

TECHNICAL INFORMATION FOR BIGHORN SHEEP RULE DEVELOPMENT 2027-2031



PURPOSE

Maintain current bighorn sheep populations and manage for older age class rams in both Rocky Mountain and desert herds across New Mexico.

BIGHORN SHEEP BIOLOGY

Bighorn sheep population growth is driven by both adult female and lamb survival. Because bighorn sheep populations are small, the Department manages populations to maintain a huntable number of older age class males. Bighorn sheep biology and the Department's harvest strategy mean that few ram hunting opportunities exist. Populations are monitored annually and hunting opportunities are based upon survey observations. In some Rocky Mountain bighorn populations, the Department may implement limited female harvest to achieve population goals.

Disease is a primary threat to wild sheep populations throughout North America. Most concerning are respiratory pathogens carried by domestic sheep and goats. Although domestic sheep and goats may be unaffected by these pathogens, cross-transmission during comingling events can result in severe pneumonia and possibly die-offs in wild bighorn sheep populations. Many states rely on cooperation from neighboring stakeholders and members of the public to improve separation techniques and to alert state wildlife management agency personnel when contact between wild sheep and domestic sheep and goats is observed.

BIGHORN SHEEP HARVEST METRICS

In consideration of the most recent and best available data for a given population, a suite of metrics is used to guide tag allocation for ram harvest. The metrics that guide license determination for rams are the average number across the following factors: 2.5% of total minimum count, 2.5% of total estimate, 10% of total rams observed, 10% of total ram estimate, 25% of Class III and Class IV rams observed, and 25% of Class III and Class IV ram estimate. The estimate terms are derived by multiplying the observed count by a correction factor that is independently determined for each population under the assumption that surveys are imperfect and individuals in a given population are inevitably missed due to a suite of factors that limit visibility. Other criteria, including age and sex ratios, are also factored in when determining annual tag quotas. Lamb to ewe ratios provide a metric of productivity within a population. A lamb:ewe ratio range between 20-40:100 is generally desirable for maintaining a stable to increasing population. Consistent lamb:ewe ratios <20:100 can result in declining population abundance over time.

A commonly prescribed male:female ratio for social ungulates is 20:100 in the presence of regulated harvest. This is considered biologically "safe", because enough males remain on the landscape to meet breeding requirements while having no impact on population productivity. NMDOW considers a desirable ram:ewe ratio range to be between 20-40:100 as this objective retains additional rams for breeding, ensures maintenance of age structure diversity among the male segment of the population, and improves hunting and viewing opportunities. A ram ratio <20:100 may reduce harvest opportunities and can pose problems for reproductive phenology, productivity, and recruitment within a population.

Figure 1. The total number of ram licenses issued annually for Rocky Mountain bighorn sheep and harvest rate as a percentage of the statewide estimate (N) 2008-2025.

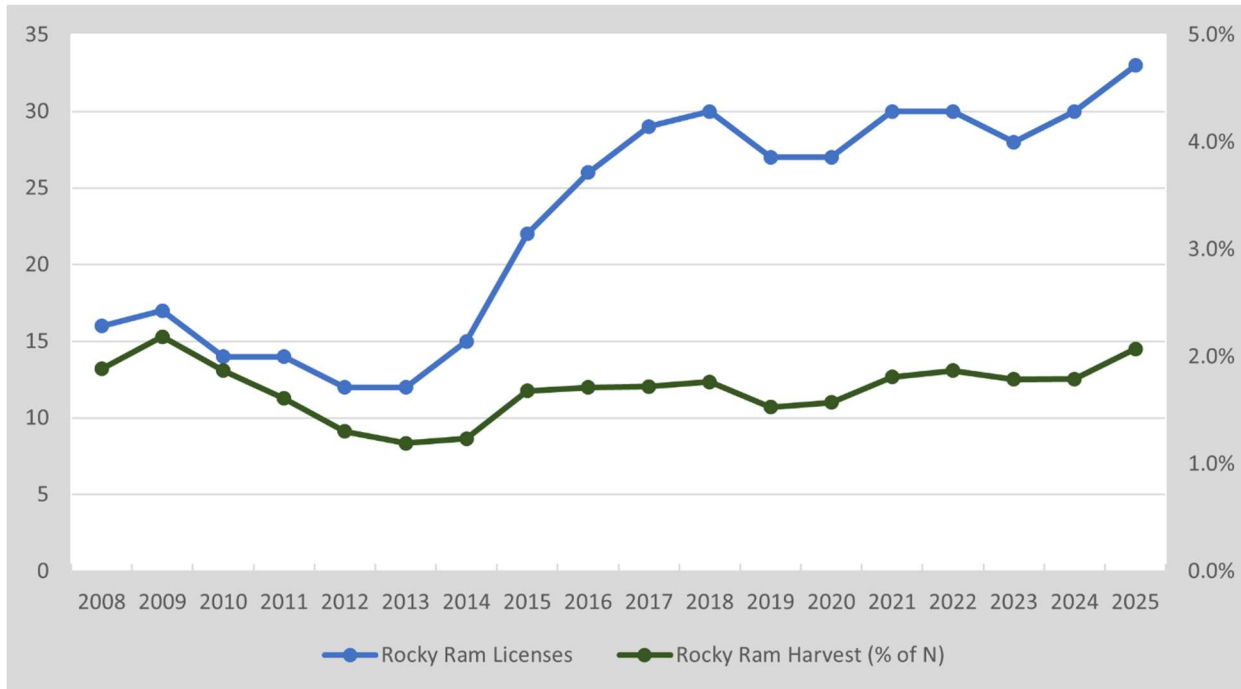


Figure 2. The total number of ram licenses issued annually for desert bighorn sheep and harvest rate as a percentage of the statewide estimate (N) 2012-2025.

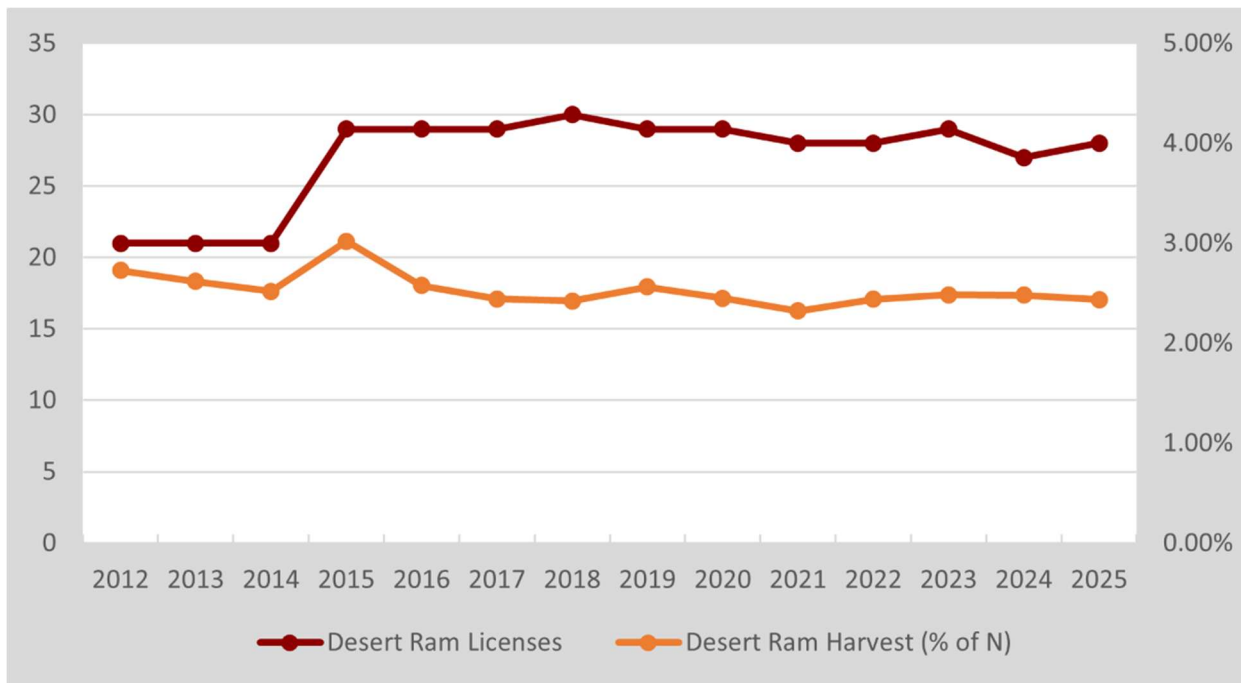


Figure 3. The total number of public Rocky Mountain and desert bighorn sheep licenses issued annually, 2008-2026.

