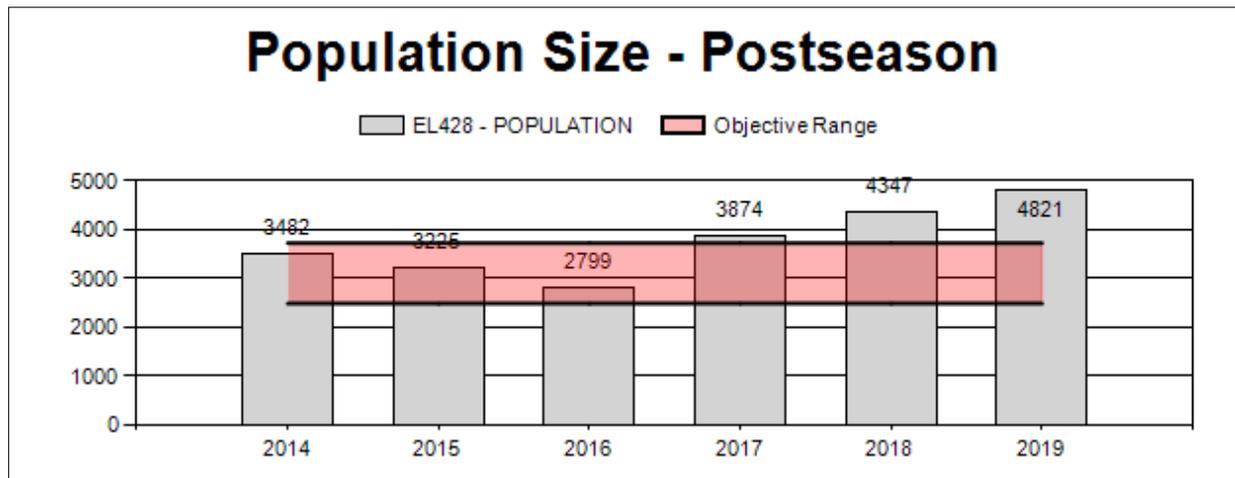
	<u>2014 - 2018 Average</u>	<u>2019</u>	<u>2020 Proposed</u>
Population:	3,545	4,821	4,200
Harvest:	1,079	1,009	1,250
Hunters:	3,567	3,139	3,500
Hunter Success:	30%	32%	36%
Active Licenses:	3,719	2,997	3,600
Active License Success:	29%	34%	35%
Recreation Days:	24,395	19,505	25,000
Days Per Animal:	22.6	19.3	20
Males per 100 Females	25	26	
Juveniles per 100 Females	32	33	

Population Objective ($\pm 20\%$) : 3100 (2480 - 3720)

Management Strategy: Recreational
 Percent population is above (+) or below (-) objective: 56%
 Number of years population has been + or - objective in recent trend: 3
 Model Date: 02/23/2020

Proposed harvest rates (percent of pre-season estimate for each sex/age group):

	<u>JCR Year</u>	<u>Proposed</u>
Females ≥ 1 year old:	10.4%	14.7%
Males ≥ 1 year old:	35.5%	36%
Total:	18%	21%
Proposed change in post-season population:	10.9%	-12.9%



2020 HUNTING SEASON

West Green River Herd Unit (EL428)

Hunt Area	Hunt Type	Archery Dates		Season Dates		Quota	Limitations
		Opens	Closes	Opens	Closes		
102	Gen	Sept. 1	Sept. 30	Oct. 15	Oct. 24		Any elk
102	Gen			Oct. 25	Oct. 31		Antlerless elk
102	6	Sept. 1	Sept. 30	Oct. 15	Nov. 30	200	Cow or calf
102	7	Sept. 1	Sept. 30	Dec. 15	Jan. 31	100	Cow or calf
103	Gen	Sept. 1	Sept. 30	Oct. 15	Oct. 24		Any elk
103	Gen			Oct. 25	Oct. 31		Antlerless elk
103	6			Aug. 15	Aug. 31	150	Cow or calf valid on or within one-quarter (1/4) mile of irrigated land
103	6	Sept. 1	Sept. 30	Oct. 15	Oct. 31		Cow or calf
103	6			Dec. 15	Jan. 31		Cow or calf
104	Gen	Sept. 1	Sept. 30	Oct. 15	Oct. 24		Any elk
104	Gen			Oct. 25	Oct. 31		Antlerless elk
104	6	Sept. 1	Sept. 30	Oct. 15	Nov. 30	300	Cow or calf, also valid in Area 105 in Lincoln County
104	7			Aug. 15	Aug. 31	150	Cow or calf valid on or within one-quarter (1/4) mile of irrigated land
104	7	Sept. 1	Sept. 30	Dec. 15	Dec. 31		Cow or calf, also valid in Area 105 in Lincoln County
104	7			Jan. 1	Jan. 31		Cow or calf valid west of U.S. Highway 30 and east of Lincoln County Road 207 or east of Rock Creek within the Twin Creek drainage
105	Gen	Sept. 1	Sept. 30	Oct. 1	Oct. 31		Any elk

