

ALABAMA HUNTER HARVEST ANNUAL REPORT

**This study was conducted for the Alabama Department
of Conservation and Natural Resources
by Responsive Management**



2020-2021

ALABAMA HUNTER HARVEST 2020-2021

2021

Responsive Management National Office

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EXECUTIVE SUMMARY

This study was conducted for the Alabama Department of Conservation and Natural Resources (hereinafter referred to as the Department) to determine hunters' participation in hunting various species, their harvest, their use of game check reporting and its methods, and other characteristics of their hunting in Alabama in 2020-2021. This is the fourth annual hunter/harvest survey conducted by Responsive Management for the Department, starting with the 2017-2018 hunting season. The study entailed a scientific, probability-based telephone survey of licensed Alabama hunters.

The research team selected telephones as the preferred sampling mode primarily because past experience on harvest surveys has shown that license holders who do not actively participate in hunting or who do not successfully harvest an animal are more likely to respond to a telephone survey than to a mail or online survey, as there is more effort involved in responding via mail or online. Hunters who did not hunt or harvest will readily tell an interviewer verbally that they did not do so, but they are much less motivated to answer even a single survey question on paper and mail it or go to a web address and respond online. For this reason, harvest surveys performed via mail or online have an inherent risk of overestimating harvest due to the decreased response from those who did not hunt and/or harvest during the season.

Responsive Management, in collaboration with the Department, developed the telephone survey questionnaire based on the aforementioned previous surveys conducted for the Department from 2018 to 2020. The telephone survey was computer coded for Responsive Management's computer-assisted telephone interviewing process.

The Department supplied the sample of licensed Alabama hunters for this study. (Note that this sample will be used for another survey conducted for the Department regarding compliance with game check regulations. The sample will not be used in any other way by Responsive Management, which does not keep and maintain samples of licensed hunters.) The survey was conducted in June and July 2021. Responsive Management obtained 3,383 completed interviews with Alabama licensed hunters, 2,916 of whom went hunting.

HUNTING DEER: PARTICIPATION, LOCATION, TYPES OF LAND, EQUIPMENT, DAYS, HARVEST, AND REPORTING COMPLIANCE

- Over 228,000 hunters hunted deer in Alabama during the 2020-2021 deer seasons, hunting deer for 4.9 million days, and harvesting nearly 273,000 deer.
 - Modern firearms account for the most deer hunters, days, and harvest.
 - Most deer hunting was on private lands, as was most harvest.

Deer Hunting: Hunters, Days, and Harvest (2020-2021)

Deer / Equipment / Land / Deer Type	Number of Hunters	Hunter-Days	Number Harvested
Deer-all	228,015	4,909,537	272,731
Archery	89,664	1,361,344	55,352
Modern	201,464	3,468,873	209,699
Primitive	21,627	190,393	8,154
Private land		4,461,649	253,511
WMAs		238,625	6,765
Other public		243,304	12,456
Buck			123,561
Doe			141,850

WMA refers to Wildlife Management Areas.

- The majority of deer harvesters (85%) indicated that they reported all of their harvested deer. Overall, 89% of harvested deer were reported.

HUNTING TURKEY: PARTICIPATION, LOCATION, SEASONS, TYPES OF LAND, EQUIPMENT, DAYS, HARVEST, AND REPORTING COMPLIANCE

- About 60,000 hunters hunted turkey in Alabama in the 2020-2021 seasons. They hunted turkey for more nearly 550,000 days, harvesting over 25,000 turkeys.
 - The most popular way to hunt turkey was by using modern firearms, accounting for most of the days of turkey hunting.

Turkey Hunting: Hunters, Days, and Harvest (2020-2021)

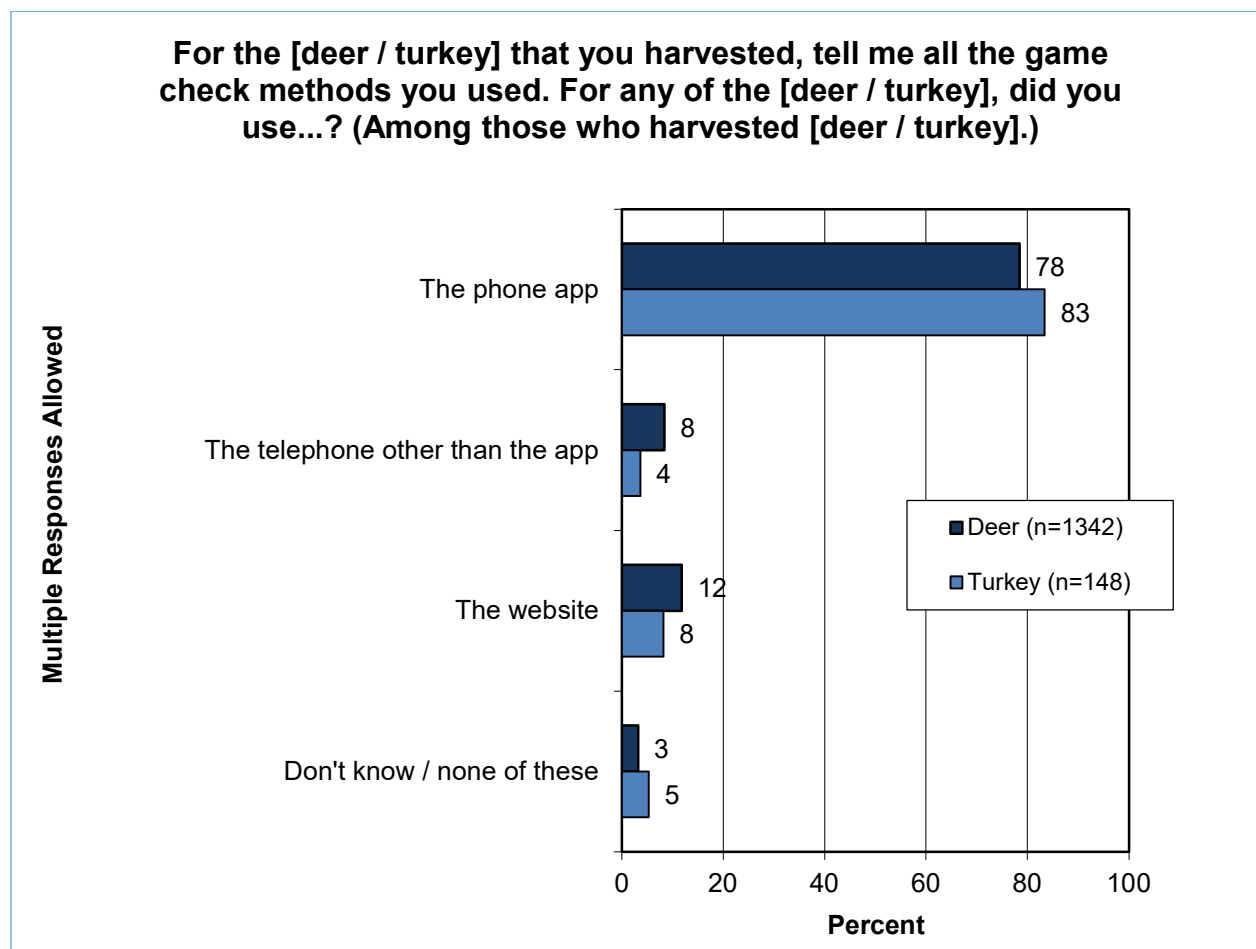
Turkey / Equipment / Season / Turkey Type	Number of Hunters	Hunter-Days	Number Harvested
Turkey-all	59,988	548,417	25,468
Archery		11,604	
Modern		534,370	
Primitive		2,443	
Fall	2,837	14,644	472
Spring	57,567	533,773	24,995
Jakes			1,928
Gobblers			23,540

WMA refers to Wildlife Management Areas.

- The majority of turkey harvesters (90%) indicated that they reported all of their harvested turkey. Overall, 84% of harvested turkey were reported.

TYPES USED AND OPINIONS ON GAME CHECK METHODS

- By far, hunters use the phone app option most commonly when they use Alabama's Game Check system to report their harvested deer or turkey: 78% of deer harvesters and 83% of turkey harvesters did so in the 2020-2021 deer and turkey seasons.
 - The phone app had the highest ratings for ease of use, although ratings were high for all the methods of checking game.



HUNTING QUAIL: PARTICIPATION, TYPES OF QUAIL HUNTED, DAYS, AND HARVEST

- About 6,700 quail hunters harvested over 253,000 quail in the 2020-2021 season.

Quail Hunting: Hunters, Days, and Harvest (2020-2021)

Quail / Quail Type	Number of Hunters	Hunter-Days	Number Harvested
Quail-all	6,696	40,046	253,176
Wild	2,093	13,021	27,234
Pen-raised	5,477	27,009	225,942

HUNTING DOVE: PARTICIPATION, SPLIT HUNTED, TYPES OF LAND, DAYS, HARVEST, AND WILLINGNESS TO TRAVEL

- Nearly 50,000 hunters hunted dove in the 2020-2021 seasons. They hunted more than 207,000 days, and they harvested almost 1.2 million dove.

Dove Hunting: Hunters, Days, and Harvest (2020-2021)

Dove / Split	Number of Hunters	Hunter-Days	Number Harvested
Dove-all	49,990	207,038	1,159,243
First split		146,306	814,933
Remaining splits		53,930	313,903
Unknown splits			30,440

HUNTING OTHER SPECIES: PARTICIPATION, DAYS, AND HARVEST

- Hunting data on other species are shown below. The most popular of these other species among hunters in the 2020-2021 seasons were wild hog, duck, squirrel, and coyote, all hunted by over 10,000 hunters.

Small Game Hunting: Hunters, Days, and Harvest (2020-2021)

Species	Number of Hunters	Hunter-Days	Number Harvested
Bobcat	2,375	4,399	2,364
Coot	704	1,320	4,650
Coyote	14,340	108,036	60,154
Duck	20,323	192,758	373,242
Fox	880	6,422	1,074
Goose	3,959	11,525	17,299
Opossum	704	5,543	4,644
Rabbit	7,478	56,041	55,675
Raccoon	3,783	124,224	31,936
Snipe	264	264	709
Squirrel	16,892	112,171	240,401
Wild hog	30,968	211,849	295,418
Woodcock	352	1,672	946

- Those who hunt waterfowl on public land (61% of waterfowl hunters) are divided between WMAs and other public lands: 27% of all waterfowl hunters hunt exclusively or mostly on WMAs, while 23% hunt exclusively or mostly on other public lands and 12% hunt both types of public land about equally. The remaining waterfowl hunters (39%) do not hunt on public lands at all.

- A third of small game hunters (33%) hunt small game on public land: 14% of all small game hunters do so primarily on WMAs, 11% do so primarily on other public lands, and 8% hunt both about equally.

TRENDS

- The trends analysis shows an increase in the number of deer hunters, and deer harvest increased by over 54,000.

- Looking at other species, notably fewer hunters were hunting dove, coyote, goose, raccoon, squirrel, and feral hog. However, note that this generally reflects a return to levels seen in the 2017-2018 and 2018-2019 seasons, with last year showing particularly high hunting participation for these species.

- Harvest was markedly down for most species other than deer, especially goose and duck. The notable exceptions are harvest increases for pen-raised quail and feral hog.

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INTRODUCTION AND METHODOLOGY

This study was conducted for the Alabama Department of Conservation and Natural Resources (hereinafter referred to as the Department) to determine hunters' participation in hunting various species, their harvest, their use of game check reporting and its methods, and other characteristics of their hunting in Alabama in 2020-2021. This is the fourth annual hunter/harvest survey conducted by Responsive Management for the Department, starting with the 2017-2018 hunting season. The study entailed a scientific, probability-based telephone survey of licensed Alabama hunters. Specific aspects of the research methodology are discussed below.

USE OF TELEPHONES FOR THE SURVEY

The research team selected telephones as the preferred sampling mode primarily because past experience on harvest surveys has shown that license holders who do not actively participate in hunting or who do not successfully harvest an animal are more likely to respond to a telephone survey than to a mail or online survey, as there is more effort involved in responding via mail or online. Hunters who did not hunt or harvest have little motivation to complete an online or mail survey but will readily tell a telephone interviewer verbally that they did not do so. For this reason, harvest surveys performed via mail or online have an inherent risk of overestimating harvest due to the decreased response from those who did not hunt or did not harvest during the season.