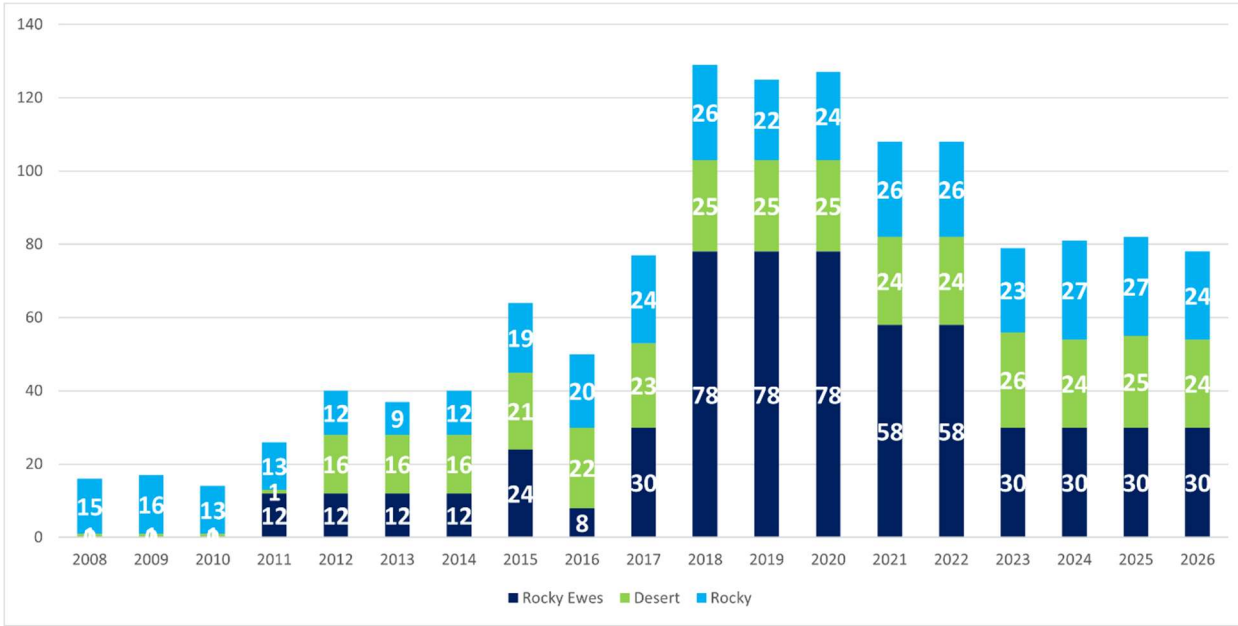


Figure 4. (A) Five-year (2021-2025) average ram score for Rocky Mountain bighorn in New Mexico within discrete populations and across all populations. (B) Five-year (2021-2025) average age-at-harvest for Rocky Mountain bighorn rams in New Mexico within discrete populations and across all populations combined. The abbreviations for discrete populations are: Pco = Pecos, Ltr = Latir, Jz = Jemez, Cu = Culebras, RGG = Rio Grande Gorge, SF/TC = San Francisco/Turkey Creek, and DC = Dry Cimarron. Note the Jemez score is averaged across two years only, the inaugural 2024 and 2025 hunt seasons for this population.

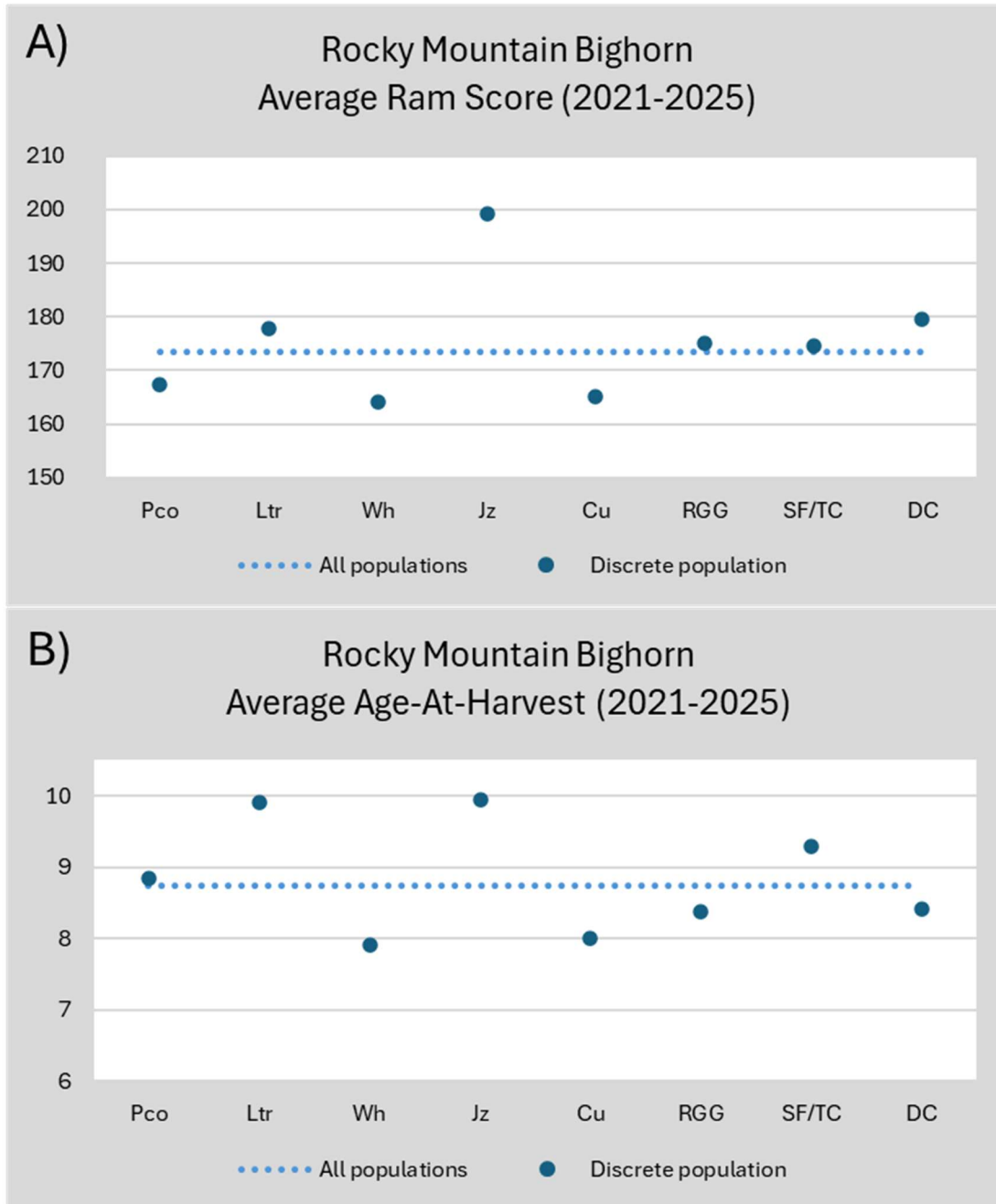


Figure 5. (A) Five-year (2021-2025) average ram score for desert bighorn in New Mexico within discrete populations and across all populations combined. (B) Five-year (2021-2025) average age-at-harvest for desert bighorn rams in New Mexico within discrete populations and across all populations combined. The abbreviations for discrete populations are: Pel = Peloncillos, BH/AH = Big Hatchets/Alamo Huecos, LH = Little Hatchets, Cab = Caballos, Lad = Ladrons, FC = Fra Cristobals, and SA = San Andres.