2019 Hunter Satisfaction: 57.8% Satisfied, 22.6% Neutral, 19.7% Dissatisfied

2020 Management Summary

1.) Hunting Season Evaluation: For 2020 season setting, we will increase antlerless harvest substantially. Following an elk sightability survey in January of 2020 it is obvious that the previous level of antlerless harvest was not sufficient to hold the population within the objective range. We have reevaluated harvest strategies and will offer higher quotas and longer seasons in multiple hunts in 2020 to reduce the population toward objective.

Elk damage situations exist on irrigated land in Hunt Areas 103 and 104. To address this we have Type 7 licenses valid in August. These licenses are only good on or within ¼ mile of irrigated lands. Considerable numbers of elk have been wintering close to Highway 30 in Nugget Canyon. Several groups of elk have crossed into Hunt Area 105. There is concern that more elk may get pushed across the highway during late season hunts. We do not want large numbers of elk in Hunt Area 105 due to potential competition on extensive mule deer winter ranges and lack of support for elk with private landowners in the area. When they do cross, they end up in an unintended sanctuary from hunting in Hunt Area 105. To address this we are going to allow segments of 104 type 6 and type 7 seasons to also be valid in the northern portion (within Lincoln County) of Hunt area 105.

For 2020 we will further increase elk hunting opportunity to reduce elk numbers in Hunt Area 105 by moving the either sex general season opener from October 15th to October 1st. This will allow general hunting during the second half of the rut. This will also lengthen the season from 17 days to 31 days. This season will overlap the general deer hunt allowing combination hunts. This will put more hunting pressure on elk in the area especially on public accessible lands.

2.) Management Objective: The management objective is a post-season population objective of 3,100 elk. It is also managed under recreational management. The Herd unit objective and management strategy were last reviewed in 2018. At that time, we went through an internal review of the objective and harvest strategy, and found that no changes were advised.

3.) Fossil Butte National Monument: In recent years, the number of elk moving onto Fossil Butte National Monument (FBNM) prior to the season has increased, and is estimated to be around 600-800 animals. Radio collar data suggests a significant number of animals move onto the Monument in early September, immediately after the opener of the archery season. As with most lands administered by the National Park Service, FBNM is closed to hunting. As the number of elk on FBNM has increased, it has become increasingly difficult to manage this herd to objective while providing huntable numbers of elk for sportsmen.

4.) Sightability: Elk aerial surveys are conducted biennially in the West Green River Elk Herd. Classification data is also collected during these flights. All known occupied elk winter range is flown in Hunt Areas 102, 103 and 104. Some small parts of Area 105 are flown but not all of Area 105 is flown due to the large geographic area and very low elk densities. The survey was most recently flown in January 2020. Total numbers of elk observed were 4,647. The Idaho sightability model was used to estimate a total population for the area flown. That estimate was 4,721 elk with a standard error of 21.12. Good coverage of occupied elk winter habitat was achieved in the survey. However, there are some peripheral habitats that were not flown due to budget constraints. For population modeling we have added 100 animals to the estimate and enlarged the SE to account for those areas. This is a very low sightability correction. On these surveys a low sightability correction factor is normal and is produced due to large groups of elk in high snow cover and open environments. This creates survey conditions where very few elk are missed during helicopter surveys.