Additionally, mail and online surveys systematically exclude those who have difficulty reading. In 2016, the U.S. Department of Education's National Institute of Literacy estimated that 43% of the general population of the United States cannot read beyond a "basic level," suggesting that many might be reticent to complete a mail or online survey they must read to themselves. Furthermore, those with poor or limited internet service or who are intimidated by technology may be reticent to complete a survey online. However, telephone surveys allow respondents who cannot or will not respond to a mail or online survey to participate. In a telephone survey, a live interviewer reads the survey questions, clarifies them if necessary, and assists the respondent with completing the survey, making it an excellent option to reduce bias and increase response to the survey.

Finally, telephone surveys also have fewer negative effects on the environment than do mail surveys because of the reduced use of paper, reduced energy consumption for delivering and returning the questionnaires, and reduced quantity of material to be disposed of after the survey.

QUESTIONNAIRE DESIGN

Responsive Management, in collaboration with the Department, developed the telephone survey questionnaire based on the aforementioned previous surveys conducted for the Department from 2018 to 2020. Responsive Management then computer coded the survey for computer-assisted telephone interviewing (CATI). An important aspect of this CATI process is that the computer controls which questions are asked, but each telephone survey is administered by a live interviewer. Responsive Management conducted pre-tests of the questionnaire to ensure proper wording, flow, and logic in the survey and to ensure that the survey was updated for the 2020-2021 hunting season.

This year the survey included a new question regarding small game hunting on Wildlife Management Areas or other public lands. The same question was specific to dove hunters in 2020 but has been dropped from the survey this year.

SURVEY SAMPLE

The Department provided the sample of licensed Alabama hunters for this study. Note that this sample will be used for another survey conducted for the Department regarding compliance with game check regulations. The sample will not be used in any other way by Responsive Management, which does not keep and maintain samples of licensed hunters. The sample was stratified based on residents/nonresidents and by lifetime license holders/non-lifetime license holders (i.e., lifetime versus any other type of hunting license). Within each of these sub-samples, a probability-based selection process ensured that each eligible hunter had an approximately equal chance of being selected for the survey. All groups were then proportioned properly in the data analyses, using the proportions in the entire dataset of license holders (resident vs. non-resident, and lifetime license holder vs. any other license holder).

TELEPHONE INTERVIEWING FACILITIES

Responsive Management used a combination of office-based and home-based calling for this survey, staffed by interviewers with experience conducting computer-assisted harvest surveys. Survey Center Managers monitor all calls in real time, both those interviewers based in the office and those who are at home, to provide rigorous quality control over the interviews and data collection.

To further ensure the integrity of the telephone survey data, Responsive Management has interviewers who have been trained according to the standards established by the Council of American Survey Research Organizations. Methods of instruction included lecture and role-playing. The Survey Center Managers and other professional staff conducted a conference call briefing with the interviewers prior to the administration of these surveys. Interviewers were instructed on type of study, study goals and objectives, handling of survey questions, interview length, termination points and qualifiers for participation, interviewer instructions within the survey questionnaire, reading of the survey questions, skip patterns, and probing and clarifying techniques necessary for specific questions on the survey questionnaire.

INTERVIEWING DATES AND TIMES

Telephone surveying times were Monday through Friday from 10:00 a.m. to 9:00 p.m., Saturday from noon to 7:00 p.m., and Sunday from 2:00 p.m. to 9:00 p.m., local time. A five-callback design was used to maintain the representativeness of the sample, to avoid bias toward people easy to reach by telephone, and to provide an equal opportunity for all to participate. When a respondent could not be reached on the first call, subsequent calls were placed on different days of the week and at different times of the day. The survey was conducted in June and July 2021.

TELEPHONE SURVEY DATA COLLECTION, QUALITY CONTROL, AND DATA ANALYSIS

CATI software was used for data collection wherein the survey data were entered into the computer as each interview was being conducted. This eliminates manual data entry after the completion of the survey and the concomitant data entry errors that could occur with manual data entry. The survey questionnaire was programmed so that CATI branched, coded, and substituted

phrases in the survey based on previous responses to ensure the integrity and consistency of the data collection.

The Survey Center Managers monitored the data collection, including monitoring of the actual telephone interviews to evaluate the performance of each interviewer and ensure the integrity of the data. Additionally, the survey questionnaire itself contained error checkers and computation statements to ensure quality and consistent data. Finally, after the surveys were obtained by the interviewers, the Survey Center Managers and the statisticians checked all completed surveys to ensure clarity and completeness. Responsive Management obtained 3,383 completed interviews with Alabama licensed hunters, 2,916 of whom went hunting.

The data were collected and weighted by license type. The sample was divided into three distinct groups:

- Lifetime license holders.
- Resident non-lifetime license holders.
- Nonresident non-lifetime license holders.

Survey interviews from these groups were then obtained in their proper proportions. Once the data were collected, response rates were computed for each of these groups individually, and these were used to estimate the total number of participants and then to weight the final data, as lifetime licensees had a considerably lower rate of participation in hunting than the other license categories.

The analysis of the data was performed using IBM SPSS Statistics as well as proprietary software developed by Responsive Management. The results were weighted by the aforementioned stratification variables so that the sample was representative of Alabama licensed hunters as a whole. As indicated, residents and nonresidents were in their proper proportions, as were lifetime license holders and non-lifetime license holders.

SAMPLING ERROR

Throughout this report, findings of the telephone survey are reported at a 95% confidence interval. For the entire sample of Alabama licensed hunters, the sampling error is at most plus or minus 1.68 percentage points. This means that if the survey were conducted 100 times on different samples that were selected in the same way, the findings of 95 out of the 100 surveys would fall within plus or minus 1.68 percentage points of each other. Sampling error was calculated using the standard formula described below, with a sample size of 3,383 and an estimated population size of 308,931.

Sampling Error Equation

$$B = \left(\sqrt{\frac{N_p(.25)}{N_s} - .25} \right) (1.96)$$

Where: B = maximum sampling error (as decimal)
 N_p = population size (i.e., total number who could be surveyed)
 N_s = sample size (i.e., total number of respondents surveyed)

Derived from formula: p. 206 in Dillman, D. A. 2000. *Mail and Internet Surveys*. John Wiley & Sons, NY.

Note: This is a simplified version of the formula that calculates the maximum sampling error using a 50:50 split (the most conservative calculation because a 50:50 split would give maximum variation).

HUNTING DEER: PARTICIPATION, LOCATION, TYPES OF LAND, EQUIPMENT, DAYS, HARVEST, AND REPORTING COMPLIANCE

- Over 228,000 hunters hunted deer in Alabama during the 2020-2021 deer seasons.
 - These deer hunters spent over 4.9 million days hunting deer.
 - Nearly 273,000 deer were harvested during the 2020-2021 seasons.
 - By far, hunters most commonly hunted deer with modern firearms: this weapon type accounted for the most deer hunters, days, and harvest. This was distantly followed by archery equipment and primitive firearms, in that order.
 - Among archery hunters, 39% who hunted deer with archery did so with a crossbow.
 - Most deer hunting and harvest was on private lands.
 - County data are shown, as well.

Deer Hunting: Hunters, Days, and Harvest (2020-2021)

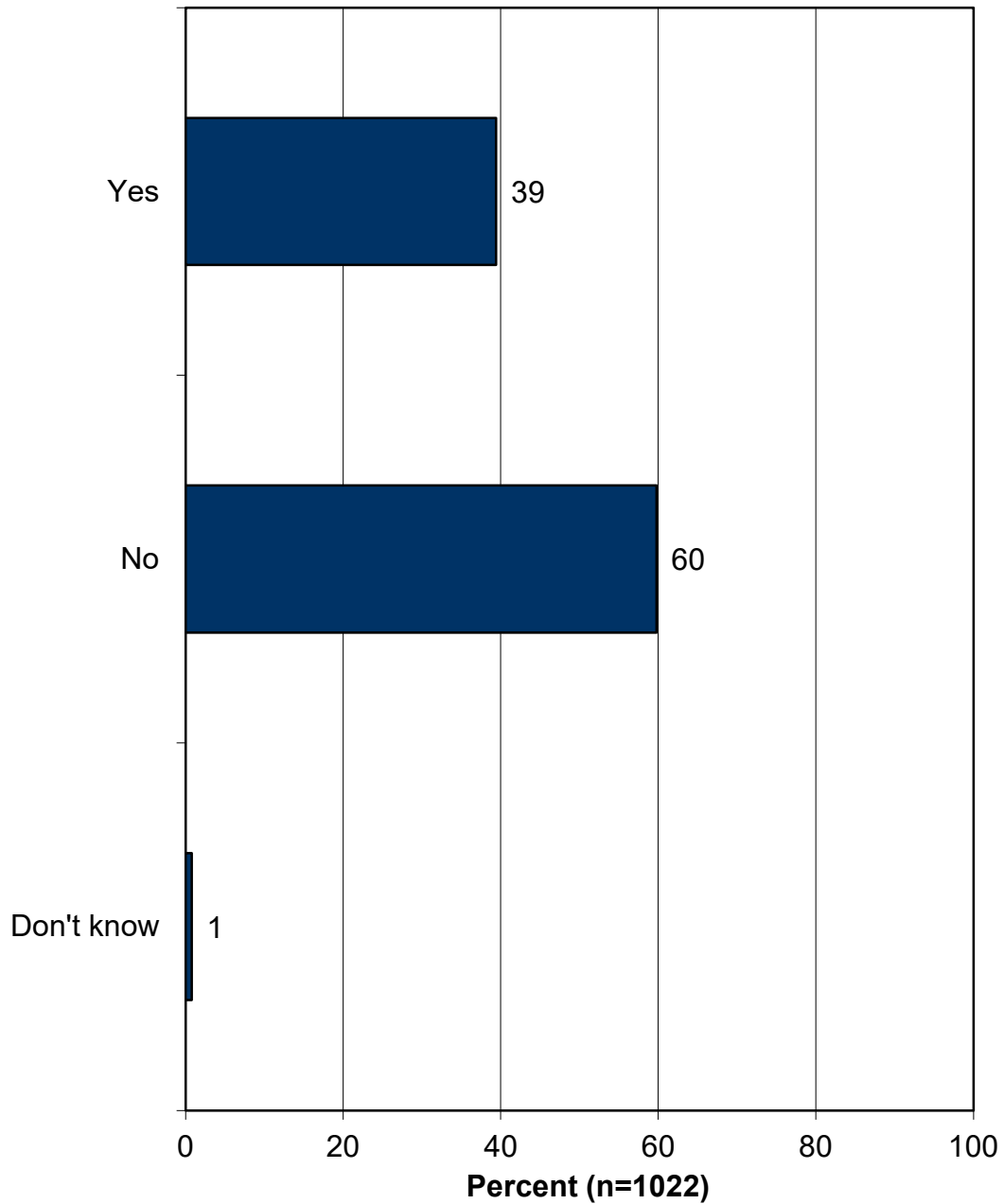
Deer / Equipment / Land / Deer Type	Number of Hunters			Hunter-Days			Number Harvested		
	Estimate	Lower Bound	Upper Bound	Estimate	Lower Bound	Upper Bound	Estimate	Lower Bound	Upper Bound
Deer-all	228,015	225,087	230,943	4,909,537	4,671,272	5,147,802	272,731	256,459	289,003
Archery	89,664	85,223	94,104	1,361,344	1,188,977	1,533,711	55,352	43,355	67,348
Modern	201,464	197,640	205,288	3,468,873	3,292,824	3,644,923	209,699	195,817	223,581
Primitive	21,627	19,039	24,214	190,393	36,206	344,580	8,154	0	17,357
Private land				4,461,649	4,228,933	4,694,365	253,511	237,373	269,648
WMAs				238,625	90,161	387,089	6,765	0	14,447
Other public				243,304	66,120	420,487	12,456	199	24,712
Buck							123,561	115,319	131,803
Doe							141,850	129,809	153,891

WMA refers to Wildlife Management Areas.

Deer Hunting: Mean Days, Deer Harvest per Hunter, Days per Harvest, and Buck-Doe Percentages (2020-2021)

	Mean Days per Hunter	Deer Harvest per Hunter	Days per Harvest	Percentage
Deer Overall	21.5	1.20	18.0	
Archery		0.62	16.5	
Modern		1.04	24.6	
Primitive		0.38	23.4	
Buck				45.3
Doe				54.7

You said you hunted deer with archery equipment during the 2020-2021 season. Did you hunt with a crossbow? (Among those who hunted deer with archery equipment.)