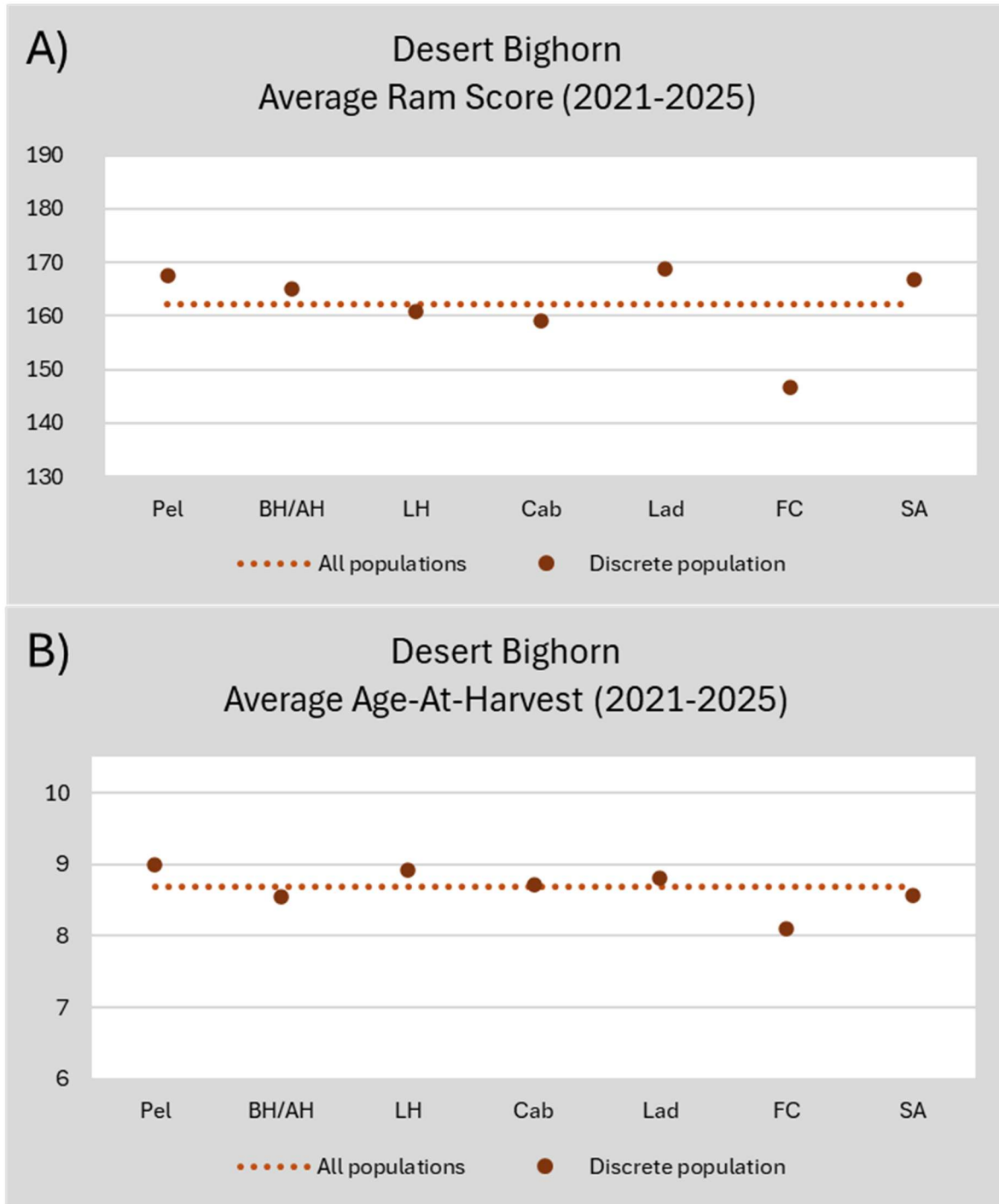


Table 1. Bighorn sheep harvest results, 2023-2024.

Type	Hunt Code	Weapon	Bag Limit	# Sold	# Reporting	% Reporting	Success Rate*	Rams	Ewes	Satisfaction Rating	Days Hunted
Public	BHS 1-201	Any	Ram	23	23	100%	100%	22	.	4.7	1.8
	BHS 1-202	Any	Ewe	19	15	79%	64%	.	7	3.1	1.1
	BHS 2-203	Bow	Ewe	10	9	90%	33%	.	2	2.6	1.9
	BHS 1-204	Any	Ram	26	26	100%	100%	26	.	4.0	3.0
Private	BHS 1-201	Any	Ram	3	3	100%	100%	3	.	.	.
	BHS 1-204	Any	Ram	1	1	100%	100%	1	.	.	.
Auction	BHS 1-500	Any	Ram	2	2	100%	100%	2	.	.	.
Raffle	BHS 1-600	Any	Ram	2	2	100%	100%	2	.	.	.
				86	81	96%	87%	56	9	3.6	2.0

*Success Rate applies to hunters that went afield

Table 2. Bighorn sheep harvest results, 2024-2025.

Type	Hunt Code	Weapon	Bag Limit	# Sold	# Reporting	% Reporting	Success Rate*	Rams	Ewes	Satisfaction Rating	Days Hunted
Public	BHS 1-201	Any	Ram	27	27	100%	96%	23	.	4.7	3
	BHS 1-202	Any	Ewe	18	18	100%	53%	.	8	4.3	2
	BHS 2-203	Bow	Ewe	10	6	60%	50%	.	2	4.5	7.3
	BHS 1-204	Any	Ram	24	24	100%	96%	22	.	4.5	3.9
Private	BHS 1-201	Any	Ram	1	1	100%	100%	1	.	.	.
	BHS 1-204	Any	Ram	1	1	100%	100%	1	.	.	.
Auction	BHS 1-500	Any	Ram	2	2	100%	100%	2	.	.	.
Raffle	BHS 1-600	Any	Ram	2	2	100%	100%	2	.	.	.
				85	81	96%	87%	51	10	4.5	4.1

*Success Rate applies to hunters that went afield

Table 3. Bighorn sheep harvest results, 2025-2026.

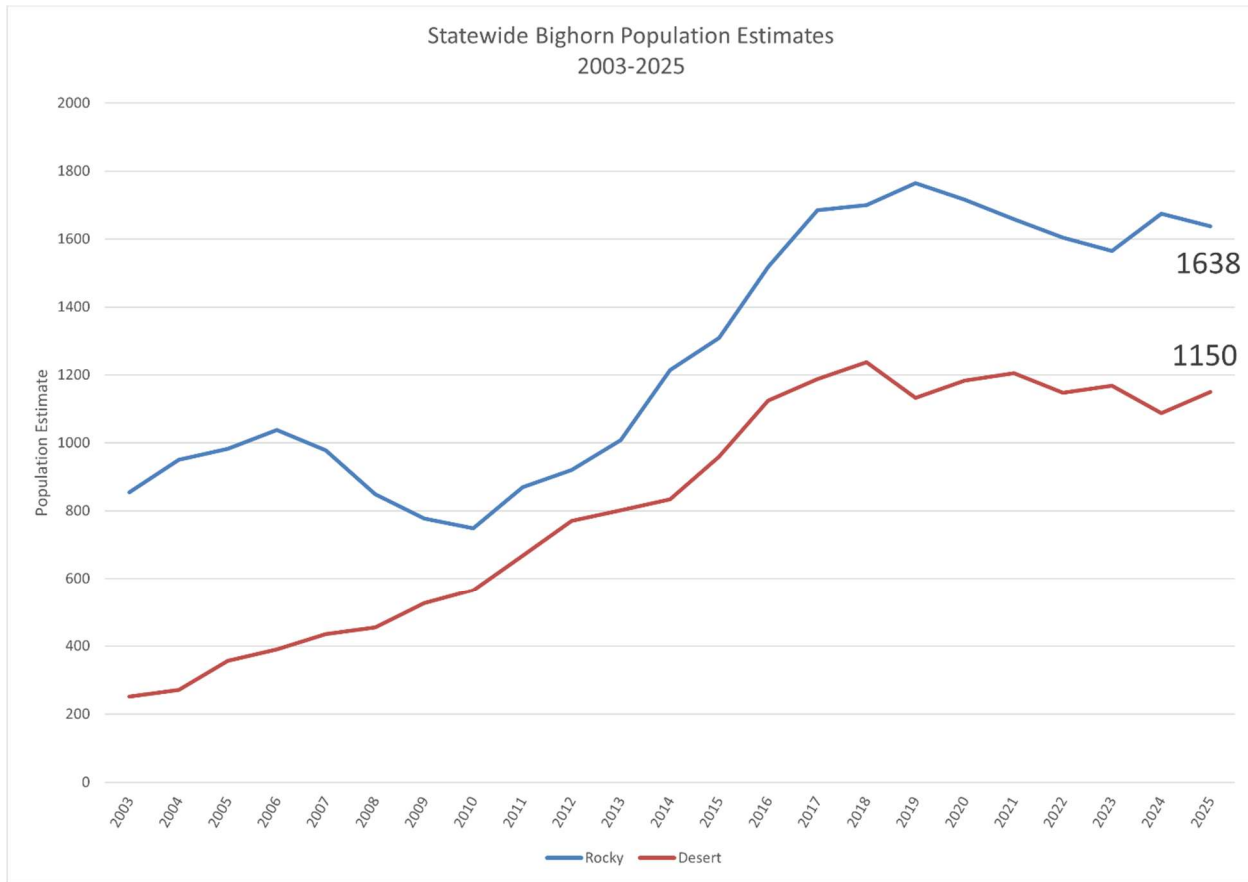
Type	Hunt Code	Weapon	Bag Limit	# Sold	# Reporting	% Reporting	Success Rate ¹	Rams	Ewes	Satisfaction Rating ²	Days Hunted ²
Public	BHS 1-201	Any	Ram	28	28	100%	100%	28	.	4.5	2.1
	BHS 1-202	Any	Ewe	20	15	75%	80%	.	8	4	1.6
	BHS 2-203	Bow	Ewe	9	9	100%	50%	.	4	3.9	2.9
	BHS 1-204	Any	Ram	25	25	100%	100%	25	.	4.6	2.9
Private	BHS 1-201	Any	Ram	3	3	100%	100%	3	.	.	.
	BHS 1-204	Any	Ram	1	1	100%	100%	1	.	.	.
Auction	BHS 1-500	Any	Ram	2	2	100%	100%	2	.	.	.
Raffle	BHS 1-600	Any	Ram	2	2	100%	100%	2	.	.	.
				90	85	97%	91%	61	12	4.3	2.4