5.) Population Modeling Issues: The population model no longer functions in this herd unit. The model cannot reconcile data on the current population level, bull:cow ratios and bull harvest. We do not know if this is a data issue or a model issue but it has been the case for over 6 years, and the model is currently nonfunctional and unable to track observed numbers. There are many herd units in Wyoming where spreadsheet models are not functioning for modeling elk populations. We rely largely on the aerial survey population estimates for population management in the West Green River herd unit. and the model has finally quit functioning. There are many

herd units in Wyoming where spreadsheet models are not functioning for modeling elk populations. We rely largely on the aerial survey population estimates for population management.

6.) Comingling with Livestock: Conflict with agriculture producers can be an issue for this elk herd. Damage complaints occur during all bad winters, but are less common during “normal” winters. Unfortunately, 3 of the past 4 winters have been worse than the average in regards to snowfall and temperatures. Elk comingling with livestock during winter is relatively uncommon, and only in limited areas, but is considered an annual issue. Past problems have typically been dealt with successfully if the Department was notified. The area is in the brucellosis surveillance area, despite the fact the area has extremely low brucellosis prevalence in elk, and never has had a positive brucellosis test in elk near to livestock. Regardless, brucellosis concerns occur among livestock producers throughout the herd unit, especially in the areas near Cokeville (Areas 103 and 104).

2019 - JCR Evaluation Form

SPECIES: Elk

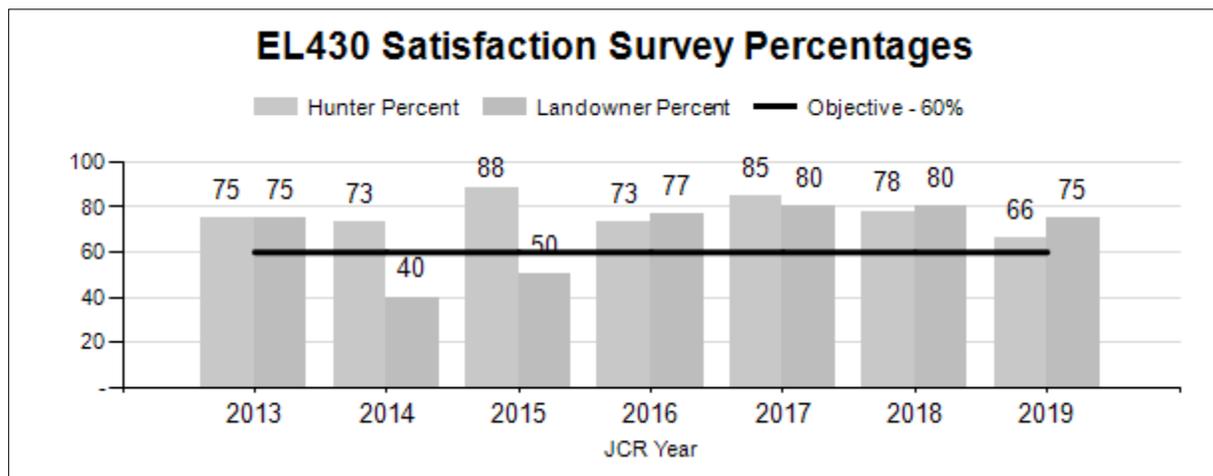
PERIOD: 6/1/2019 - 5/31/2020

HERD: EL430 – PETITION

HUNT AREAS: 124

PREPARED BY: PHILIP DAMM

	<u>2014 - 2018 Average</u>	<u>2019</u>	<u>2020 Proposed</u>
Hunter Satisfaction Percent	79%	66%	65%
Landowner Satisfaction Percent	68%	75%	80%
Harvest:	123	113	115
Hunters:	177	113	185
Hunter Success:	69%	100%	62%
Active Licenses:	177	189	190
Active License Success:	69%	60%	61%
Recreation Days:	1,240	1,581	1,600
Days Per Animal:	10.1	14.0	13.9
Males per 100 Females:	0	0	
Juveniles per 100 Females	0	0	
Satisfaction Based Objective			60%
Management Strategy:			Recreational
Percent population is above (+) or (-) objective:			10%
Number of years population has been + or - objective in recent trend:			0