Deer Hunting: Harvest of Bucks, Does, and Fawns by County (2020-2021)

County	Harvest of Bucks			Harvest of Does			Harvest of Fawns		
	Estimate	Lower Bound	Upper Bound	Estimate	Lower Bound	Upper Bound	Estimate	Lower Bound	Upper Bound
Autauga	946	294	1,598	1,862	811	2,913	0	0	0
Baldwin	4,506	2,831	6,181	6,852	4,552	9,153	315	0	831
Barbour	1,691	775	2,608	3,502	2,045	4,959	0	0	0
Bibb	1,340	525	2,154	1,970	485	3,456	79	0	242
Blount	552	120	983	788	136	1,440	79	0	242
Bullock	2,092	881	3,304	1,526	379	2,674	0	0	0
Butler	1,275	471	2,080	2,392	639	4,145	0	0	0
Calhoun	1,576	572	2,581	1,468	627	2,309	79	0	242
Chambers	1,517	533	2,502	1,655	491	2,819	0	0	0
Cherokee	1,741	762	2,720	1,748	546	2,950	79	0	242
Chilton	1,419	468	2,369	1,576	572	2,581	79	0	242
Choctaw	1,990	980	3,001	1,913	827	2,999	0	0	0
Clarke	2,923	1,532	4,315	2,837	1,495	4,179	79	0	242
Clay	1,633	760	2,506	2,207	767	3,646	0	0	0
Cleburne	788	23	1,553	394	0	884	79	0	242
Coffee	717	174	1,260	1,103	0	2,324	79	0	242
Colbert	960	228	1,693	473	0	1,203	0	0	0
Conecuh	3,290	1,061	5,519	3,044	1,440	4,647	0	0	0
Coosa	2,049	969	3,129	1,891	739	3,044	158	0	388
Covington	2,122	968	3,276	2,085	792	3,379	158	0	388
Crenshaw	1,691	560	2,823	2,413	972	3,855	0	0	0
Cullman	1,505	626	2,383	867	156	1,578	79	0	242
Dale	1,591	726	2,455	1,025	209	1,840	86	0	257
Dallas	2,736	1,395	4,077	4,138	1,965	6,311	158	0	388
DeKalb	638	120	1,156	1,734	0	3,719	394	0	1,210
Elmore	2,098	431	3,766	2,069	443	3,696	79	0	242
Escambia	2,294	1,192	3,396	2,085	603	3,567	0	0	0
Etowah	867	0	1,832	1,103	0	2,257	0	0	0
Fayette	2,170	1,103	3,237	2,493	608	4,377	158	0	388
Franklin	717	174	1,260	473	11	934	0	0	0
Geneva	158	0	388	667	0	1,594	172	0	513
Greene	1,239	553	1,924	1,633	673	2,593	0	0	0
Hale	1,675	638	2,712	1,232	375	2,088	79	0	242
Henry	1,426	503	2,349	1,103	125	2,082	158	0	388
Houston	1,283	378	2,188	1,103	72	2,135	79	0	242
Jackson	4,197	2,568	5,826	2,916	1,022	4,810	79	0	242
Jefferson	1,596	625	2,567	2,227	921	3,533	0	0	0
Lamar	1,955	913	2,998	2,800	1,065	4,535	86	0	257
Lauderdale	2,421	1,239	3,603	773	209	1,338	79	0	242
Lawrence	946	114	1,777	158	0	484	0	0	0
Lee	960	304	1,616	2,142	845	3,439	79	0	242
Limestone	1,103	272	1,935	1,517	648	2,387	79	0	242
Lowndes	1,389	544	2,234	874	241	1,508	158	0	388
Macon	1,189	441	1,938	1,088	290	1,887	0	0	0
Madison	2,027	1,082	2,972	1,677	550	2,804	79	0	242
Marengo	2,808	1,510	4,106	5,309	1,920	8,698	0	0	0
Marion	1,834	860	2,809	5,927	2,809	9,044	1,459	0	2,764
Marshall	1,340	375	2,304	630	115	1,146	79	0	242
Mobile	1,591	530	2,652	1,232	315	2,148	158	0	388
Monroe	2,358	1,251	3,465	2,903	915	4,890	0	0	0
Montgomery	1,820	776	2,864	1,906	823	2,989	236	0	601
Morgan	946	294	1,598	946	217	1,675	0	0	0
Perry	1,633	791	2,475	3,923	1,653	6,193	79	0	242
Pickens	3,031	1,725	4,337	2,672	1,329	4,015	158	0	388
Pike	1,720	711	2,730	2,250	710	3,791	86	0	257
Randolph	1,046	291	1,802	1,999	574	3,425	244	0	612
Russell	3,203	1,663	4,744	3,526	1,546	5,505	79	0	242

Deer Hunting: Harvest of Bucks, Does, and Fawns by County (2020-2021) (continued)

County	Harvest of Bucks			Harvest of Does			Harvest of Fawns		
	Estimate	Lower Bound	Upper Bound	Estimate	Lower Bound	Upper Bound	Estimate	Lower Bound	Upper Bound
St. Clair	1,103	152	2,054	1,891	786	2,996	79	0	242
Shelby	3,074	1,166	4,981	3,044	1,658	4,431	79	0	242
Sumter	1,433	568	2,298	687	206	1,169	365	14	716
Talladega	1,734	653	2,815	1,419	468	2,369	0	0	0
Tallapoosa	2,815	1,479	4,150	1,734	605	2,863	79	0	242
Tuscaloosa	3,396	1,968	4,824	5,133	2,688	7,578	236	0	519
Walker	2,414	1,279	3,549	4,620	1,970	7,270	315	0	642
Washington	1,869	843	2,896	1,490	645	2,335	158	0	484
Wilcox	2,256	1,245	3,267	1,039	189	1,889	244	0	531
Winston	867	279	1,455	709	37	1,382	0	0	0
Unknown	4,108	2,681	5,534	5,004	3,223	6,784	323	0	653

Deer Hunting: Days by County (2020-2021)

County	Days		
	Estimate	Lower Bound	Upper Bound
Autauga	89,695	54,798	124,592
Baldwin	163,435	124,693	202,178
Barbour	90,707	57,882	123,532
Bibb	68,048	38,456	97,639
Blount	46,813	24,363	69,263
Bullock	60,826	29,596	92,056
Butler	98,481	34,186	162,775
Calhoun	73,143	41,493	104,792
Chambers	51,982	26,470	77,493
Cherokee	57,718	28,970	86,466
Chilton	81,374	39,905	122,844
Choctaw	76,281	41,402	111,160
Clarke	111,372	75,202	147,542
Clay	44,955	21,806	68,104
Cleburne	53,634	13,119	94,149
Coffee	42,429	18,720	66,137
Colbert	48,900	24,244	73,557
Conecuh	88,951	57,712	120,191
Coosa	95,864	57,960	133,769
Covington	79,348	47,581	111,114
Crenshaw	69,383	40,489	98,276
Cullman	60,162	34,892	85,431
Dale	74,563	32,870	116,256
Dallas	76,747	45,509	107,985
DeKalb	37,850	10,923	64,778
Elmore	80,121	43,442	116,800
Escambia	69,999	39,359	100,639
Etowah	49,843	24,744	74,942
Fayette	73,893	45,150	102,636
Franklin	44,581	20,705	68,457
Geneva	34,367	14,031	54,702
Greene	44,428	24,300	64,557
Hale	50,548	21,743	79,352
Henry	42,809	15,965	69,653
Houston	48,448	24,685	72,212
Jackson	160,799	114,188	207,411
Jefferson	75,834	45,099	106,570
Lamar	66,933	32,275	101,591
Lauderdale	85,505	48,657	122,353
Lawrence	32,092	15,443	48,742
Lee	58,746	30,175	87,317
Limestone	49,341	28,156	70,525
Lowndes	31,136	19,512	42,761

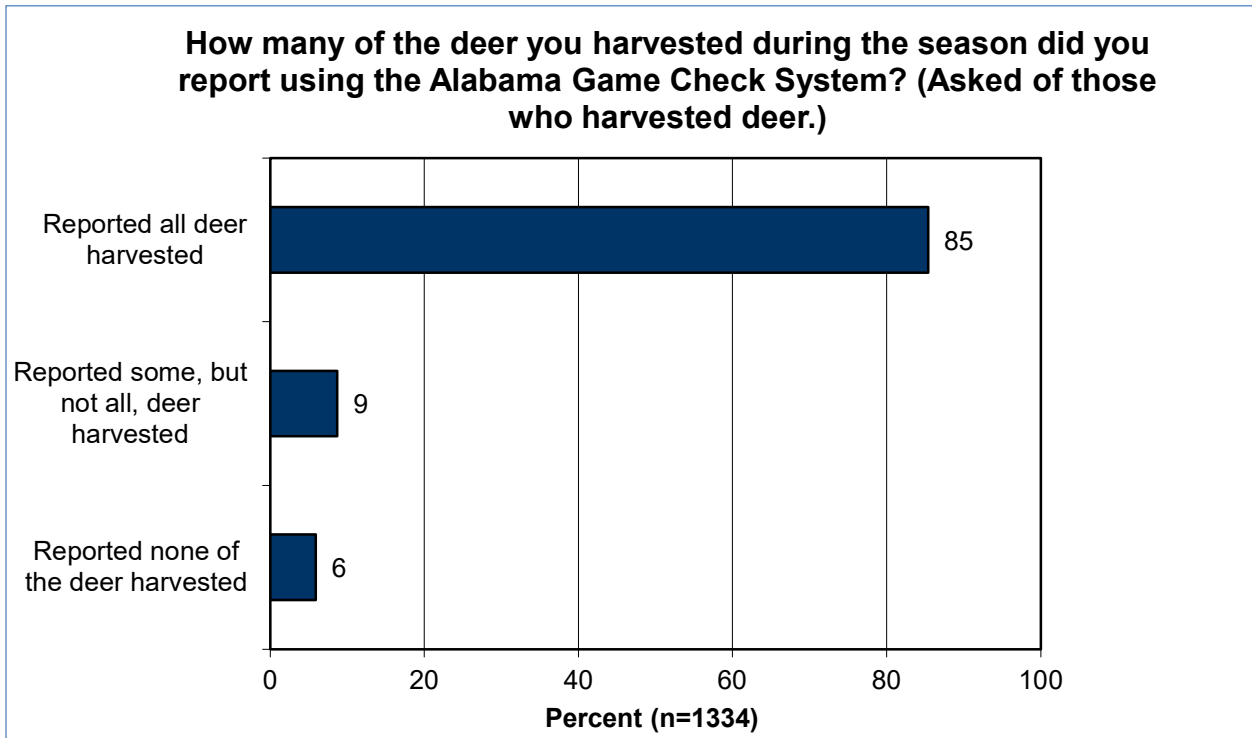
Deer Hunting: Days by County (2020-2021) (continued)

County	Days		
	Estimate	Lower Bound	Upper Bound
Macon	64,203	34,744	93,663
Madison	91,952	46,542	137,362
Marengo	94,755	63,922	125,588
Marion	100,639	62,759	138,519
Marshall	50,832	28,890	72,774
Mobile	104,323	65,770	142,876
Monroe	107,093	71,085	143,101
Montgomery	63,963	34,517	93,409
Morgan	119,157	62,925	175,390
Perry	83,800	55,998	111,602
Pickens	106,646	70,115	143,177
Pike	67,697	9,173	126,220
Randolph	49,941	25,217	74,665
Russell	114,922	50,867	178,977
St. Clair	54,772	29,743	79,802
Shelby	129,421	80,495	178,347
Sumter	51,828	27,164	76,491
Talladega	73,609	43,202	104,017
Tallapoosa	106,794	65,980	147,608
Tuscaloosa	99,824	67,235	132,413
Walker	118,894	76,975	160,813
Washington	75,365	42,343	108,387
Wilcox	77,976	49,774	106,177
Winston	62,102	34,031	90,172
Unknown	120,325	87,625	153,025

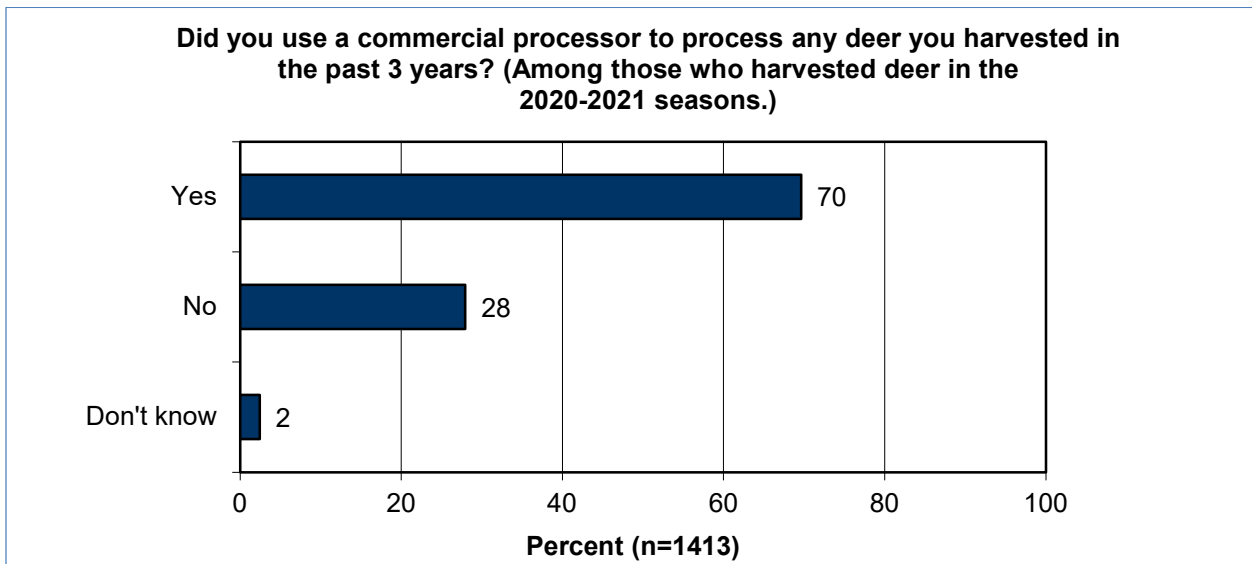
- Compliance data among those who harvested deer are shown in the matrix below and the graph on the following page (“don’t know” responses are excluded). The majority of deer harvesters (85%) indicated that they reported all of their harvested deer, as represented by the green-shaded cells. Overall, 89% of harvested deer were reported (graph not shown).