¹Applies to hunters that went afield

²Applies to hunters that completed harvest report

BIGHORN SHEEP POPULATION TRENDS AND METRICS

Figure 6. Midpoint population estimates for Rocky Mountain and desert bighorn sheep, 2003-2025.



Rocky Mountain Bighorn Sheep

Table 4. Summer/Fall lamb:ewe ratios and population estimates for Rocky Mountain bighorn sheep populations in New Mexico, 2025-2026. Estimate trends are noted as increasing (+), stable (=), and decreasing (-).

Herd	L:E (lambs/100 ewes)	Population Estimate
Pecos	41:100	340-390 =
Wheeler Peak	17:100	165-215 =
Latir	70:100	65-80 =
Culebra	70:100	55-75 =
Rio Grande Gorge	25:100	200-250 =
Dry Cimarron	34:100	190-230 ⁻¹
San Francisco River	31:100	50-80 =
Turkey Creek	0:100	30-40 =
Manzanos	Not surveyed	50-70 =
Jemez	25:100	225-300 =
Red River Valley	Not surveyed	75-100 =
Totals	35:100	1,445-1,830 Midpoint= 1,638

¹ Population estimate increased as of February 2026 aerial survey, but trend is decreasing due to disease onset in April 2026

Table 5. Pecos bighorn sheep helicopter surveys, 2017–2025.

Year	Tot	Ewe	Y. Ewe	L	Y. R	CI	CI I	CIII	CIV	Tot Ram	Unk	L:E	Est. No	Type
2017 July	277	134		51		7	36	26	23	92		38:100	350-400	A (2.5)
2018 July	324	178	1	77		13	15	12	28	68		43:100	350-400	A (2.9)
2019 July	289	167		38		13	21	18	32	84		23:100	310-360	A (2.7)
2020 July	315	187		53		5	19	22	29	75		28:100	340-390	A (2.0)
2022 July	357	204		75		7	13	14	30	64	14E	37:100	380-420	A (1.9)
2023 July	293	180	3	39		17	8	15	28	68	3	22:100	350-400	A (1.9)
2024 July	321	151	5	75		11	22	21	37	91		48:100	350-400	A (2.0)
2025 August	261	156		64		3	7	9	18	41		41:100	340-390	A (2.1)

Table 6. Wheeler Peak Rocky Mountain bighorn sheep aerial (A) and ground (G) surveys, 2017–2025.

Year	Tot	Ewe	Y. Ewe	L	YR	CI	CII	CIII	CIV	Tot Rams	Unk	L:E	Est. No	Type
2017 August	133	77	5	32	2	8	3	6	0	19	19	39:100	230-275	G
2018 July	174	81		33	3	15	11	11	20	60	60	41:100	230-275	A (1.8)
2019 July	176	96		14		14	5	10	23	14* 61	14	69:100	265-300	A (1.4)
2021 July	165	52	11	19		6	9	15	11	71	30/12	30:100		G
2022 July	200	138		20		14	6	12	10	42	42	65:100	230-275	A (1.7)
2023 July	153	94	1	17		6	1	3	7	40	1/23 R*	82:100	175-225	A (1.7)
2023	72	32		9	1	2	1	1	1		25	28:100	175-225	G
2024	152	82		44		4		11	12	27		54:100	175-225	A (1.3)
2024	46	25	2	7		1	4	3	2	10	2	28:100	175-225	G
2025	97	75	2	13		1		2	4	7		17:100	165-215	A (1.1)

Table 7. Latir Rocky Mountain bighorn sheep aerial (A) and ground (G) surveys, 2017–2025.

Year	Tot	Ewe	Y. Ewe	L	YR	CI	CII	CIII	CIV	Tot Ram	Unk	L:E	Est. No	Type
2017 August	43	28	2	3		2	7		1	10		10:100	60-70	G
2017 October	43	18		5		2	7	6	5	20		28:100	60-70	A (0.8)
2018 July	43	28		3		2	4	3	3	12		11:100	55-70	A (1.0)
2019 July	55	33		1		2	4	8	7	21		3:100	60-75	A (0.6)
2019 August	36	27		7		2				2		26:100	60-75	G
2021 July	62	25	2	10	4	3	5			25	13R	34:100	65-80	G
2022 July	63	31		12*		2	4	9	5	20		39:100	65-80	A (0.6)
2023 July	29	5		2		4	5	7	6	22		40:100	65-80	A (0.7)
2024 July	38	14	1	1 1			1	2	9	12		73:100	65-80	A (0.5)
2024 August	45	22		17		1	1	1	3	6		77:100	65-80	G
2025 August	29	10		7		1		7	4	12		70:100	65-80	A (0.5)

Table 8. Culebra Rocky Mountain bighorn sheep aerial (A) and ground (G) surveys, 2017–2025.

Year	Tot	Ewe	Y. Ewe	L	YR	CI	CII	CIII	CIV	Tot Ram	Unk	L:E	Est. No	Type
2017 July	38	25	0	7		1	0	5	0	6	5*	28:100		A
2017 August	63	28	4	21		1	3	1		8	5*	66:100	65-70	G
2018 July	52	31		18		1		1	1	3		58:100	55-60	A (1.1)
2018 August	50	33		16		1				1		48:100	55-60	G
2019 July	48	32		15		1				1		47:100	55-60	A (0.9)
2019 August	48	22	4	10	4	1	2	1	1	9	3	38:100	55-60	G
2020 August	60	34	1	14		6	2	1	2	11		40:100	60-65	G
2021 July	41	14	2	10		5	1		2	8	7	62:100	55-75	G
2022 July	37	27		9			1			1		33:100	55-75	A (0.7)
2022 August	35	16	7	8	1	3				4		50:100	55-75	G
2023 July	8	3		1		1				1				A (0.7)
2023 July	40	23		12		1	2			3	2	52:100	55-75	G
2024 July	22	14		5			1	1				36:100	55-75	A (0.7)
2024 August	33	19		10				1	1			53:100	55-75	G
2025 July	37	25		7			2				4	28:100	55-75	G
2025 August	33	18		14		1				1		78:100	55-75	A (0.4)

Table 9. Rio Grande Gorge Rocky Mountain bighorn sheep fall ground (G) surveys, 2014–2025.

Year	Tot	Ewes	Y. Ewe	Lambs	CI	CII	CIII	CIV	Total Rams	Unk	L:E	Est. No.	Type
2014	227	106	9	22	9	33	32	12	86		27:100	230-250	G
2015	245	113		57	9	26	27	9	71		69:100	265-290	G
2016	222	80	9	33	18	11	19	10	58		73:100	320-350	G
2017	271	118	11	45	35	23	16	17	84		35:100	355-400	G
2018	291	104	10	34	20	40	30	14	104		30:100	375-420	G
2019	296	78	7	50	19	32	23	9	83		54:100	375-420	G
2020	288	93	10	23	24	44	47	18	133		22:100	375-420	G
2021	210	89	3	14	11	32	35	19	100		16:100	290-320	G
2022	153	71	6	9	8	11	36	12	67		11:100	225-275	G
2023	176	63	7	9	13	23	33	11	80		14:100	225-275	G
2024	132	56	7	13	2	11	21	18	55	3	23:100	225-275	G
2025	55	37	1	16	1			1	2		43:100	200-250	A (2.2)
2025	178	85	7	23	6	6	25	21	58	4	25:100	200-250	G

Table 10. Dry Cimarron Rocky Mountain bighorn sheep ground (G) surveys, 2014–2026.