**2020 Hunting Seasons
Petition Elk Herd Unit (EL430)**

Hunt Area	Type	Archery Dates		Season Dates		Quota	Limitations
		Opens	Closes	Opens	Closes		
124	1	Sep. 1	Sep. 30	Oct. 15	Nov. 30	50	Any elk
124	4	Sep. 1	Sep. 30	Oct. 15	Nov. 30	150	Antlerless elk
124	4			Dec. 1	Dec. 31		Antlerless elk valid east of Sweetwater County Road 19, and north and east of BLM Roads 4409 and 4411, and west of BLM Road 3310 and Sweetwater County Road 23S

2019 Hunter Satisfaction (Obj.=60%): 66% Satisfied, 18% Neutral, 16% Dissatisfied
2019 Landowner Satisfaction (Obj.=60%): 80% At Desired Levels, 0% Above, 20% Below
2019 3-year Average Age of Bull Elk Harvested: 6.4 (current year 6.6)

2020 Management Summary

1.) Hunting Season Evaluation: Landowner satisfaction, hunter satisfaction, and average age of bull elk harvested (objectives established 2013) all indicated management objectives were being met. As always, changes in numbers and distribution of elk were not estimable due to the size of and relatively low elk density across the herd unit. Hunter satisfaction decreased nominally (~10%) from previous years, though interestingly success and effort (days per harvest) remained fairly stable over the last three years. With concerns for habitats impacted by elk in this xeric area, our proposal was to continue to limit growth through higher cow harvest across the area, with a season extension in the northern portion of the herd unit where landowner concerns arise. Bull harvest is proposed to remain limited to maintain age and antler size. Though above average winter severity in the area in 2018 and 2019 affected other wild ungulates, elk were unlikely to have been affected. Feral horse HMAs across the unit were significantly above AML; e.g., Adobe Town HMA was about triple AML. These feral horses affected elk distribution and populations through exclusion from water resources and habitat degradation.

2.) Tooth Data: Absolute averages for age of harvested bull elk continued to be problematic; however, relative ages over time were still assessed for season setting. Low sample sizes were observed, but biased sample sizes were the main concern. Little to no participation by landowner license holders within the herd unit likely artificially decreased averages, as information garnered on these harvested bulls indicated they were of older age classes. Low participation was also observed in hunters that harvested young bulls due to lack of interest in the age, which would have the opposite effect of the landowner licenses. Comparing age data to another similar herd was of some value, as tooth samples in the Steamboat elk herd were also collected, as it's managed under special criteria. Average in that herd was 6.4, with a three-year average of 6.2, which was slightly below Petition's at 6.6 and 6.4, respectively. These ages indicated phenomenal existing opportunity to harvest mature bulls in Petition, which was only managed recreationally.

2019 - JCR Evaluation Form

SPECIES: Moose

PERIOD: 6/1/2019 - 5/31/2020

HERD: MO415 - UINTA

HUNT AREAS: 27, 35, 44, 901-902

PREPARED BY: JEFF SHORT

	<u>2014 - 2018 Average</u>	<u>2019</u>	<u>2020 Proposed</u>
Population:		N/A	N/A
Harvest:	17	20	18
Hunters:	17	22	20
Hunter Success:	100%	91%	90 %
Active Licenses:	17	22	20
Active License Success:	100%	91%	90 %
Recreation Days:	146	208	160
Days Per Animal:	8.6	10.4	8.9

Limited Opportunity Objective:

5-year median age of > 4 years for harvested moose

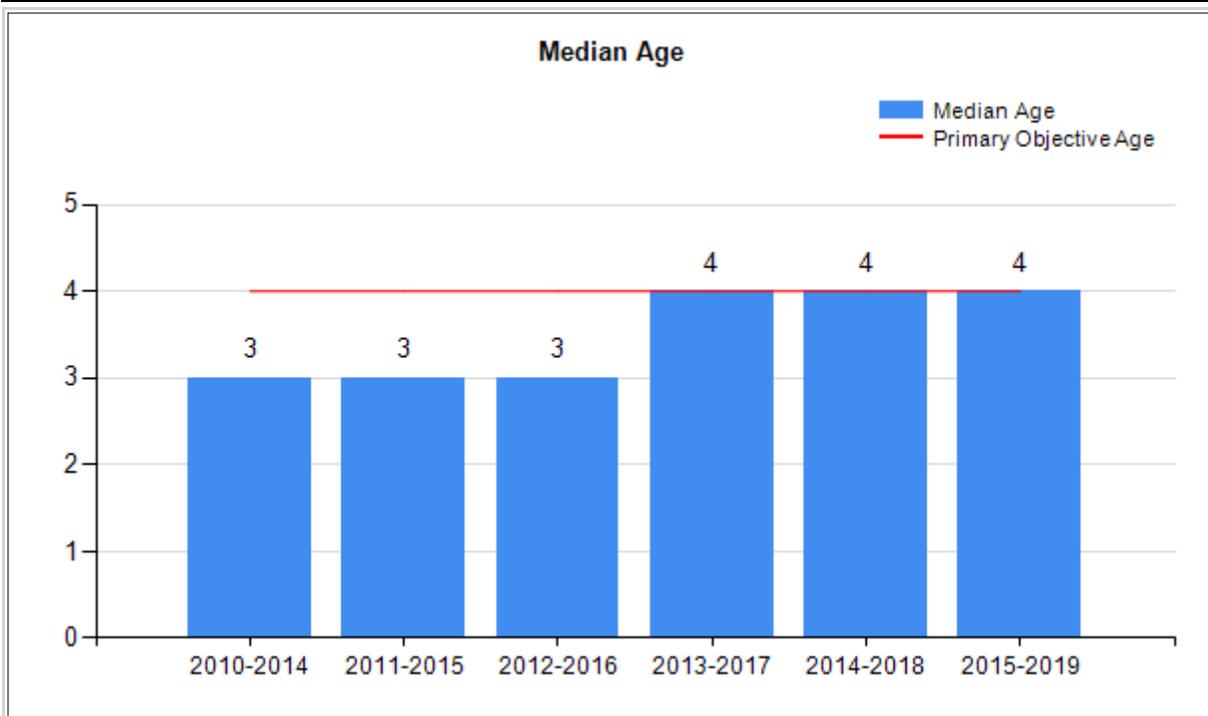
5-year average of <= 10 days/animal to harvest