Compliance With Deer Reporting Requirements (Cells Show Percentage Out of All Those Who Harvested Excluding “Don’t Know” Responses)

Deer	Reported 0	Reported 1	Reported 2	Reported 3	Reported 4	Reported 5	Reported 6
Harvested 1	2.7%	42.9%					
Harvested 2	1.8%	2.1%	22.5%				
Harvested 3	0.5%	0.2%	1.1%	10.0%			
Harvested 4	0.5%	0.1%	0.7%	0.8%	5.1%		
Harvested 5	0.1%	0.1%	0.1%	0.3%	0.3%	2.6%	
Harvested 6	0.1%	0.0%	0.0%	0.3%	0.3%	0.3%	0.9%
	Reported all	Reported some	Reported none				
Harvested more than 6	1.5%	1.9%	0.1%				



- Among those who harvested deer in 2020-2021, 70% used a commercial processor to process any of their deer in the past 3 years.



HUNTING TURKEY: PARTICIPATION, LOCATION, SEASONS, TYPES OF LAND, EQUIPMENT, DAYS, HARVEST, AND REPORTING COMPLIANCE

- About 60,000 hunters hunted turkey in Alabama in the 2020-2021 seasons.
 - These turkey hunters spent nearly 550,000 days hunting turkey.
 - Over 25,000 turkeys were harvested in the 2020-2021 seasons.
 - Modern firearms were the most popular way to hunt turkey, accounting for most of the days of turkey hunting.
 - Among the 17 turkey hunters who used archery equipment, 36% (6 hunters) used a crossbow.
 - The spring season accounted for most of the hunters, days, and harvest of turkeys.
 - County data are also shown.

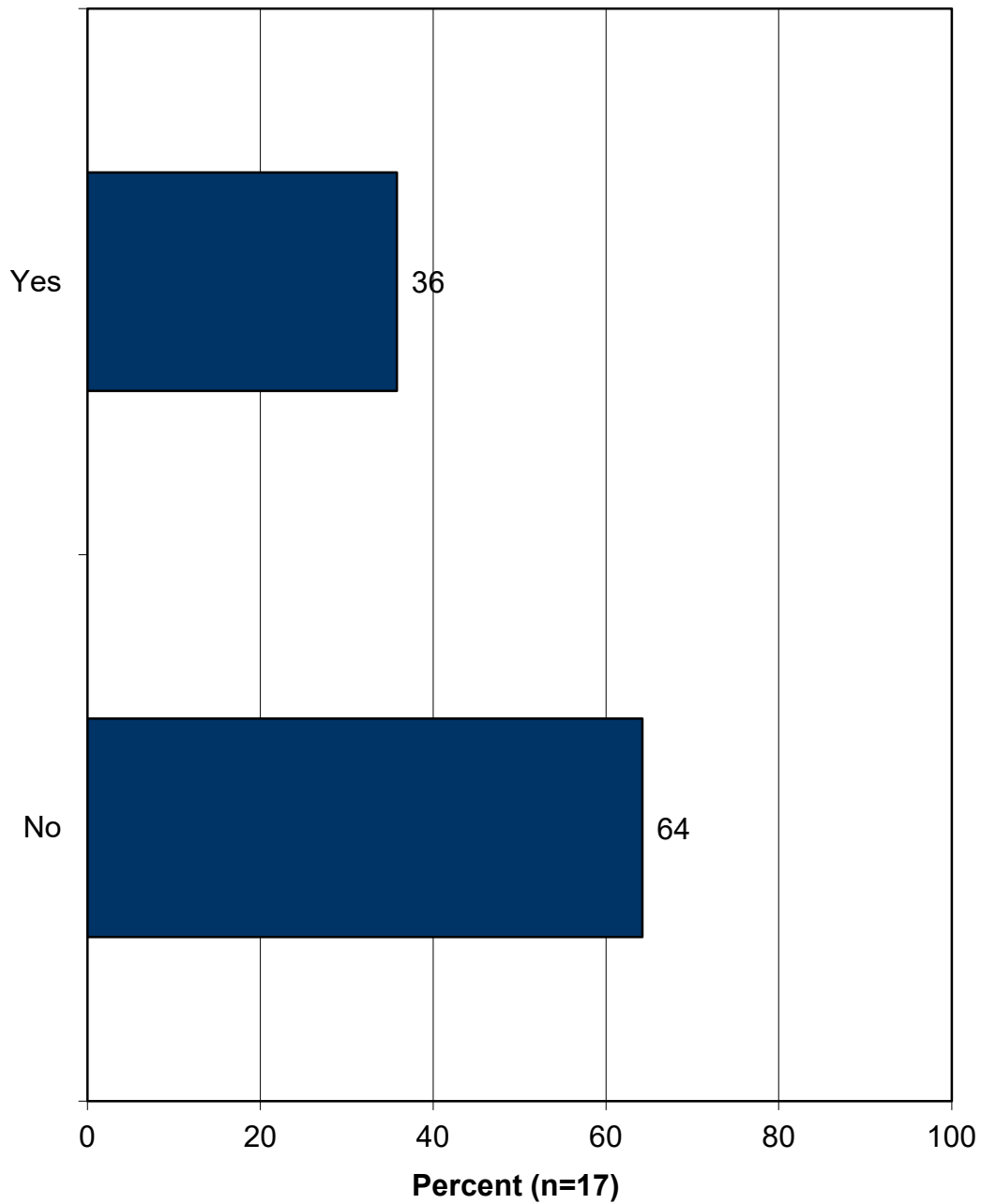
Turkey Hunting: Hunters, Days, and Harvest (2020-2021)

Turkey / Equipment / Season / Turkey Type	Number of Hunters			Hunter-Days			Number Harvested		
	Estimate	Lower Bound	Upper Bound	Estimate	Lower Bound	Upper Bound	Estimate	Lower Bound	Upper Bound
Turkey-all	59,988	56,046	63,930	548,417	491,219	605,616	25,468	20,644	30,291
Archery				11,604	4,198	19,010			
Modern				534,370	477,854	590,885			
Primitive				2,443	0	5,302			
Fall	2,837	1,863	3,811	14,644	7,721	21,567	472	0	1,038
Spring	57,567	53,682	61,452	533,773	477,634	589,913	24,995	20,213	29,778
Jakes							1,928	392	3,463
Gobblers							23,540	19,151	27,929

Turkey Hunting: Mean Days, Turkey Harvest per Hunter, and Days per Harvest (2020-2021)

	Mean Days per Hunter	Turkey Harvest per Hunter	Days per Harvest
Turkey Overall	9.1	0.42	21.5
Fall	5.2	0.17	31.0
Spring	9.3	0.43	21.4

You said you hunted turkey with archery equipment during the 2020-2021 seasons. Did you hunt with a crossbow? (Among those who hunted turkey with archery equipment.)



Turkey Hunting: Harvest and Days by County (2020-2021)

County	Harvest of Turkeys			Days of Turkey Hunting		
	Estimate	Lower Bound	Upper Bound	Estimate	Lower Bound	Upper Bound
Autauga	158	0	484	5,753	697	10,809
Baldwin	1,232	258	2,205	28,877	13,637	44,117
Barbour	645	0	1,413	6,364	2,162	10,566
Bibb	158	0	388	12,237	5,170	19,304
Blount	79	0	242	3,862	0	8,593
Bullock	0	0	0	5,866	1,892	9,839
Butler	315	0	777	6,099	1,644	10,554
Calhoun	630	65	1,195	13,427	4,535	22,319
Chambers	236	0	601	3,389	139	6,639
Cherokee	236	0	601	6,097	1,864	10,331
Chilton	522	103	942	9,421	2,398	16,445
Choctaw	630	0	1,360	5,911	803	11,019
Clarke	552	0	1,263	14,332	6,854	21,810
Clay	1,446	275	2,617	7,554	302	14,806
Cleburne	795	141	1,450	13,360	2,696	24,023
Coffee	236	0	601	13,119	2,938	23,299
Colbert	165	0	401	5,218	114	10,322
Conecuh	394	0	935	8,383	1,194	15,571
Coosa	158	0	388	5,201	0	11,308
Covington	502	0	1,032	14,569	4,847	24,290
Crenshaw	759	0	1,517	12,745	3,249	22,242
Cullman	394	0	1,210	2,894	0	5,802
Dale	236	0	726	6,068	0	13,282
Dallas	559	0	1,272	5,582	159	11,005
DeKalb	0	0	0	2,207	0	4,681
Elmore	0	0	0	6,778	0	14,033
Escambia	244	0	531	8,020	2,383	13,658
Etowah	365	14	716	4,120	514	7,725
Fayette	630	0	1,396	11,033	2,752	19,315
Franklin	79	0	242	4,413	30	8,796
Geneva	236	0	726	1,856	0	4,529
Greene	158	0	388	4,069	0	8,284
Hale	79	0	242	3,231	0	6,905
Henry	158	0	388	3,242	707	5,777
Houston	79	0	242	2,809	328	5,291
Jackson	1,340	198	2,481	18,047	5,820	30,274
Jefferson	79	0	242	11,464	2,672	20,255
Lamar	552	11	1,093	3,231	327	6,135
Lauderdale	660	0	1,483	5,826	1,082	10,569
Lawrence	79	0	242	5,280	58	10,503
Lee	236	0	519	8,275	2,789	13,761
Limestone	0	0	0	3,152	0	6,979
Lowndes	0	0	0	2,916	0	6,494
Macon	0	0	0	2,157	266	4,048
Madison	394	0	982	3,872	850	6,895
Marengo	394	0	935	13,716	6,027	21,404
Marion	236	0	519	10,802	3,864	17,740
Marshall	79	0	242	1,419	114	2,723
Mobile	0	0	0	5,066	0	10,359
Monroe	315	0	831	12,330	5,403	19,256
Montgomery	79	0	242	10,156	3,553	16,759
Morgan	0	0	0	236	0	601
Perry	158	0	484	2,680	316	5,043
Pickens	1,132	197	2,068	14,036	5,233	22,840
Pike	788	0	1,587	8,993	2,671	15,315
Randolph	394	0	1,067	6,660	505	12,814
Russell	172	0	513	4,945	1,734	8,157

Turkey Hunting: Harvest and Days by County (2020-2021) (continued)