Year	Tot	Ewes	Y. Ewe	Lambs	CI	CII	CIII	CIV	Unk	Tot Rams	L:E	Est. No	Type
2014	86	41		19	5	6	14	1		26	46:100	105-130	G
2015	110	47		27	7	6	10	12	1	36	57:100	105-130	G
2016	116	52		28	7	7	15	3	4	36	52:100	145-165	G
2017	140	66	1	34	10	7	11	9	2	39	50:100	170-190	G
2018	140	64		32	12	11	13	8		44	50:100	170-190	G
2019	118	60	2	22	6	8	14	6		34	37:100	150-170	G
2020	125	56	4	24	9	14	13	5		31	40:100	150-170	G
2021	138	61	10	23	10	15	9	10		33	32:100	155-175	G
2022	138	67	6	28	5	15	9	8		37	38:100	155-175	G
2023	140	61	6	25	8	15	13	10	2	48	41:100	155-175	G
2024	115	53		24	4	5	14	15		38	28:100	155-175	G
2026	206	105		36	10	16	13	26		65	34:100	190-230	A (5.25)

Table 11. San Francisco River Rocky Mountain bighorn sheep aerial (A) and ground (G) surveys, 2012–2025.

Year	Tot	Ewes	Y. Ewe	Lambs	CI	CII	CIII	CIV	UNK	Tot Rams	L:E	Est. No	Type
2012	11	4		3			1	2	1	3	75:100	20-30	A (2.2)
2013	25	8		8	2		5	3		10	100:100	25-35	A (3.7)
2014	72	27	2	16		1	12	6	8	27	59:100	75-90	A (2.2)
2015	47	21	2	4	2	1	10	7		20	19:100	50-75	A (3.2)
2016	58	34		9	1	3	7	4		15	26:100	65-80	A (3.5)
2018	29	18	3	5	2	1				3	28:100	50-70	A (2.8)
2019	47*	23				4	4		16	8	0:100	50-70	A
2021	35	18		8	3	2	3	1		9	44:100	50-70	A (1.9)
2023	79	26		11	14	7	9	12		31	42:100	80-100	A (2.7)
2024	25	16		3		1	3	2		6	19:100	50-80	A (4.0)
2025	31	13		4	2	1	1	10	0	14	31:100	50-80	A (3.0)
2025*	9	4		1		1		3		4	25:100	10-20	A (0.5)

*Saddle Mountain

Table 12. Turkey Creek Rocky Mountain bighorn sheep aerial (A) and ground (G) surveys, 2009–2025.

Year	Tot	Ewes	Y. Ewe	Lambs	CI	CII	CIII	CIV	UNK	Tot Rams	L:E	Est. No	Type
2009	38	12	4	8	1	1	5	3	4	14	50:100	50-70	A (2.6)
2010	14	3		2	1		4	4		9	67:100	30-50	A (2.5)
2012	4	4									0:100	15-30	A (2.2)
2012	9	3		2		3	1			4	67:100	15-30	A (2.0)
2013	4	1					2	1		3	0:100	20-25	A (1.8)
2013	18	12		2		1		3		4	17:100	20-25	G
2015	16										0:100		
2018	1	1									0:100	20-30	A (2.0)
2018	30	12	3	5	3	2	2	2		9	33:100	30-35	Photo
2023	7	7									0:100	20-30	A (1.2)
2024	23	12		4		1	2	4		7	33:100	30-40	A (5.0)
2025	5	2	2					1			0:100	30-40	A (1.5)

Table 13. Manzanos Rocky Mountain bighorn sheep aerial (A) and ground (G) surveys, 2010–2024.

Year	Tot	Ewes	Y. Ewe	Lambs	CI	CII	CIII	CIV	Tot Rams	L:E	Est. No	Type
2010	17	10		4	2			1	3	40:100	25-35	G
2012	27	9	4	6	2	3		1	6	67:100	30-40	G
2012	51	30	4	10	1	5		1	7	20:100	52-60	G
2013	41	20	2	9	4	4	1		9	45:100	45-55	G
2014	45	37				1	5	2	8	0:100	45-55	G
2014	52	24	6	15	4	3			7	63:100	52-60	G
2015	35	21	2	7	1	1	3		5	33:100	36-50	G
2015	52	26	2	9	3	8	4		15	37:100	52-60	G
2018	48	25	2	8	1	2	7	3	13	32:100	50-70	A (2.9)
2019	55	19	2	12	3	5	12	2	22	63:100	60-80	G
2022	50	11	4	8	2	9	3	7	22	73:100	50-70	G
2024	55	22		7	1	5	7	13	26	32:100	50-70	G

Table 14. Jemez Rocky Mountain bighorn sheep aerial (A) and ground (G) surveys, 2015–2025.

Year	Tot	Ewes	Y. Ewe	Lambs	CI	CII	CIII	CIV	Tot Rams	L:E	Est. No	Type
2015	48	28	3	0	4		1	2	6	0:100	45	Release
2016	62	28	2	15	10	4		3	17	54:100	60-75	G
2017	65	38	5	10	6	5	1		12	15:100	105-115	G
2018	15	4		4		6	1		7	27:100	120-140	G
2019	86	56	2	20	7	1			8	36:100		G
2021	89	51		7	3	4	12	7	26	14:100	150-200	A(3.1)
2022	76	38		23	2	1	8	4	15	61:100		G
2023	88	59		17	3		5	12	20	28:100	150-200	A(1.4)
2024	134	74		22	4	5	6	28	43	30:100	225-300	A(4.2)
2025	86	40		20	3	4	4	13	24	50:100	225-300	A (4.8)

Desert Bighorn Sheep

Table 15. Summer/Fall lamb:ewe ratios and population estimates for desert bighorn sheep populations in New Mexico, 2025. Estimate trends are noted as increasing (+), stable (=), and decreasing (-).

Herd	L:E (lambs/100 ewes)	Population Estimate
Peloncillos	13:100	60-70 ¹ -
Big Hatchets	53:100	85-115 =
Alamo Huecos	40:100	50-80 =
Little Hatchets	60:100	85-105 =
Ladrons	39:100	125-175 =
Sacramentos	Insufficient data	70-80 + ²
San Andres	36:100	210-250 =
Caballos	27:100	200-230 =
Fra Cristobals	25:100	130-180 =
Totals	37:100	1,015-1,285 Midpoint = 1,150

¹Estimate following release of 32 desert bighorn from Red Rock

²Increasing following release of 37 desert bighorn from Caballos

Table 16. Peloncillo Mountains desert bighorn sheep spring helicopter survey results 2009–2025.

Year	Total	Ewes	Y. Ewe	Lambs	CI	CII	CIII	CIV	Total Rams	L:E	Est. No	Type (hours)
2009	44	20	2	10	2	2	7	1	12	50:100	75-85	A (7.1)
2010	49	17	3	10	3	3	5	8	19	59:100	75-85	A (3.7)
2011	54	20	4	12	0	1	11	7	19	60:100	70-85	A (3.7)
2012	56	26	2	18	1	1	3	5	10	69:100	110-135	A (4.1)
2013	62	34	5	7	5	1	8	2	16	21:100	100-125	A (4.1)
2014	46	24	2	10	5	1	2	2	10	42:100	85-110	A (2.1)
2015	79 (86)	36	6	12	12	4	2 (+7)*	7	25	29:100	90-115	A (3.9)
2016	103	51	1	38	3	6	1	3	13	73:100	125-145	A (4.1)
2017	99	42	5	21	4	5	11	9	29	45:100	130-150	A (6.0)
2018	98	51	2	19	1	6	12	7	26	36:100	130-150	A (4.5)
2019	105	49	1	19	4	4	9	19	36	38:100	140-160	A (6.2)
2021	81	47	2	19	0	2	3	8	13	39:100	120-140	A (4.9)
2022	50	22	0	14	1	1	5	7	14	64:100	120-140	A (4.1)
2023	29	8	1	4	2	0	6	5	13	44:100	75-125	A (3.6)
2024	24	14	0	6	0	2	1	1	4	43:100	40-60	A (6.5)
2025	20	7	1	1	1	2	0	8	11	13:100	30-40	A (7.5)
2025	32	15	1			4	5	7	16		60-70	Release

Table 17. Big Hatchet desert bighorn sheep helicopter survey results 2010–2025. All surveys were performed in the spring unless otherwise noted.