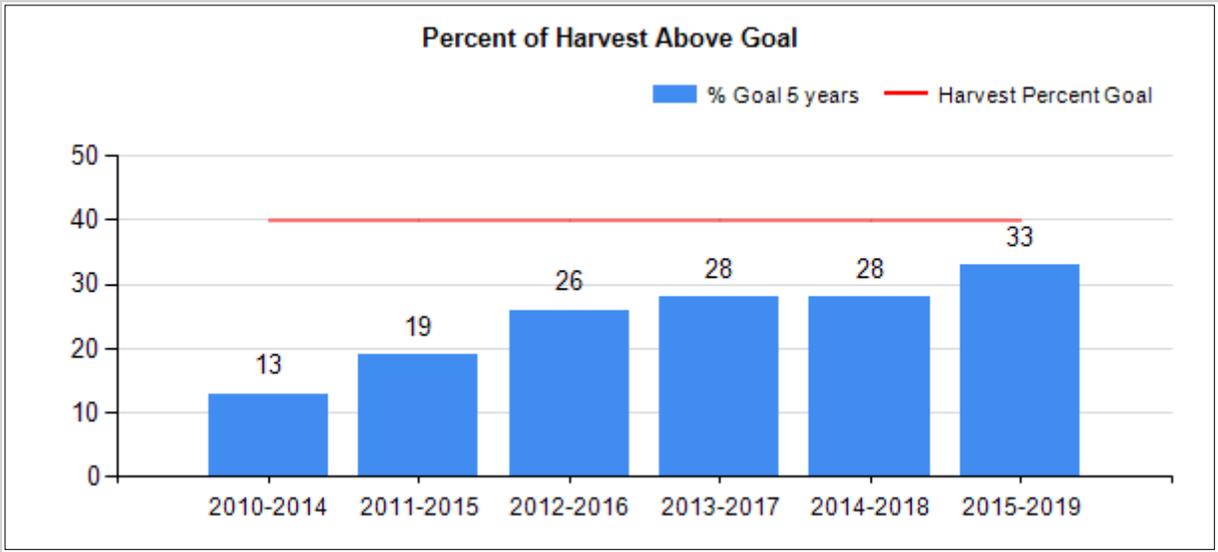
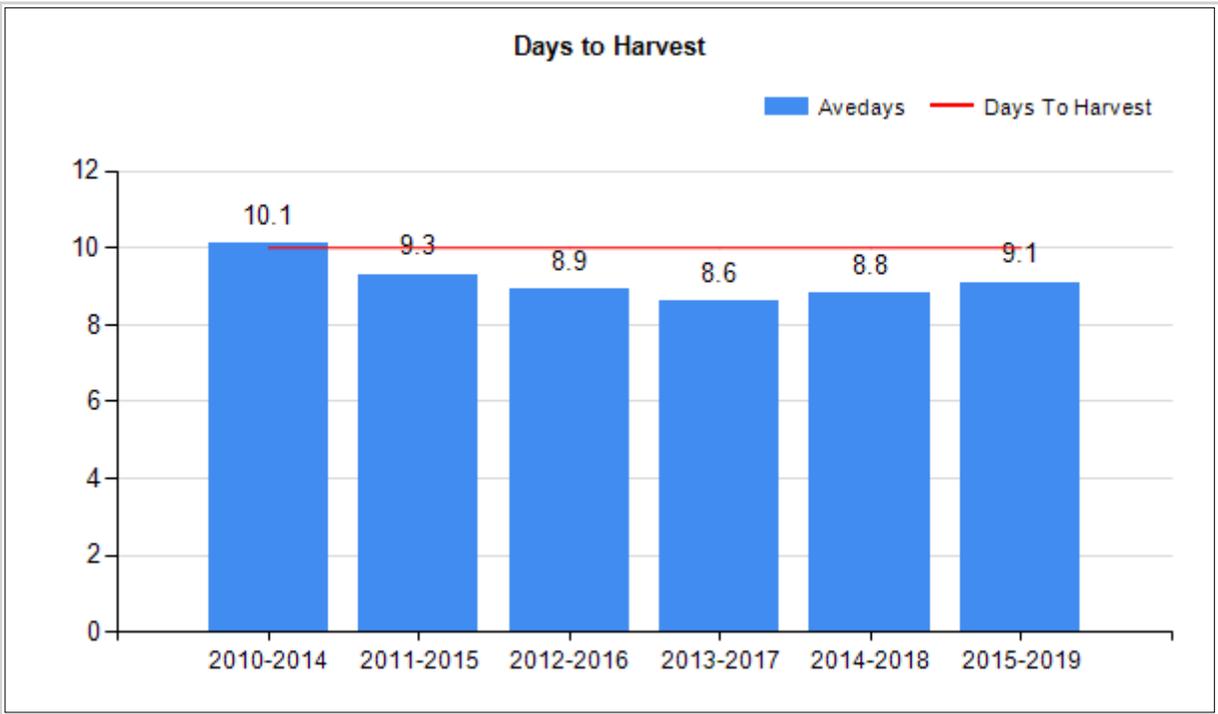
Secondary Objective:

5-year average of 40% of harvested moose are > 5 years of age

Management Strategy:

Special





2020 HUNTING SEASONS

Uinta Moose Herd Unit (MO415)

Hunt Area	Hunt Type	Archery Dates		Season Dates		Quota	Limitations
		Opens	Closes	Opens	Closes		
27	1	Sept. 1	Sept. 30	Oct. 1	Nov. 20	15	Antlered moose
35	1	Sept. 1	Sept. 30	Oct. 1	Nov. 20	5	Antlered moose

2019 Hunter Satisfaction: NA

2020 Management Summary

1.) Hunting Season Evaluation: The Uinta Moose Herd has a limited opportunity type objective. The objective is based on harvest data and has two parts. The primary objective is to have a median age of Harvest ≥ 4 years and have an average days per harvest of ≤ 10 days. The secondary objective is to have 40% of the male harvest ≥ 5 years of age. For these we use 5 year average timelines for better sample sizes.

Based on recent harvest data, we believe we can offer the same opportunity for hunters as the previous year. We are above objective for both parts of the primary objective criteria and trending toward objective for the secondary objective criteria.