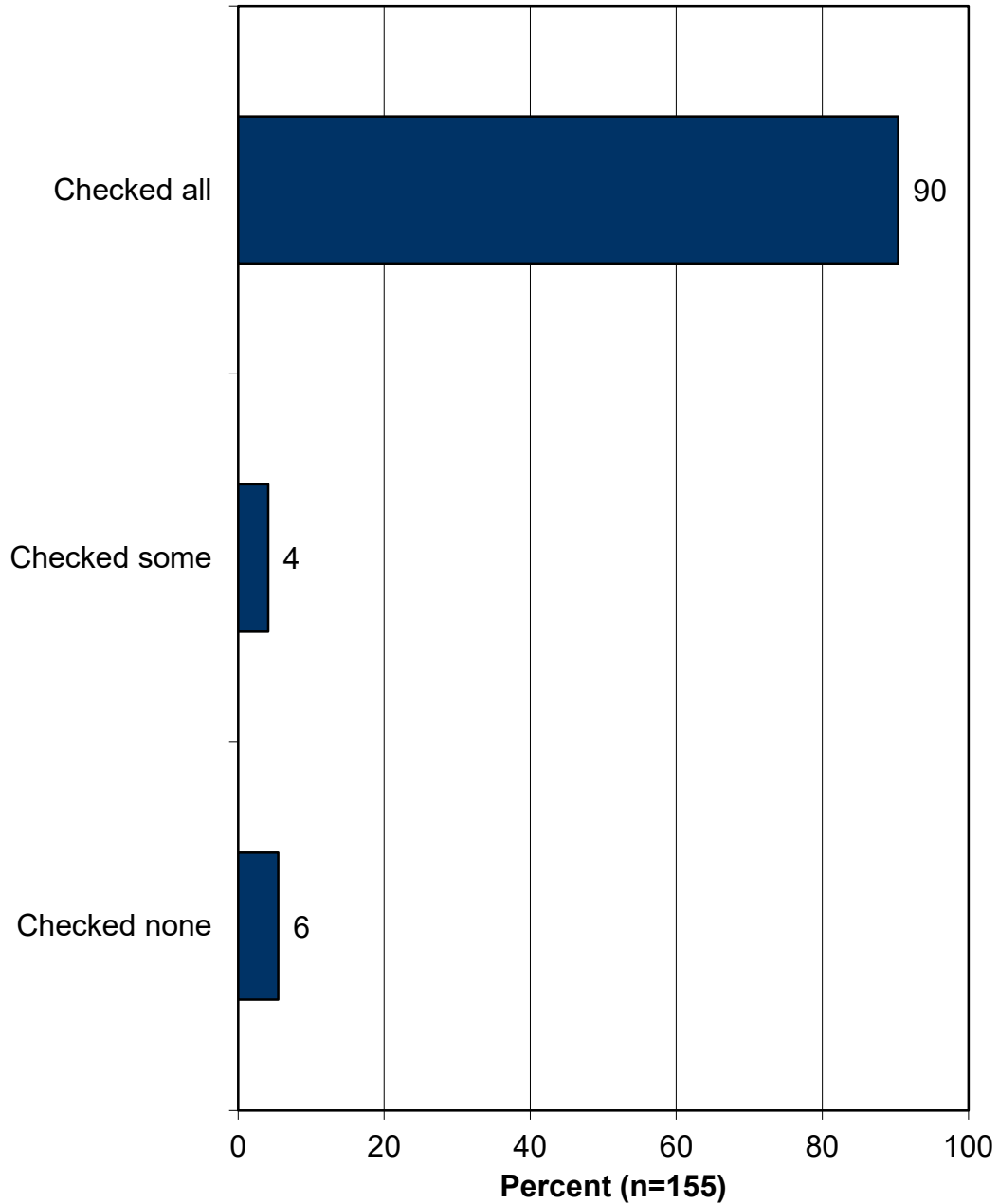
County	Harvest of Turkeys			Days of Turkey Hunting		
	Estimate	Lower Bound	Upper Bound	Estimate	Lower Bound	Upper Bound
St. Clair	473	0	1,305	2,837	108	5,567
Shelby	473	0	1,083	24,339	12,930	35,749
Sumter	315	0	831	10,288	3,923	16,654
Talladega	0	0	0	8,456	1,307	15,604
Tallapoosa	953	0	2,602	19,452	6,716	32,189
Tuscaloosa	315	0	642	13,806	3,980	23,633
Walker	315	0	715	10,608	4,665	16,550
Washington	158	0	388	8,383	974	15,791
Wilcox	473	0	1,083	8,652	3,305	14,000
Winston	394	0	935	6,068	686	11,450

- Compliance data among those who harvested turkey are shown in the matrix below and the graph on the following page; the matrix excludes “don’t know” responses. The majority of turkey harvesters (90%) indicated that they reported all of their harvested turkey, as represented by the green-shaded cells. Overall, 84% of harvested turkey were reported (graph not shown).

Compliance With Turkey Reporting Requirements (Cells Show Percentage Out of All Those Who Harvested Excluding “Don’t Know” Responses)

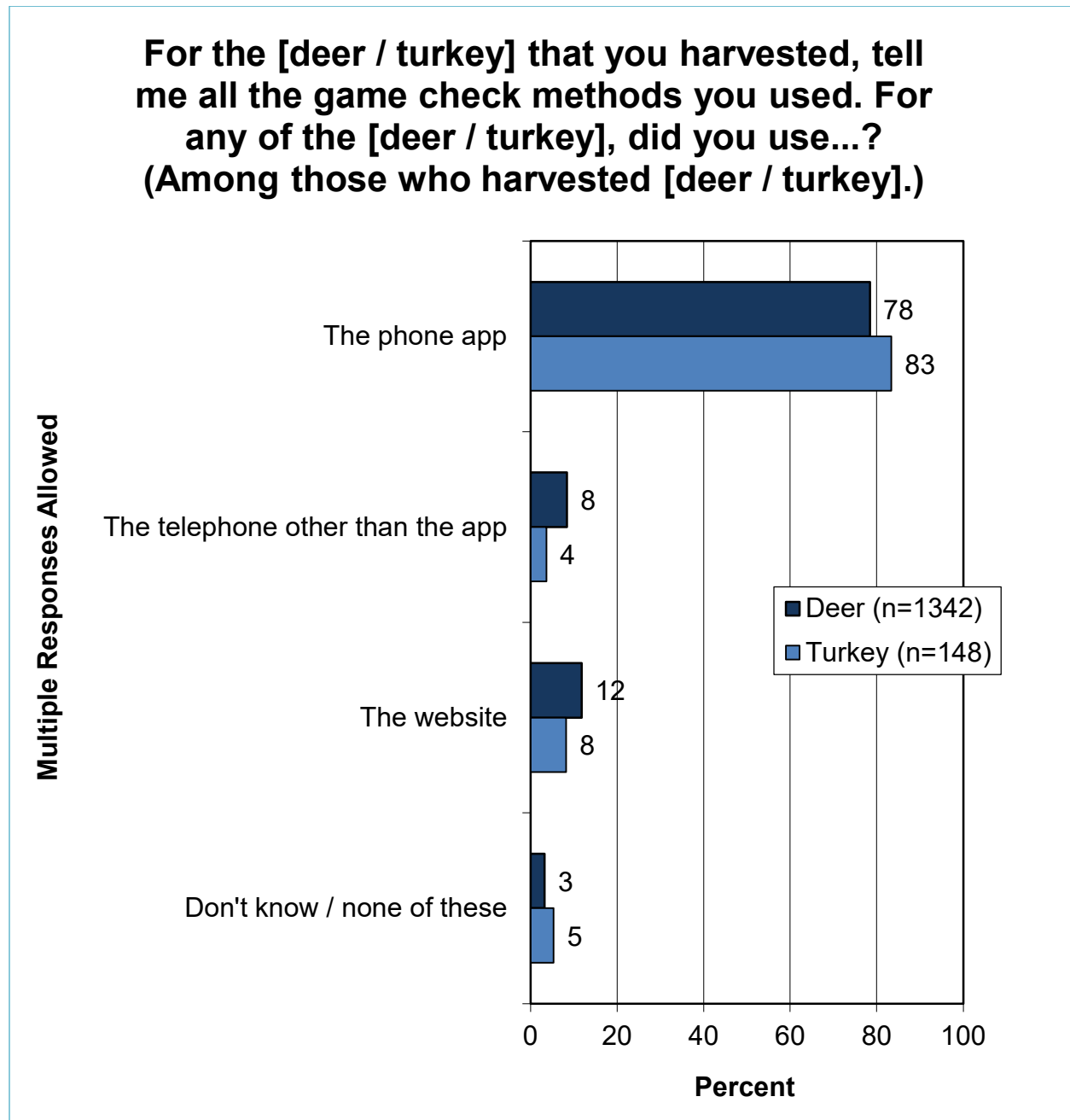
	Reported 0	Reported 1	Reported 2	Reported 3	Reported 4	Reported 5	Reported 6	Reported 7
Harvested 1	3.7%	60.9%						
Harvested 2	1.2%	0.6%	12.6%					
Harvested 3	0.6%	0.6%	0.6%	11.0%				
Harvested 4	0.0%	0.0%	0.0%	0.0%	2.4%			
Harvested 5	0.0%	0.0%	0.0%	0.0%	0.6%	3.5%		
Harvested 6	0.0%	0.0%	0.0%	0.6%	0.0%	0.0%	0.0%	
Harvested more than 6	0.0%	0.0%	0.0%	0.6%	0.0%	0.6%	0.0%	0.0%

How many of the turkeys you harvested during the season did you report using the Alabama Game Check System?

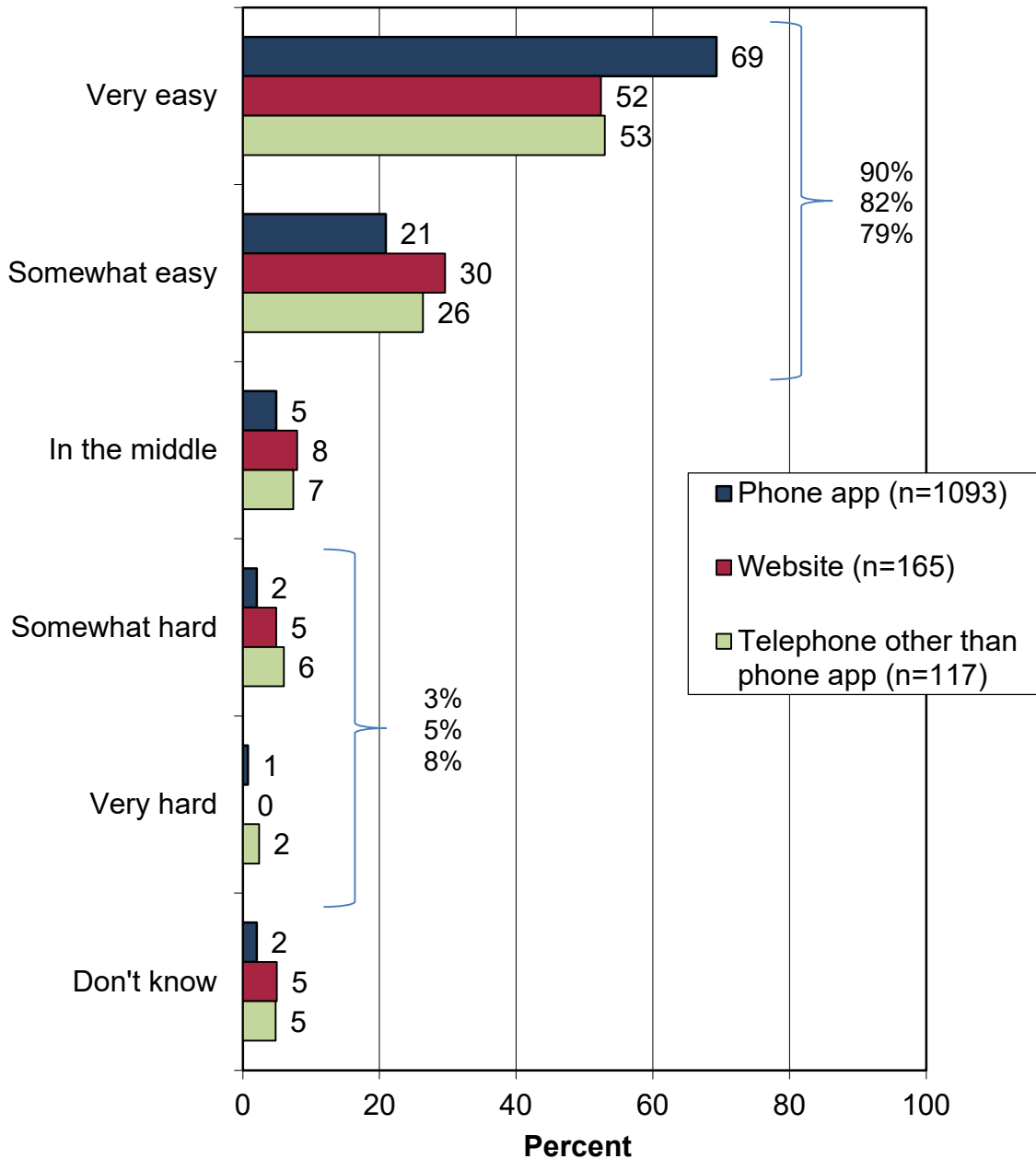


TYPES USED AND OPINIONS ON GAME CHECK METHODS

- By far, hunters use the phone app option most commonly when they use Alabama's Game Check system to report their harvested deer or turkey: 78% of deer harvesters and 83% of turkey harvesters did so in the 2020-2021 deer and turkey seasons.
 - The phone app had the highest ratings for ease of use, although ratings were high for all the methods of checking game.