Year	Total	Ewes	Y. Ewe	Lambs	CI	CII	CIII	CIV	Total Rams	L:E	Est. No.	Type (hours)
2010	57	22	0	11	2	4	7	12	25	50:100	65-70	A (3.5)
2011	47	12	4	9	6	1	9	6	22	56:100	60-75	A (4.4)
2012 ^a	71	27	0	13	4	8	6	13	31	48:100	75-85	A (5.1)
2013 ^a	51	21	2	1	9	5	6	7	27	4:100	55-65	A (5.7)
2014 ^a	47	18	1	6	3	9	4	6	22	32:100	55-65	A (4.4)
2014 Nov	113	46	1	6	0	0	0	0	58	13:100	120-130	Additional release
2015 ^a	99*	47	3	15	2	7	6	19	34	30:100	120-150	A (6.4)
2016	116	47	10	21	7	9	10	12	38	37:100	135-155	A (5.5)
2017	112	45	6	17	4	16	9	15	44	33:100	135-155	A (5.9)
2018	84	34	2	18	6	5	8	11	30	50:100	110-140	A (5.25)
2019	68	31	2	16	2	3	6	8	19	48:100	85-115	A (4.3)
2021	71	28	4	16	2	3	4	15	24	47:100	85-115	A (4.0)
2022	73	32	2	16	1	7	3	12	23	47:100	85-115	A (4.4)
2023	68	32	0	17	2	3	5	8	18	53:100	85-115	A (4.5)
2024	45	19	0	8	4	2	5	7	19	42:100	85-115	A (4.3)
2025	66	25	7	12	3	8	5	10	26	48:100	85-115	A (4.5)

*99 observed + 20 missed collars—some may have been in Little Hatchets

^a = autumn

Table 18. Alamo Huecos desert bighorn sheep spring helicopter survey results 2017–2025.

Year	Total	Ewes	Y. Ewe	Lambs	CI	CII	CIII	CIV	Total Rams	L:E	Est. No.	Type (hours)
2017	10	4	3	1	0	2	0	0	2	25:100		
2021	46	23	4	0	4	6	3	6	19	0:100	50-55	Release
2022	38	17	0	6	0	3	9	3	15	35:100	50-55	A (3.2)
2023	30	8	1	5	0	0	4	12	16	56:100	50-55	A (2.3)
2023	28	11	1	2	0	0	7	7	14	18:100	50-80	Release
2024	45	22	2	21	0	0	0	0	0	95:100	50-80	A (0.8)
2025	40	20	8	8	0	0	0	3	3	40:100	50-80	A (3.2)

Table 19. Little Hatchets desert bighorn sheep helicopter survey results 2008–2025. All surveys were performed in the spring unless otherwise noted.

Year	Total	Ewes	Y. Ewe	Lambs	CI	CII	CIII	CIV	Total Rams	L:E	Est. No.	Type (hours)
2008	58	19	2	12	6	4	4	9+2	25	63:100	60-65	A (2.15)
2009	43	16	3	9	1	3	5	6	15	47:100	65-70	A (2.6)
2010 _a	45	17	0	6	4	4	9	5	22	35:100	60-70	A (1.4)
2012 _a	41	18+4	0	4	1	5	8	5	19	58:100	60-70	A (0.6)
2013 _a	66	27	0	13	7	7	5	7	26	48:100	75-85	A (2.4)
2014 _a	57	27	1	5	9	10	3	1	23	18:100	60-70	A(1.75)
2015	68	27	5	10	10	3	12	1	26	31:100	75-85	A (1.9)
2016	89	42	2	23	4	5	6	7	22	52:100	90-110	A (2.2)
2017	52	24	6	13	4	2	1	2	9	43:100	70-90	A (2.3)
2019	72	29	1	16	3	6	3	14	26	53:100	75-90	A (?)
2021	48	19	4	6	0	7	6	6	19	26:100	70-90	A (2.6)
2022	39	16	1	11	1	2	4	4	11	65:100	45-65	A (2.1)
2023	47	21	2	9	6	1	6	1	15	41:100	45-65	A (2.2)
2024	79	34	2	18	4	6	2	13	25	53:100	90-110	A (3.0)
2025	63	20	11	12	3	6	4	7	20	60:100	85-105	A (2.1)

a = autumn

Table 20. Ladron desert bighorn sheep aerial (A) and ground (G) survey results, 2010–2025. All surveys were performed in the spring unless otherwise noted.

Year	Total	Ewes	Y. Ewe	Lambs	CI	CII	CIII	CIV	Total Rams	L:E	Est. No.	Type (hours)
2010	29	9	1	7	2	3	4	3	12	70:100	35-45	A (6.7)
2011	3	1	1	1	0	0	0	0	0	50:100		A (6.4)
2012 _a	48	23	1	8	1	4	6	5	16	33:100	50-60	A/G
2013 _a	57	18	0	11	3	5	10	7	25	61:100	65-75	A/G
2014	40	12	1	11	4	1	6	5	16	92:100	70-80	A (6.7)
2016 _a	49	18	2	5	3	2	2	6	13	25:100	80-90	A/G
2018	121	58	0	30	9	3	5	9	26	46:100	125-150	A (11.9)
2019	47	24	3	8	5	3	2	1	11	30:100		G
2021	161	92	2	23	7	6	20	11	44	24:100	185-215	A (7.1)
2022	53	22	1	4	4	2	11	9	26	17:100	185-215	A (2.4)
2024	105	41	6	20	1	9	4	24	38	44:100	125-175	A (7.1)
2025	90	44	3	17	5	4	4	13	26	39:100	125-175	A (4.0)

a = autumn

Table 21. Sacramento desert bighorn sheep aerial (A) and ground (G) survey results, 2018–2025.

Year	Tot	Ewes	Y. Ewe	Lambs	CI	CII	CIII	CIV	Total Rams	Unk	L:E	Est. No.	Type (hours)
2018	34	18	1	0F/6M		6	2	1				30	Release
2019	17	10		5		1	1					30-40	G
2020	24	20			2		2					61-71	
2021	34	20				6	5	3	14		0:100	35-45	A (1.9)
2022	41	21	6			7	3	3	13	1	28:100	41-45	G
2023	38	21	4		7	1		5	13		19:100	41-45	A (3)
2024	29	16		3	2	2	2	4	10		19:100	40-45	A (2.5)
2025	5	3	2									30-35	A (4.2)
2025	37	27	2		1	4	3	0	8			70-80	Release

Table 22. San Andres desert bighorn sheep aerial (A) and ground (G) surveys, 2007–2025.

Year	Tot	Ewes	Y. Ewe	Lambs	CI	CII	CIII	CIV	Total Rams	Unk	L:E	Est. No.	Type (hours)
2007	72	36		12	4	4	12	4	24		33:100	80-90	A (7.6)
2008	73	31	5	9	6	8	11	3	28		29:100	85-95	A (12.6)
2009	69	32	3	12	4	3	10	5	22		38:100	95-105	G
2010	115	44	8	15	8	14	15	11	48		34:100	115	Est.
2012	102	56	2	11	1	10	7	15	33		20:100	110-125	A (15.8)
2015	174	81	4	12	7	20	19	30	76		15:100	110-125	A (17.9)
2016	142	71		22	5	12	11	20	48	1	31:100	180-220	A (15.9)
2017	190*	93	1	25	10	15	17	29	71		27:100	200-240	A (20.8)
2019	174	72	3	21	12	22	26	15	75		29:100	210-250	A (14.7)
2021	178	84	7	24	8	21	14	20	63		29:100	185-225	A (13.4)
2022	50**	27	2	3	3	2	8	6	19		11:100	190-230	A (4.6)** inc. survey
2024	153	86	3	18	1	10	5	30	46		21:100	180-220	A (17.7)
2025	228	117	3	43	5	15	14	27	61		36:100	210-250	A (13.8)

Table 23. Caballos desert bighorn sheep aerial (A) and ground (G) surveys, 2012–2025.