Hunt Area 44 will be open for hunting in 2020. It will be hunted in conjunction with Hunt Area 33. The hunt will be listed as 33,44 and listed in the Lincoln Moose Herd document. The hunt will be a Type 1 and good for any moose, except cow moose with calf at side. It will offer 3 licenses (2 residents, 1 nonresident). No antlerless harvest will be allowed in the rest of herd unit. This is an effort to allow maximum growth of the herd. However, hunting is not likely to be the limiting factor for this herd.

2.) Management Objective: The objective and management strategy were revised in 2014. During that objective review process we moved to a new objective type for this herd. Due to the issues associated with modeling and tracking this population we switched from a population based objective to a harvest statistic based objective. This entailed age of harvest objectives and an average days per harvest objective seen in the graphs above. In 2019 we went through an internal review of the objective and harvest strategy. The recommendation for the Uinta Moose Herd was to maintain the newly adopted harvest statistic based objective. 2014 was the first year of this type of objective option. Since there are very low harvest sample sizes averages over time will be most useful. There is also an unknown amount of variation around tooth cementum analysis estimates of age.

2019 - JCR Evaluation Form

SPECIES: Moose

PERIOD: 6/1/2019 - 5/31/2020

HERD: MO417 - LINCOLN

HUNT AREAS: 26, 33, 36, 40

PREPARED BY: JEFF SHORT

	<u>2014 - 2018 Average</u>	<u>2019</u>	<u>2020 Proposed</u>
Population:	728	681	598
Harvest:	44	36	45
Hunters:	46	39	50
Hunter Success:	96%	92%	90%
Active Licenses:	46	39	55
Active License Success:	96%	92%	82%
Recreation Days:	356	318	400
Days Per Animal:	8.1	8.8	8.9
Males per 100 Females	40	68	
Juveniles per 100 Females	43	31	

Population Objective (± 20%) : 1000 (800 - 1200)

Management Strategy: Special

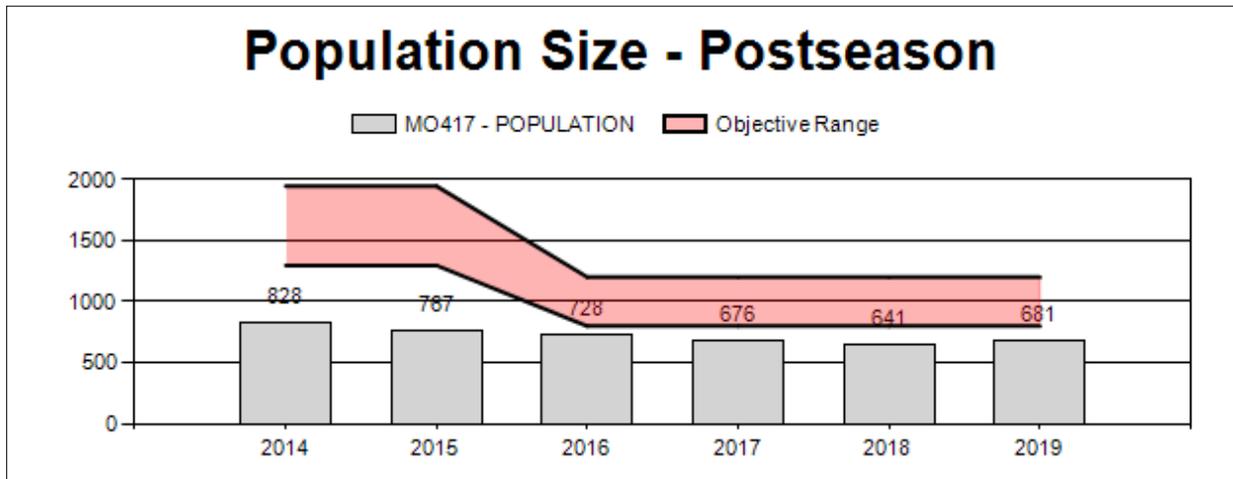
Percent population is above (+) or below (-) objective: -31.9%

Number of years population has been + or - objective in recent trend: 5

Model Date: 02/23/2020

Proposed harvest rates (percent of pre-season estimate for each sex/age group):