How easy or hard was it to use the [phone app / website / telephone other than phone app] for checking game? Was it...? (Among those who harvested deer or turkey and checked at least some of their game.)



HUNTING QUAIL: PARTICIPATION, TYPES OF QUAIL HUNTED, TYPES OF LAND, DAYS, AND HARVEST

➤ About 6,700 quail hunters harvested over 253,000 quail in the 2020-2021 season.

Quail Hunting: Hunters, Days, and Harvest (2020-2021)

Quail / Quail Type	Number of Hunters			Hunter-Days			Number Harvested		
	Estimate	Lower Bound	Upper Bound	Estimate	Lower Bound	Upper Bound	Estimate	Lower Bound	Upper Bound
Quail-all	6,696	5,211	8,181	40,046	22,047	58,046	253,176	129,803	376,548
Wild	2,093	1,255	2,931	13,021	4,938	21,103	27,234	9,496	44,972
Pen-raised	5,477	4,131	6,824	27,009	13,107	40,911	225,942	109,537	342,347

Quail Hunting: Avg. Days and Days per Harvest (2020-2021)

Quail	
Avg. Days per Hunter	Days per Harvest
6.0	0.2

HUNTING DOVE: PARTICIPATION, SPLIT HUNTED, TYPES OF LAND, DAYS, HARVEST, AND WILLINGNESS TO TRAVEL

- Nearly 50,000 hunters hunted dove in the 2020-2021 seasons. They hunted more than 207,000 days, and they harvested over 1.1 million dove.

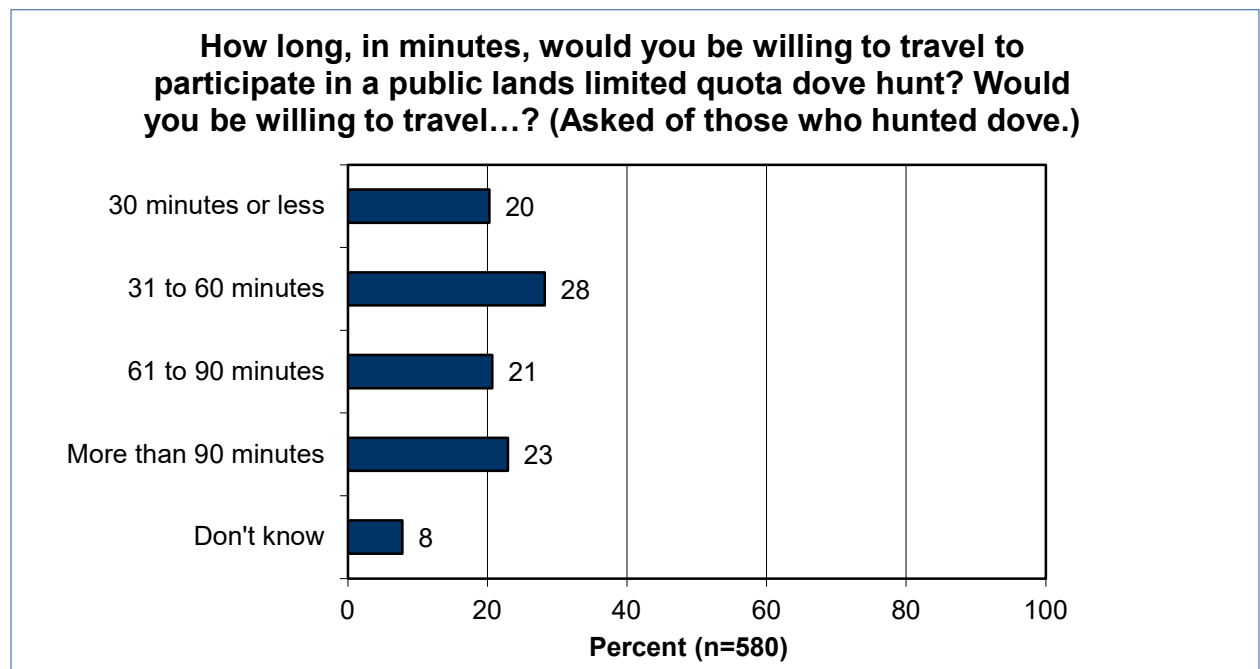
Dove Hunting: Hunters, Days, and Harvest (2020-2021)

Dove / Split	Number of Hunters			Hunter-Days			Number Harvested		
	Estimate	Lower Bound	Upper Bound	Estimate	Lower Bound	Upper Bound	Estimate	Lower Bound	Upper Bound
Dove-all	49,990	46,302	53,679	207,038	177,472	236,604	1,159,243	982,052	1,336,434
First split				146,306	126,659	165,953	814,933	706,435	923,430
Remaining splits				53,930	40,428	67,432	313,903	216,718	411,087
Unknown splits							30,440	13,288	47,592

Dove Hunting: Avg. Days and Days per Harvest (2020-2021)

Dove	
Avg. Days per Hunter	Days per Harvest
4.1	0.2

- The graph below shows the acceptable travel distances among dove hunters to participate in a public lands limited quota dove hunt.



HUNTING OTHER SPECIES: PARTICIPATION, TYPES OF LAND, DAYS, AND HARVEST

- Hunting data on other species are shown below. The most popular of these other species among hunters in the 2020-2021 seasons were wild hog, duck, squirrel, and coyote, all hunted by over 10,000 hunters. (The survey asked about rail and gallinule. No hunters reported hunting rail and only a single hunter reported hunting gallinule; therefore, they are not shown in the tables.)

Small Game Hunting: Hunters, Days, and Harvest (2020-2021)

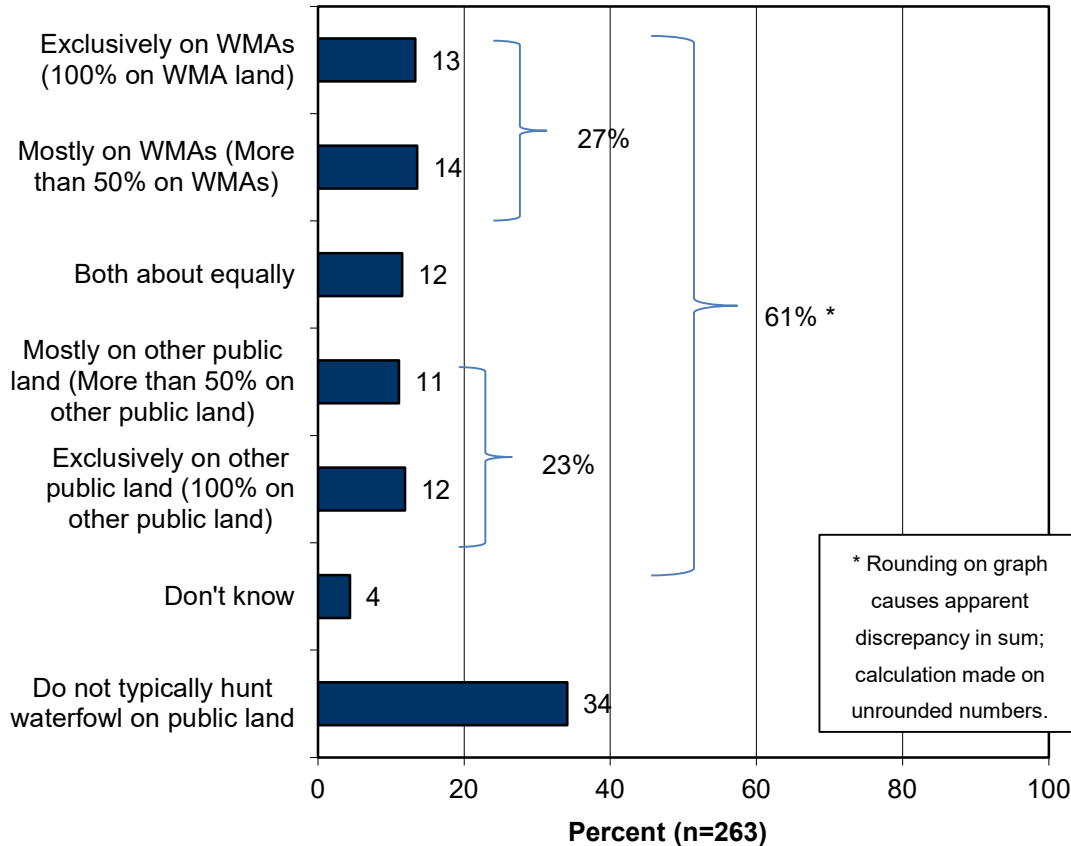
Species	Number of Hunters			Hunter-Days			Number Harvested		
	Estimate	Lower Bound	Upper Bound	Estimate	Lower Bound	Upper Bound	Estimate	Lower Bound	Upper Bound
Bobcat	2,375	1,481	3,269	4,399	0	9,585	2,364	818	3,910
Coot	704	210	1,197	1,320	0	3,154	4,650	210	9,090
Coyote	14,340	12,199	16,482	108,036	488	215,584	60,154	34,798	85,511
Duck	20,323	17,809	22,837	192,758	154,991	230,525	373,242	274,793	471,691
Fox	880	321	1,438	6,422	0	13,034	1,074	217	1,931
Goose	3,959	2,804	5,114	11,525	6,916	16,134	17,299	9,927	24,671
Opossum	704	210	1,197	5,543	0	29,296	4,644	114	9,174
Rabbit	7,478	5,914	9,042	56,041	35,416	76,666	55,675	32,963	78,387
Raccoon	3,783	2,656	4,910	124,224	48,661	199,787	31,936	17,109	46,762
Snipe	264	0	543	264	0	711	709	0	1,754
Squirrel	16,892	14,582	19,201	112,171	88,296	136,046	240,401	139,424	341,378
Wild hog	30,968	27,932	34,004	211,849	150,486	273,212	295,418	198,805	392,031
Woodcock	352	26	678	1,672	861	2,482	946	0	2,904

Small Game Hunting: Mean Days and Days per Harvest (2020-2021)

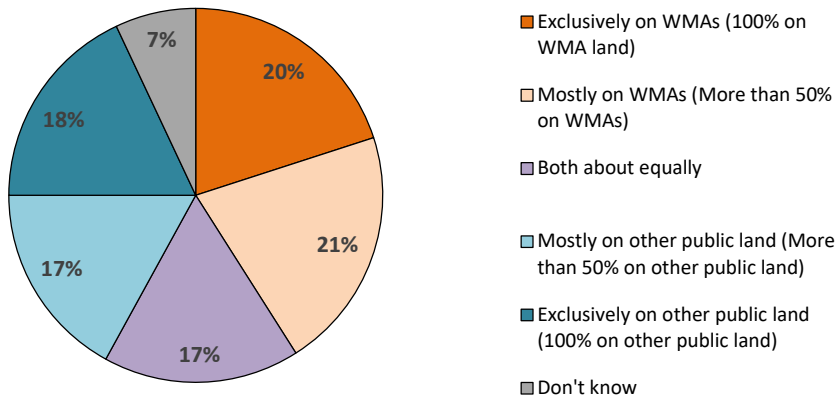
	Mean Days per Hunter	Days per Harvest
Bobcat	1.9	1.9
Coot	1.9	0.3
Coyote	7.5	1.8
Duck	9.5	0.5
Fox	7.3	6.0
Goose	3.9	0.9
Opossum	7.9	1.2
Rabbit	7.5	1.0
Raccoon	32.8	3.9
Snipe	1.0	0.4
Squirrel	6.6	0.5
Wild hog	6.8	0.7
Woodcock	4.8	1.8

- Those who hunt waterfowl on public land (61% of waterfowl hunters) are divided between WMAs and other public lands: 27% hunt exclusively or mostly on WMAs, while 23% hunt exclusively or mostly on other public lands. Meanwhile, 12% hunt both types of public land about equally. A pie graph shows the distribution among public land waterfowl hunters.