Year	Tot	Ewes	Y. Ewe	Lambs	CI	CII	CIII	CIV	Total Rams	Unk	L:E	Est. No.	Type (hours)
2012	93	37	4	18	4				30		44:100	95-100	G
2013	85	34	3	13	9	8	9	9	35		38:100	105-115	A (5.8)
2014	67	30	1	7	2	7	9	11	29		23:100	105-115	A (5.4)
2015	115	48	2	14	3	18	10	20	51		29:100	125-145	A (6.4)
2016	130	50	3	29	3	15	13	17	48		55:100	145-165	A (4.7)
2017	165	74	1	28	9	22	13	18	62		38:100	170-190	A (3.9)
2018	199	74	9	41	17	17	25	15	74	1	49:100	200-230	A (6.1)
2019	187	86	2	25	9	35	23	6	73		28:100	230-260	A (5.3)
2021	143	69	14	25	4	5	19	6	34		30:100	220-250	A (5.0)
2022	133	58	3	13	7	7	23	21	58	1	22:100	175-205	A (5.2)
2023	216	82	4	51	6	17	33	18	74	4	59:100	210-240	A (4.3)
2024	70	45		10	2	1	2	9	14		22:100	210-240	A (1.6)
2025	185	88	6	25	7	25	11	21	64		27:100	200-230	A (4.2)

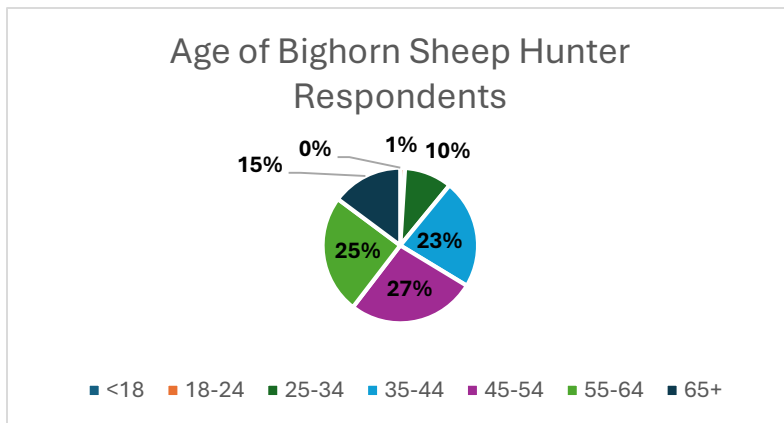
Table 24. Fra Cristobals desert bighorn sheep aerial (A) and ground (G) surveys, 2015–2025.

Year	Tot	Ewes	Y. Ewe	Lambs	CI	CII	CIII	CIV	Total Rams	Unk	L:E	Est. No.	Type (hours)
2015	193	72	8	31	16	21	28	17	81		39:100	230-250	A (5.4)
2015	221	108	10	34	11	22	14	22	68		31:100	230-260	A (5.4)
2016	263	110		68	2	39	28	13	83	1	62:100	290-320	A (5.3)
2017	272	138	7	40	14	32	31	10	87		29:100	300-350	A (5.8)
2017	242	112	14	27	15	30	36	8	89		21:100	300-350	A (6.3)
2018	179	77	2	25	22	27	24	2	75		32:100	225-275	A (5.8)
2019	134	52	5	12	6	16	34	9	64		21:100	160-210	A (4.7)
2020	112	54		26	4	9	12	7	32		48:100	165-215	A
2021	117	65	6	18	6	5	13	4	28		25:100	160-180	A (3.4)
2023	132	68	1	28	7	6	17	4	34	1	41:100	160-200	A (3.7)
2024	64	12		2	13	7	8	12	48	10	17:100	130-180	A (3.0)
2025	101	54	2	14	2	8	13	8	31		25:100	130-180	A (2.9)

Appendix A. Results of questionnaire distributed to all past bighorn sheep hunters. This report was generated on 3/16/2026. In total, 259 responses were received.

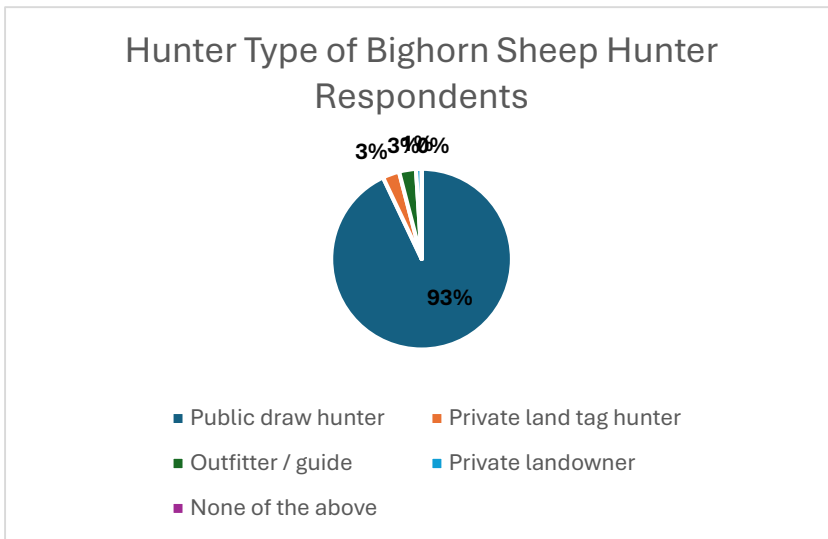
Respondent Background:

Age:



Response	Count	Percentage
<18	0	0%
18-24	2	1%
25-34	26	10%
35-44	58	23%
45-54	69	27%
55-64	64	25%
65+	38	15%

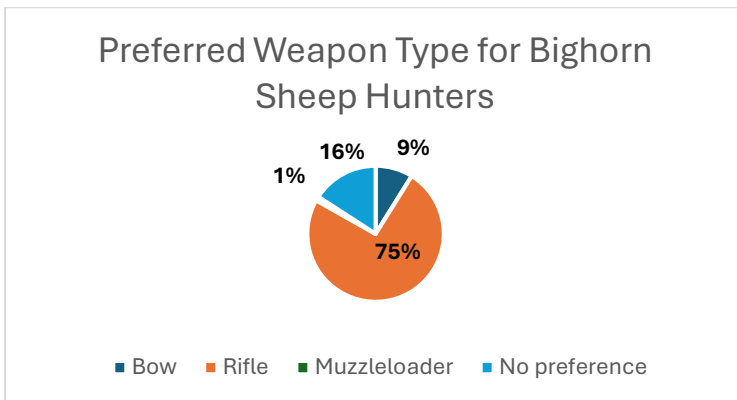
Hunter Type:



Response	Count	Percentage
Public draw hunter	239	93%
Private land tag hunter	8	3%
Outfitter / guide	7	3%
Private landowner	2	1%
None of the above	0	0%

Hunting Insights

Preferred Weapon Type

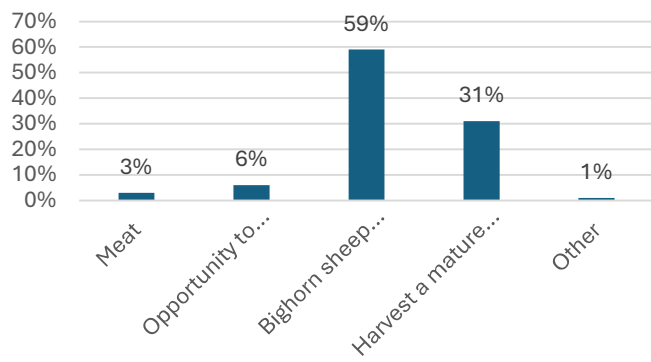


Response	Count	Percentage
Bow	22	9%
Rifle	193	75%
Muzzleloader	2	1%
No preference	40	16%

Primary Objectives

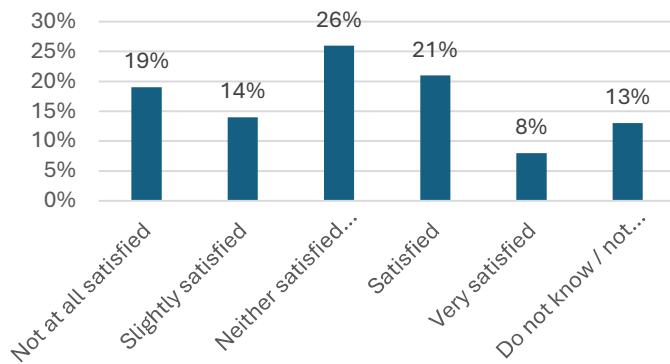
Response	Count	Percentage
Meat	8	3%
Opportunity to hunt big game species	15	6%
Bighorn sheep hunting experience	152	59%
Harvest a mature ram	80	31%
Other	2	1%