	<u>JCR Year</u>	<u>Proposed</u>
Females ≥ 1 year old:	0%	0%
Males ≥ 1 year old:	18.9%	27.4%
Total:	5.2%	7.1%
Proposed change in post-season population:	-5%	-14.8%



2020 HUNTING SEASONS

Lincoln Moose Herd Unit (MO417)

Hunt Area	Hunt Type	Archery Dates		Season Dates		Quota	Limitations
		Opens	Closes	Opens	Closes		
26	1	Sept. 1	Sept. 30	Oct. 1	Oct. 31	39	Antlered moose; (32 residents, 7 nonresidents)
33,44	1	Sept. 1	Sept. 30	Oct. 1	Oct. 31	3	Any moose, except cow moose with calf at side; (2 residents, 1 nonresident)
33	4	Sept. 1	Sept. 30	Oct. 1	Oct. 31	2	Antlerless moose, except cow moose with calf at side; (2 residents)
36	1	Sept. 1	Sept. 30	Oct. 1	Oct. 31	5	Antlered moose
40	1	Sept. 1	Sept. 30	Oct. 1	Oct. 31	3	Antlered moose; (3 residents)
40	4	Sept. 1	Sept. 30	Oct. 1	Oct. 31	3	Antlerless moose, except cow moose with calf at side; (2 residents, 1 nonresident)

2019 Hunter Satisfaction: NA

2020 Management Summary

1.) Hunting Season Evaluation: In 2019 we collected harvest data on moose including tooth age and antler spread data. Harvest data from 33, 36 and 40 does not provide much information given low sample size. Harvest from Area 26 results in a better sample size due to license numbers. In 26, tooth age data suggests an average age of harvest of 3.55 years old for 2019. Average antler spread was 34.95 for 209.

Harvest opportunity has been limited in this herd unit. In the late 2000s we dramatically reduced the number of licenses due to a population crash related to the parasite *Elaeophora schneiderii*. Since then, populations have stabilized and started to grow again. Hunts have very good success rates. Hunt Area 26 is considered a very good quality moose hunt with potential for trophy animals. Area 26 has ample public access and a variety of places to hunt moose. Hunts in areas 33, 36 and 40 are considered good hunts with good success rates but require more time to find moose spread out over large areas. Public access can be more challenging in these areas but access to moose hunting is available. Those areas are not typically considered trophy areas but mature animals do exist and are harvested occasionally.

In Hunt Area 26 we increased licenses from 33 to 39. This is to offer more opportunity since the area is at the upper end of the bull:cow ratio objective and recent sightability survey data suggests additional moose are available for harvest. License numbers issued in Area 26 are used to balance out to multiples of five within the herd unit and across the state for other hunts that have less than 5 licenses.

In Hunt Areas 36 and 40 we will keep the same number of license as last year. We are adding a type 4 hunt to Area 40 to address problem moose and overall moose numbers on the agricultural lands there.

Hunt Area 33 has a limited number of moose. They primarily occur within cottonwood and willow habitats associated with the Green River, including Seedskafee National Wildlife Refuge. Area 33 has been closed to hunting since 2017, but will be open (in conjunction with Area 44) in 2020. Given its low altitude and ease of access, hunter success is expected to be high.

2.) Management Objective: The Lincoln Moose Herd has a population objective of 1,000 moose. In addition to the population-based objective, the Lincoln Herd Unit also has two secondary objectives. Those objectives are to have a median age of harvested bulls ≥ 4 years old and a bull:cow ratio range of 50-70 males/100 females. The objective and management strategy were last revised in 2016.

3.) Sightability: Moose aerial surveys are conducted biennially in Hunt Area 26 concurrent with West Green River Elk surveys. Classification data is also collected during these flights. Areas 33, 36 and 40 are not flown due to the large geographic area and very low moose densities. The joint elk and moose survey was flown in January 2020. Total numbers of moose seen were 404. The Idaho sightability model was used to estimate a total population for the area flown. That estimate was 547 moose with a standard error of 6.63. Good coverage of occupied moose winter habitat was achieved in the survey. However, there are some peripheral habitats that are not flown due to budget constraints. For population modeling we have added 50 animals to the estimate and enlarged the SE to account for those areas.