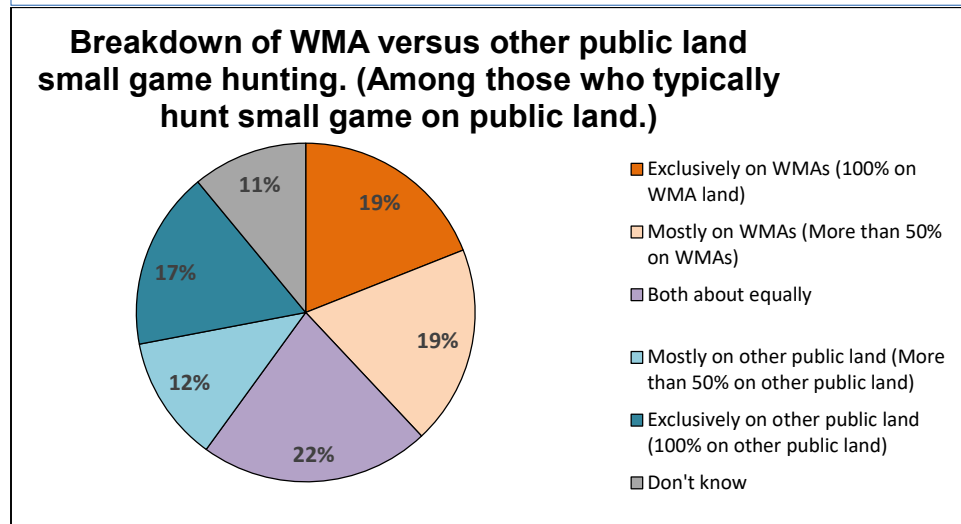
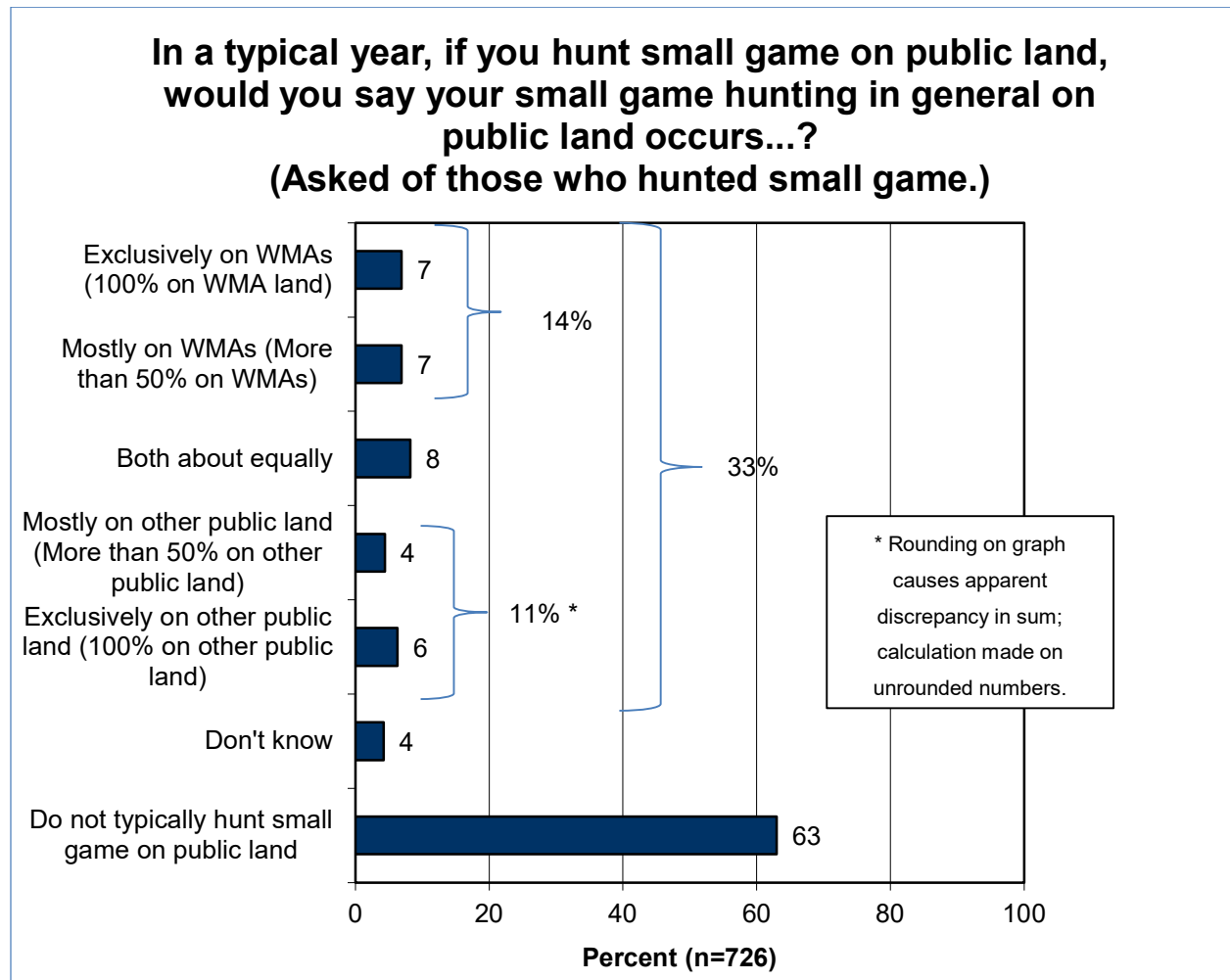
**In a typical year, if you hunt waterfowl on public land, would you say your waterfowl hunting in general on public land occurs...?
(Asked of those who hunted waterfowl.)**



Breakdown of WMA versus other public land waterfowl hunting. (Among those who typically hunt waterfowl on public land.)



- A third of small game hunters (33%) hunt small game on public land: 14% do so primarily on WMAs, 11% do so primarily on other public lands, and 8% hunt both about equally.



TRENDS

- The trends tables below show an increase in the number of deer hunters, and deer harvest increased by over 54,000.

Deer Hunting: Hunters and Days Trends

Equipment / Land Type	Number of Hunters				Hunter-Days			
	2017-2018	2018-2019	2019-2020	2020-2021	2017-2018	2018-2019	2019-2020	2020-2021
Deer-all	202,540	191,054	198,924	228,015	4,749,691	4,093,081	4,494,715	4,909,537
Archery	80,979	75,815	80,300	89,664	1,370,848	1,121,685	1,210,213	1,361,344
Modern	179,102	171,293	180,746	201,464	3,201,076	2,848,141	3,154,406	3,468,873
Primitive	20,454	16,895	16,909	21,627	177,767	123,254	130,095	190,393
Private land					4,438,114	3,731,519	4,089,566	4,461,649
WMAs					205,341	217,415	211,673	238,625
Other public					106,238	144,147	193,475	243,304

WMA refers to Wildlife Management Areas.

Deer Hunting: Harvest Trends

Equipment / Land / Deer Type	Number Harvested			
	2017-2018	2018-2019	2019-2020	2020-2021
Deer-all	212,444	203,040	218,358	272,731
Archery	49,206	39,086	42,221	55,352
Modern	154,746	157,433	169,497	209,699
Primitive	8,460	6,522	6,640	8,154
Private land	201,433	192,142	205,620	253,511
WMAs	6,433	6,650	6,161	6,765
Other public	4,549	4,248	6,433	12,456
Buck	94,471	83,162	94,034	123,561
Doe	114,116	114,553	118,418	141,850

WMA refers to Wildlife Management Areas.

Deer Hunting: Mean Days per Hunter Trends

	Mean Days per Hunter			
	2017-2018	2018-2019	2019-2020	2020-2021
Deer Overall	23.5	21.4	22.6	21.5

Deer Hunting: Deer Harvest per Hunter Trends

	Deer Harvest per Hunter			
	2017-2018	2018-2019	2019-2020	2020-2021
Deer Overall	1.05	1.06	1.10	1.20
Archery	0.61	0.52	0.53	0.62
Modern	0.86	0.92	0.94	1.04
Primitive	0.41	0.39	0.39	0.38

Deer Hunting: Days per Harvest Trends

	Days per Harvest			
	2017-2018	2018-2019	2019-2020	2020-2021
Deer Overall	22.4	20.2	20.6	18.0
Archery	20.7	18.1	18.6	16.5
Modern	27.9	28.7	28.7	24.6
Primitive	21.0	18.9	19.6	23.4

Deer Hunting: Buck-Doe Percentage Trends

	Percentage			
	2017-2018	2018-2019	2019-2020	2020-2021
Buck	44.5	41.0	43.1	45.3
Doe	55.5	59.0	56.9	54.7

- Looking at other species, notably fewer hunters were hunting dove, coyote, goose, raccoon, squirrel, and feral hog. However, note that this generally reflects a return to levels seen in the 2017-2018 and 2018-2019 seasons, with last year showing particularly high hunting participation for these species.
- Harvest was markedly down for most species other than deer, especially goose and duck (the pandemic is a possible reason for this, as waterfowl hunting is often a group activity). The notable exceptions are harvest increases for pen-raised quail and feral hog.

Turkey Hunting: Hunters and Days Trends

Equipment / Season Type	Number of Hunters				Hunter-Days			
	2017-2018	2018-2019	2019-2020	2020-2021	2017-2018	2018-2019	2019-2020	2020-2021
Turkey-all	48,626	49,878	61,224	59,988	510,907	521,678	711,202	548,417
Archery					17,858	14,700	22,759	11,604
Modern					477,067	494,233	684,115	534,370
Primitive					15,982	12,744	4,328	2,443
Fall	1,563	1,833	1,616	2,837	11,645	9,497	6,621	14,644
Spring	47,488	48,194	59,946	57,567	499,261	512,181	690,156	533,773

Turkey Hunting: Harvest Trends

Turkey / Season / Turkey Type	Number Harvested			
	2017-2018	2018-2019	2019-2020	2020-2021
Turkey-all	28,093	25,750	34,882	25,468
Fall	619	98	217	472
Spring	27,474	25,652	34,666	24,995
Jakes	2,236	1,208	1,760	1,928
Gobblers	25,858	24,542	33,122	23,540

Turkey Hunting: Mean Days per Hunter Trends

	Mean Days per Hunter			
	2017-2018	2018-2019	2019-2020	2020-2021
Turkey Overall	10.5	10.5	11.6	9.1
Fall	7.4	5.2	4.1	5.2
Spring	10.5	10.6	11.5	9.3

Turkey Hunting: Harvest per Hunter Trends

	Turkey Harvest per Hunter			
	2017-2018	2018-2019	2019-2020	2020-2021
Turkey Overall	0.58	0.52	0.57	0.42
Fall	0.40	*	0.13	0.17
Spring	0.58	0.53	0.58	0.43

* Sample size too small for calculations.

Turkey Hunting: Days per Harvest Trends

	Days per Harvest			
	2017-2018	2018-2019	2019-2020	2020-2021
Turkey Overall	18.2	20.3	20.4	21.5
Fall	18.8	*	30.6	31.0
Spring	18.2	20.0	19.9	21.4

* Sample size too small for calculations.

Quail Hunting: Hunters and Days Trends

Quail Type	Number of Hunters				Hunter-Days			
	2017-2018	2018-2019	2019-2020	2020-2021	2017-2018	2018-2019	2019-2020	2020-2021
Quail-all	8,821	8,953	7,796	6,696	*	52,336	39,541	40,046
Wild	3,004	2,144	2,903	2,093	39,696	12,710	11,491	13,021
Pen-raised	8,094	8,087	6,218	5,477	53,740	39,603	27,019	27,009

* Not determined for the 2017-2018 season.

Quail Hunting: Harvest Trends

Quail / Quail Type	Number Harvested			
	2017-2018	2018-2019	2019-2020	2020-2021
Quail-all	347,308	321,589	154,063	253,176
Wild	67,889	37,851	21,662	27,234
Pen-raised	279,418	283,738	132,379	225,942

Quail Hunting: Avg. Days and Days per Harvest

Avg. Days per Hunter				Days per Harvest			
2017-2018	2018-2019	2019-2020	2020-2021	2017-2018	2018-2019	2019-2020	2020-2021
10.6	5.8	5.1	6.0	0.3	0.2	0.3	0.2

Dove Hunting: Hunters and Days Trends

Dove / Split	Number of Hunters				Hunter-Days			
	2017-2018	2018-2019	2019-2020	2020-2021	2017-2018	2018-2019	2019-2020	2020-2021
Dove-all	38,837	35,955	55,800	49,990	213,107	194,068	233,234	207,038
First split					153,102	143,766	162,116	146,306
Remaining splits					59,747	49,601	57,688	53,930

Dove Hunting: Harvest Trends

Dove / Split	Number Harvested			
	2017-2018	2018-2019	2019-2020	2020-2021
Dove-all	1,567,042	1,257,006	1,345,741	1,159,243
First split	1,118,151	884,211	967,728	814,933
Remaining splits	397,517	317,444	323,922	313,903
Unknown splits	51,375	55,351	54,116	30,440

Dove Hunting: Avg. Days and Days per Harvest

Avg. Days per Hunter				Days per Harvest			
2017-2018	2018-2019	2019-2020	2020-2021	2017-2018	2018-2019	2019-2020	2020-2021
5.5	5.4	4.2	4.1	0.1	0.2	0.2	0.2

Small Game Hunting: Hunters and Days Trends

Species	Number of Hunters				Hunter-Days			
	2017-2018	2018-2019	2019-2020	2020-2021	2017-2018	2018-2019	2019-2020	2020-2021
Bobcat	2,760	2,594	3,339	2,375	11,365	14,493	4,037	4,399
Coot	649	895	1,009	704	2,029	7,053	543	1,320
Coyote	15,667	14,117	19,721	14,340	114,299	60,219	85,173	108,036
Duck	27,114	22,421	23,603	20,323	307,016	227,003	237,273	192,758
Fox	893	296	1,009	880	893	2,296	5,124	6,422
Goose	5,277	4,927	6,444	3,959	32,796	25,653	34,939	11,525
Opossum	487	718	1,087	704	649	1,163	17,547	5,543
Rabbit	5,439	4,527	8,774	7,478	34,988	41,386	55,980	56,041
Raccoon	5,601	4,199	5,668	3,783	98,469	74,479	144,336	124,224
Snipe	81	148	388	264	244	1,628	311	264
Squirrel	17,210	14,549	21,429	16,892	122,417	90,910	108,466	112,171
Wild hog	28,737	27,076	35,094	30,968	241,343	174,767	190,067	211,849
Woodcock	162	74	311	352	2,029	*0	543	1,672

*No hunters in the survey *specifically* hunted woodcock (i.e., 0 days hunting woodcock) but there was reported harvest in that season.