Primary Objectives of Bighorn Sheep Hunters



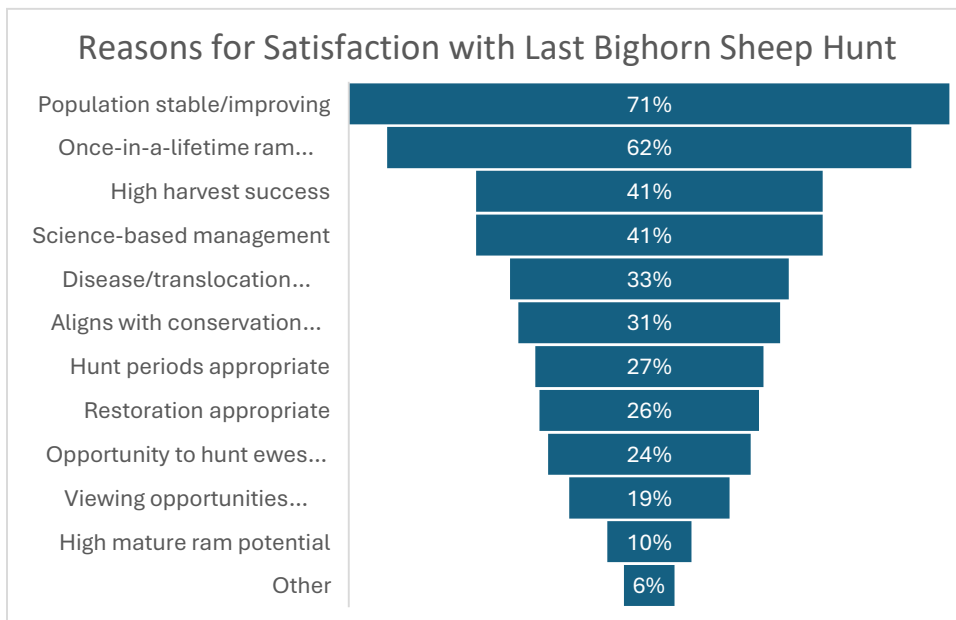
Most Recent Hunt Experience

Hunter Satisfaction with Last Bighorn Sheep Hunt



Response	Count	Percentage
Not at all satisfied	48	19%
Slightly satisfied	35	14%
Neither satisfied nor dissatisfied	66	26%
Satisfied	53	21%
Very satisfied	21	8%
Do not know / not applicable	33	13%

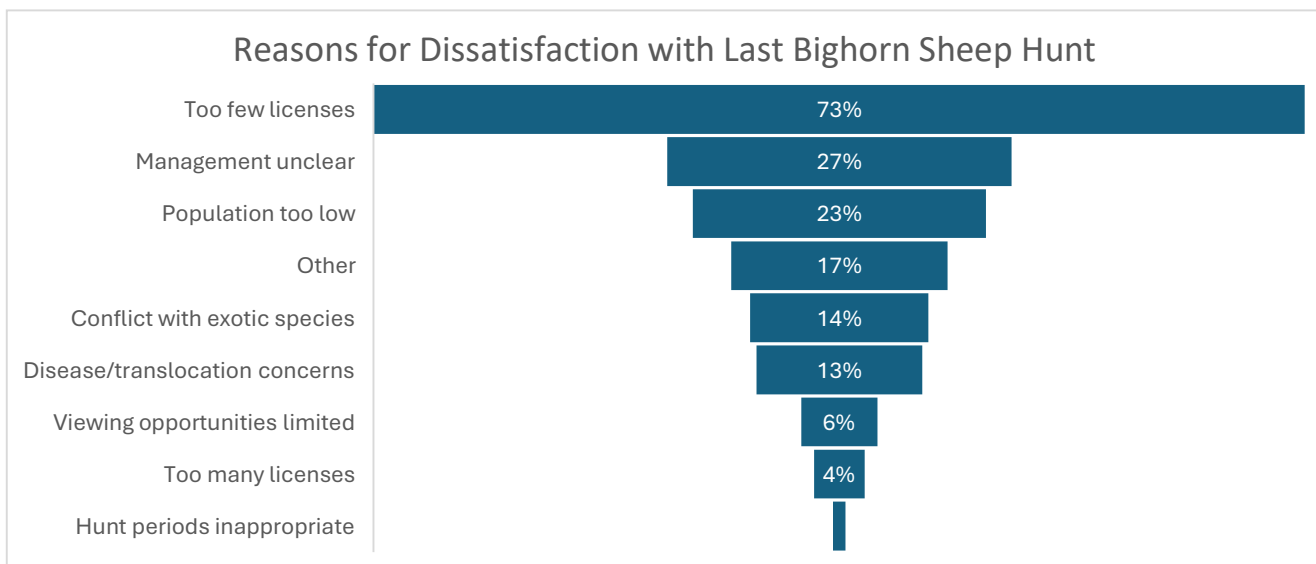
Reasons for Satisfaction (asked to those that indicated some level of satisfaction)



Primary (top 3) reasons hunters were satisfied with most recent hunt:

Population stable/improving	120	71%
Once-in-a-lifetime ram licenses	105	62%
High harvest success	70	41%

Reasons for Dissatisfaction (asked to those that indicated some level of dissatisfaction)

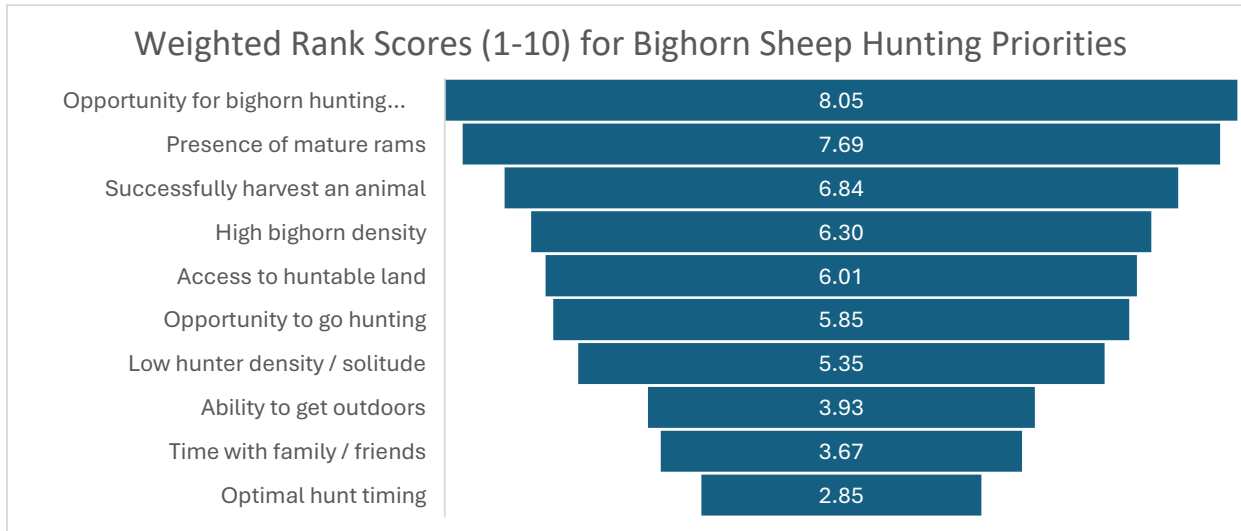


Primary (top 3) reasons hunters were dissatisfied with most recent hunt:

Too few licenses	136	73%
Management Unclear	51	27%
Population too low	43	23%

Ranking Question

- Quantified weighted scores, can break down further if needed



Category	R1	R2	R3	R4	R5	R6	R7	R8	R9	R10
High bighorn density	11%	12%	15%	11%	13%	8%	12%	6%	8%	2%
Successfully harvest an animal	17%	10%	18%	12%	16%	7%	9%	5%	6%	0%
Presence of mature rams	19%	28%	16%	12%	5%	8%	7%	3%	0%	1%
Low hunter density / solitude	1%	4%	15%	17%	17%	14%	9%	6%	14%	5%
Access to huntable land	5%	9%	14%	17%	14%	17%	9%	10%	3%	3%
Opportunity for bighorn hunting experience	40%	13%	11%	8%	12%	12%	3%	2%	0%	0%
Optimal hunt timing	0%	4%	2%	8%	7%	4%	10%	3%	10%	53%
Ability to get outdoors	3%	6%	6%	5%	6%	6%	11%	23%	25%	11%
Opportunity to go hunting	9%	16%	7%	9%	7%	15%	11%	18%	6%	1%
Time with family / friends	4%	6%	3%	5%	5%	5%	13%	19%	22%	20%