Small Game Hunting: Harvest Trends

Species	Number Harvested			
	2017-2018	2018-2019	2019-2020	2020-2021
Bobcat	3,071	3,109	3,028	2,364
Coot	5,070	24,660	10,249	4,650
Coyote	61,108	65,668	56,523	60,154
Duck	674,362	540,023	431,067	373,242
Fox	943	148	1,553	1,074
Goose	47,012	40,148	41,849	17,299
Opossum	1,418	2,194	11,025	4,644
Rabbit	41,897	45,403	73,139	55,675
Raccoon	80,732	37,783	65,685	31,936
Snipe	884	2,222	466	709
Squirrel	240,929	179,245	276,172	240,401
Wild hog	344,407	258,924	255,364	295,418
Woodcock	534	222	621	946

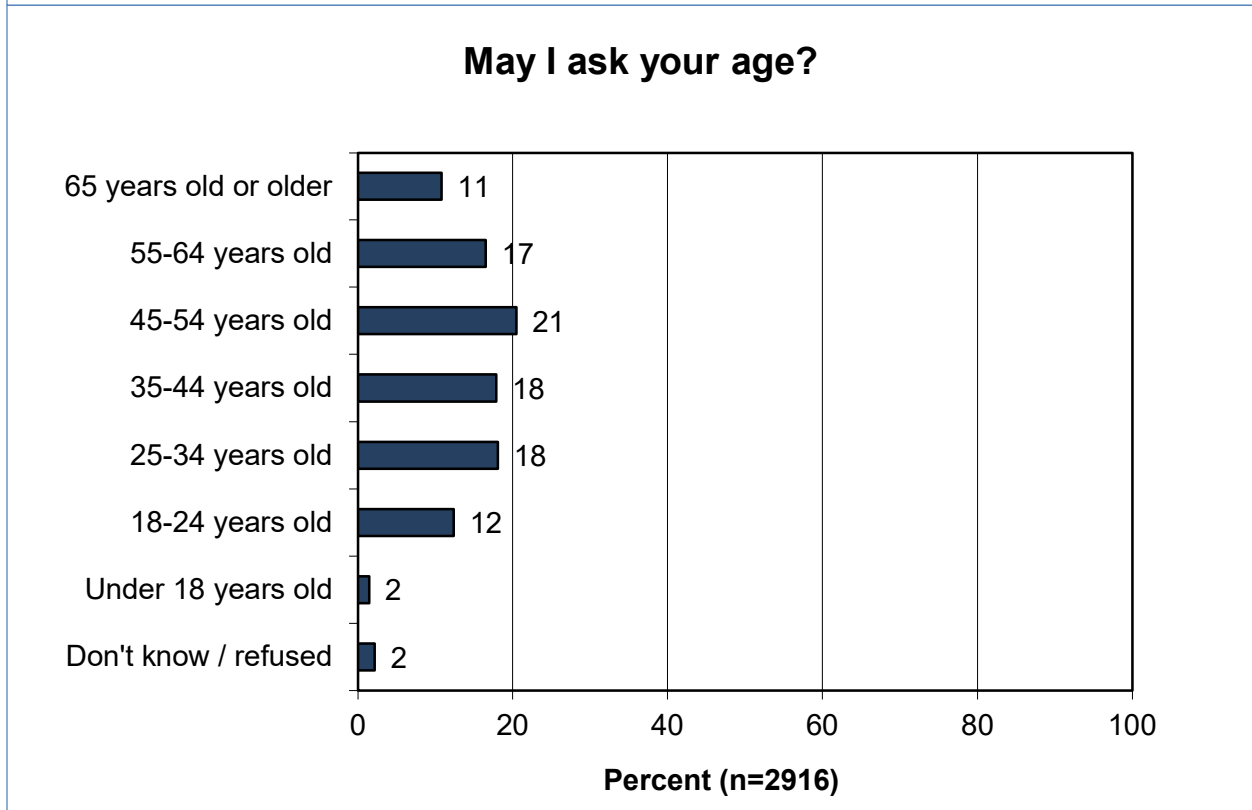
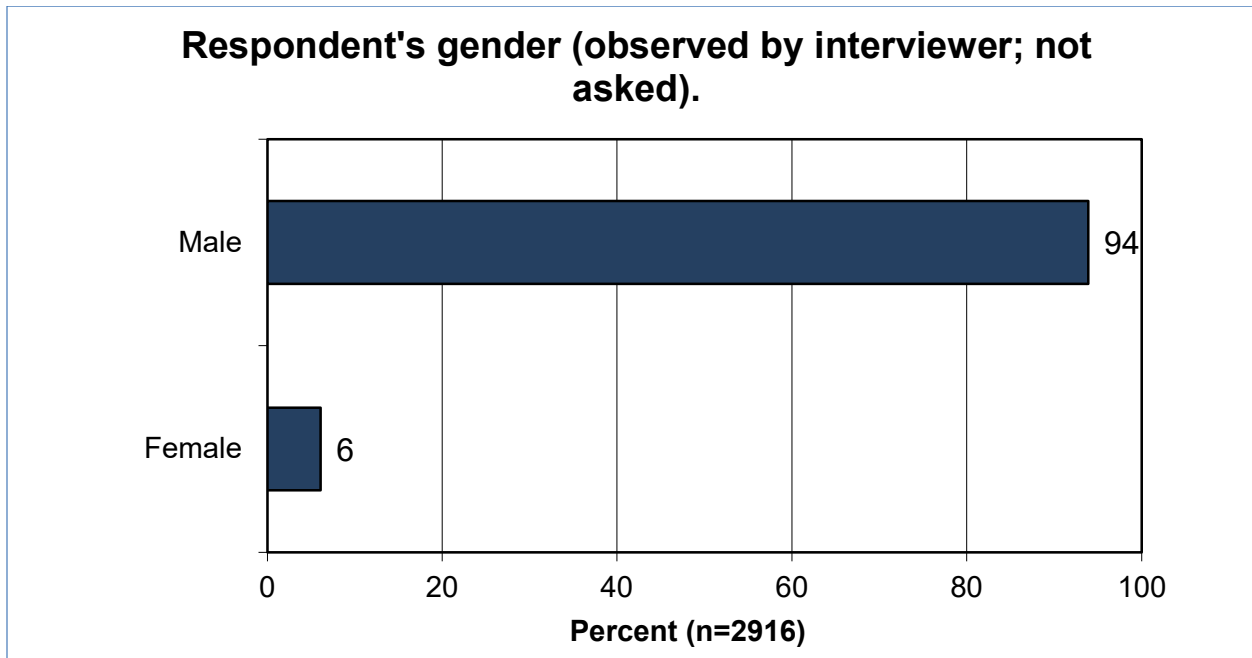
Small Game Hunting: Mean Days and Days per Harvest Trends

	Mean Days per Hunter				Days per Harvest			
	2017-2018	2018-2019	2019-2020	2020-2021	2017-2018	2018-2019	2019-2020	2020-2021
Bobcat	4.1	5.6	1.2	1.9	3.7	4.7	1.3	1.9
Coot	3.1	7.9	0.5	1.9	0.4	0.3	0.1	0.3
Coyote	7.3	4.3	4.3	7.5	1.9	0.9	1.5	1.8
Duck	11.3	10.1	10.1	9.5	0.5	0.4	0.6	0.5
Fox	1.0	7.8	5.1	7.3	0.9	15.5	3.3	6.0
Goose	6.2	5.2	5.4	3.9	0.7	0.6	0.8	0.9
Opossum	1.3	1.6	16.1	7.9	0.5	0.5	1.6	1.2
Rabbit	6.4	9.1	6.4	7.5	0.8	0.9	0.8	1.0
Raccoon	17.6	17.7	25.5	32.8	1.2	2.0	2.2	3.9
Snipe	3.0	11.0	0.8	1.0	0.3	0.7	0.7	0.4
Squirrel	7.1	6.2	5.1	6.6	0.5	0.5	0.4	0.5
Wild hog	8.4	6.5	5.4	6.8	0.7	0.7	0.7	0.7
Woodcock	12.5	0.0	1.8	4.8	3.8	*	0.9	1.8

*No hunters in the survey *specifically* hunted woodcock (i.e., 0 days hunting woodcock) but there was reported harvest.

DEMOGRAPHIC DATA

➤ Age and gender of licensed hunters in the 2020-2021 seasons are shown below.



ABOUT RESPONSIVE MANAGEMENT

Responsive Management is an internationally recognized survey research firm specializing in natural resource and outdoor recreation issues. Our mission is to help natural resource and outdoor recreation agencies, businesses, and organizations better understand and work with their constituents, customers, and the public. Focusing only on natural resource and outdoor recreation issues, Responsive Management has conducted telephone, mail, and online surveys, as well as multi-modal surveys, on-site intercepts, focus groups, public meetings, personal interviews, needs assessments, program evaluations, marketing and communication plans, and other forms of human dimensions research measuring how people relate to the natural world for more than 30 years. Utilizing our in-house, full-service survey facilities with 75 professional interviewers, we have conducted studies in all 50 states and 15 countries worldwide, totaling more than 1,000 human dimensions projects *only* on natural resource and outdoor recreation issues.

Responsive Management has conducted research for every state fish and wildlife agency and every federal natural resource agency, including the U.S. Fish and Wildlife Service, the National Park Service, the U.S. Forest Service, Bureau of Land Management, U.S. Coast Guard, and the National Marine Fisheries Service. Additionally, we have also provided research for all the major conservation NGOs including the Archery Trade Association, the American Sportfishing Association, the Association of Fish and Wildlife Agencies, Dallas Safari Club, Ducks Unlimited, Environmental Defense Fund, the Izaak Walton League of America, the National Rifle Association, the National Shooting Sports Foundation, the National Wildlife Federation, the Recreational Boating and Fishing Foundation, the Rocky Mountain Elk Foundation, Safari Club International, the Sierra Club, Trout Unlimited, and the Wildlife Management Institute.

Other nonprofit and NGO clients include the American Museum of Natural History, the BoatUS Foundation, the National Association of Conservation Law Enforcement Chiefs, the National Association of State Boating Law Administrators, and the Ocean Conservancy. As well, Responsive Management conducts market research and product testing for numerous outdoor recreation manufacturers and industry leaders, such as Winchester Ammunition, Vista Outdoor (whose brands include Federal Premium, CamelBak, Bushnell, Primos, and more), Trijicon, Yamaha, and others. Responsive Management also provides data collection for the nation's top universities, including Auburn University, Clemson University, Colorado State University, Duke University, George Mason University, Michigan State University, Mississippi State University, North Carolina State University, Oregon State University, Penn State University, Rutgers University, Stanford University, Texas Tech, University of California-Davis, University of Florida, University of Montana, University of New Hampshire, University of Southern California, Virginia Tech, West Virginia University, Yale University, and many more.

Our research has been upheld in U.S. Courts, used in peer-reviewed journals, and presented at major wildlife and natural resource conferences around the world. Responsive Management's research has also been featured in many of the nation's top media, including *Newsweek*, *The Wall Street Journal*, *The New York Times*, CNN, National Public Radio, and on the front pages of *The Washington Post* and *USA Today*.

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